Appendix E

Traffic Study

Traffic Study for the

Malibu Housing Element EIR

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TRAFFIC STUDY
FOR THE
MALIBU HOUSING ELEMENT EIR

April 2013

Prepared for:

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1. Introduction

Fehr & Peers conducted a traffic study to evaluate the potential traffic impacts of the proposed update to the Malibu Housing Element. The study analyzes potential candidate sites, which together would create 212 units of multi-family affordable housing in the City. This report identifies the base data and assumptions, explains the methodologies used, and summarizes the findings of the study. The traffic impact analysis conducted for this report includes analysis of existing (2012) conditions, opening year (2014) conditions, and general plan buildout (Year 2030) conditions.

Project Description

The project as proposed would develop a total of 212 units spread over the following three locations in Malibu into multi-family affordable housing:

- 28517 Pacific Coast Highway (APN: 4467-013-022 & 4467-013-023) – 91 units
- 28401 Pacific Coast Highway (APN: 4467-012-005) – 64 units
- 3700 La Paz Lane (APN: 4458-022-023 & 4458-022-024) – 57 units

A map of the three candidate sites is shown in Figure 1.

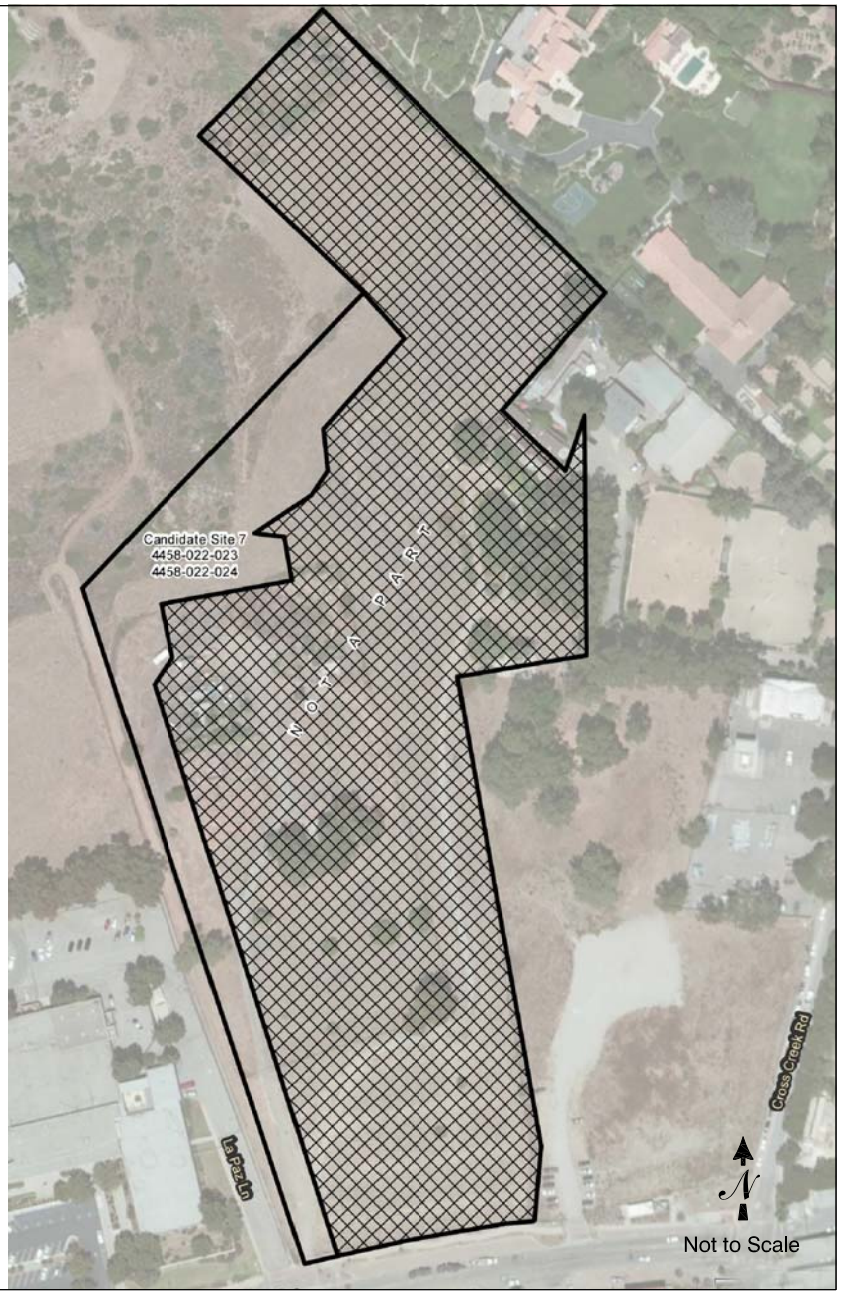
Study Scope

The scope of work for this study was developed in conjunction with the City of Malibu and comments received during the public scoping meetings. The base assumptions and technical methodologies were discussed as part of the study approach. The study analyzes potential project-generated traffic impacts on the adjacent street system for existing conditions and the cumulative year. Traffic counts were collected by the City of Malibu in July 2012, which are used in this analysis. The following traffic scenarios were analyzed for the weekday AM peak period (between 7:00 and 10:00 AM), PM peak period (between 3:00 and 6:00 PM), and Saturday peak period (between 11:00 AM and 2:00 PM):

- Existing (Year 2012) Conditions – The analysis of existing Year 2012 traffic conditions provides a basis for the remainder of the study. The existing conditions analysis includes an assessment of streets, traffic volumes, and operating conditions. The existing traffic conditions are the baseline for assessing the significance of project impacts.

- Existing (Year 2012) plus Project Conditions – This is an analysis of existing traffic conditions with traffic expected from the proposed project added to the traffic volumes.

- Opening Year (Year 2014) Conditions – Opening Year baseline traffic conditions without the proposed Project are forecasted for opening year 2014. The objective of this phase of analysis is to estimate future traffic growth and operating conditions that could be expected to result from regional ambient growth and known cumulative projects if the proposed project were not developed. The opening year base traffic forecasts are used to develop cumulative baseline operating conditions that provide the basis for determining project impacts.



Source: RIncon

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PROJECT SITE PLAN

FIGURE 1

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- Opening Year plus Project Conditions – This is an analysis of opening year traffic conditions with traffic expected from the proposed project added to the opening year base traffic forecasts. Opening Year plus proposed project conditions were developed for year 2014. The objective of this analysis is to develop the traffic forecasts of the proposed project that are then used to identify potential impacts.

- Cumulative Year (2030) plus Project Conditions – Cumulative Year baseline traffic conditions without the proposed Project are forecasted for general plan buildout year 2030. The objective of this phase of analysis is to estimate future traffic growth and operating conditions that could be expected to result from regional ambient growth and known cumulative projects if the proposed project were not developed. The cumulative base traffic forecasts are used to develop cumulative baseline operating conditions that provide the basis for determining project impacts.

- Cumulative Year plus Project Conditions – This is an analysis of cumulative year traffic conditions with traffic expected from the proposed project added to the general plan buildout year base traffic forecasts. Cumulative Year plus proposed project conditions were developed for year 2030. The objective of this analysis is to develop the traffic forecasts of the proposed project that are then used to identify potential impacts.

The traffic study focuses on weekday AM and PM and Saturday mid-day peak periods of traffic because it represents the worst overall traffic conditions with the greatest potential for impact. Additionally, this study focuses on the Summer peak season, which represents the worst seasonal traffic conditions in Malibu.

As illustrated in Figure 2, nine intersections were identified, in consultation with the City of Malibu, for weekday morning and evening peak period analysis:

1. Decker Road (SR-23) & Pacific Coast Highway
2. Trancas Canyon Road & Pacific Coast Highway
3. Kanan Dume Road & Pacific Coast Highway
4. Zumirez Drive & Pacific Coast Highway
5. Malibu Canyon Road & Civic Center Way
6. Malibu Canyon Road & Pacific Coast Highway
7. Webb Way & Pacific Coast Highway
8. Cross Creek Road & Pacific Coast Highway
9. Las Flores Canyon Road & Pacific Coast Highway

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STUDY AREA AND ANALYZED INTERSECTIONS

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FIGURE 2

Organization of Report

This report is divided into 11 chapters, including this introduction. Chapter 2 describes the existing conditions in the study area including an inventory of the streets, highways, and transit service in the study area, a summary of traffic volumes and an assessment of operating conditions. The methodologies used to develop traffic forecasts for the cumulative base and cumulative plus project and the forecasts themselves are included in Chapter 3. Chapter 4 presents an assessment of potential intersection traffic impacts generated by the proposed project. Chapter 5 presents the roadway segment analysis for six study segments near the project site. Chapters 6, 7 and 8 summarize the transit, bicycle, and pedestrian impact analyses, respectively. Chapter 9 presents the truck traffic impact analysis, and Chapter 10 provides a project site plan review. Chapter 11 summarizes the key findings and conclusions of the study. Appendices to this report include details of the technical analysis.

2. Existing Conditions

A comprehensive data collection effort was undertaken to develop a detailed understanding of existing conditions in the study area. The assessment of conditions relevant to this study included an inventory of the street and highway systems, traffic volumes on these facilities, and operating conditions at key intersections. A detailed description of these elements is presented in this chapter.

Existing Highway and Street System

The project site is in the western portion of the City of Malibu, on or near Pacific Coast Highway. Primary regional access to the project area is provided by the Pacific Coast Highway (CA-1 or PCH) south of the project site. Data from the California Department of Transportation (Caltrans) shows that the average daily traffic (ADT) volume on the Pacific Coast Highway in Malibu ranges between approximately 30,000 and 45,000 vehicles per day (vpd) (*2010 Traffic Volumes on California State Highways,* Caltrans, obtained April 2012).

Local access to the project site is provided by the Pacific Coast Highway and other arterial and collector roadways that connect to PCH. The primary roadway facilities in the project study area are:

- Pacific Coast Highway (SR-1) – Pacific Coast Highway is classified as a State Highway that provides east/west access in Malibu. In the study area, Pacific Coast Highway is a 4-lane roadway with an intermittent center turning lane, with speed limits ranging from 45 to 55 miles per hour.

- Decker Road (SR-23) – Decker Road is an undivided arterial roadway that provides north/south access in Malibu. Decker Road extends from Pacific Coast Highway north to Mulholland Highway. In the study area, Decker Road is a 2-lane roadway and is a designated scenic route.

- Trancas Canyon Road – Trancas Canyon Road is an undivided arterial roadway that provides north/south access in Malibu. Trancas Canyon Road extends from Pacific Coast Highway north to the Santa Monica Mountains National Recreation Area. Near the project site, Trancas Canyon Road is a 2-lane roadway.

- Kanan Dume Road (County Highway N9) – Kanan Dume Road is classified as a 4-lane highway providing north/south access in Malibu. Kanan Dume Road extends from Pacific Coast Highway north to the City of Agoura. Kanan Dume Road also provides access to the Ventura Freeway (US 101). In Malibu, Kanan Dume Road is classified as a city road, as opposed to a county road.

- Zumirez Drive – Zumirez Drive is a collector roadway providing north/south access in Malibu. Zumirez Drive is a 2-lane undivided roadway that extends from Pacific Coast Highway north to Kanan Dume Road. Zumirez Drive is approximately one mile long.

- Malibu Canyon Road (County Highway N1) – Malibu Canyon Road is classified as a north-south arterial roadway, extending from Pacific Coast Highway northbound to the Ventura Freeway (US 101). Between Pacific Coast Highway and Civic Center Way, Malibu Canyon Road is a 4-lane roadway; north of Civic Center Way, Malibu Canyon Road narrows to a 2-lane roadway. Near Mulholland Highway, Malibu Canyon becomes Las Virgenes Road and connects to US 101.

- Civic Center Way – Civic Center Way provides east/west access in Malibu. It is a 2-lane undivided arterial roadway connecting Malibu Canyon Road and Cross Creek Road.

- Webb Way – Webb Way provides north/south access in Malibu to City Hall. It extends from Malibu Road north to Civic Center Way, where it becomes Stuart Ranch Road. There are two to four travel lanes along Webb Way.

- Cross Creek Road – Cross Creek Road provides north/south access in Malibu. It is 2-lane undivided roadway extending from Pacific Coast Highway north to Palm Canyon Lane.

- Los Flores Canyon Road – Los Flores Canyon Road is a north/south arterial roadway in Malibu. It is a 2-lane roadway extending from Pacific Coast Highway north to Rambla Pacifico Street.

Diagrams of the existing lane configurations at the analyzed intersections are provided in Appendix A.

Existing Transit Service

The project study area is served by bus transit lines operated by the Los Angeles County Metropolitan Transportation Authority (Metro). One transit route provides service in the project vicinity. Metro Line 534 travels along Pacific Coast Highway in the vicinity of the project. Line 534 provides service between Culver City and Malibu, with stops in Santa Monica, Pacific Palisades, and Castellamare. Line 534 operates from approximately 4:30 AM to 10:15 PM on weekdays, and from 5:30 AM to 10:15 PM on weekends. Bus headways are approximately 10 to 30 minutes on weekdays, and 20 to 60 minutes on weekends.

Existing Pedestrian and Bicycle Facilities

The City of Malibu does not have a current bicycle or pedestrian plan. Likewise, existing and planned bicycle and pedestrian facilities have not been documented in the 1995 Malibu General Plan. The portions of Pacific Coast Highway near the project site do not have pedestrian or bicycle facilities. Civic Center Way, proximate to one of the project parcels (parcel 7), has a sidewalk on the north side of the street and a paved pedestrian path on the south side of the street.

Existing Traffic Volumes and Levels of Service

This section presents the existing peak hour turning movement traffic volumes for the analyzed intersections; describes the methodology used to assess the traffic conditions at each intersection; and

analyzes the resulting operating conditions at each, indicating volume-to-capacity (V/C) ratios and level of service (LOS).

Existing Traffic Volumes

New traffic counts were collected by the City of Malibu in July 2012. Traffic counts were collected on a typical summer weekday during the morning peak period (between 7:00 and 10:00 AM) and evening peak period (between 3:00 and 6:00 PM), as well as on a Saturday from 11:00 AM to 2:00 pm in July 2012. The existing peak hour traffic volumes at the analyzed intersections are presented in Figure 3. Traffic count data sheets are provided in Appendix B.

Level of Service Methodology

LOS is a qualitative measure used to describe the condition of traffic flow, ranging from excellent "free-flow" conditions at LOS A to overloaded "stop-and-go" conditions at LOS F. LOS D is typically considered to be the minimum desirable level of service in urban areas.

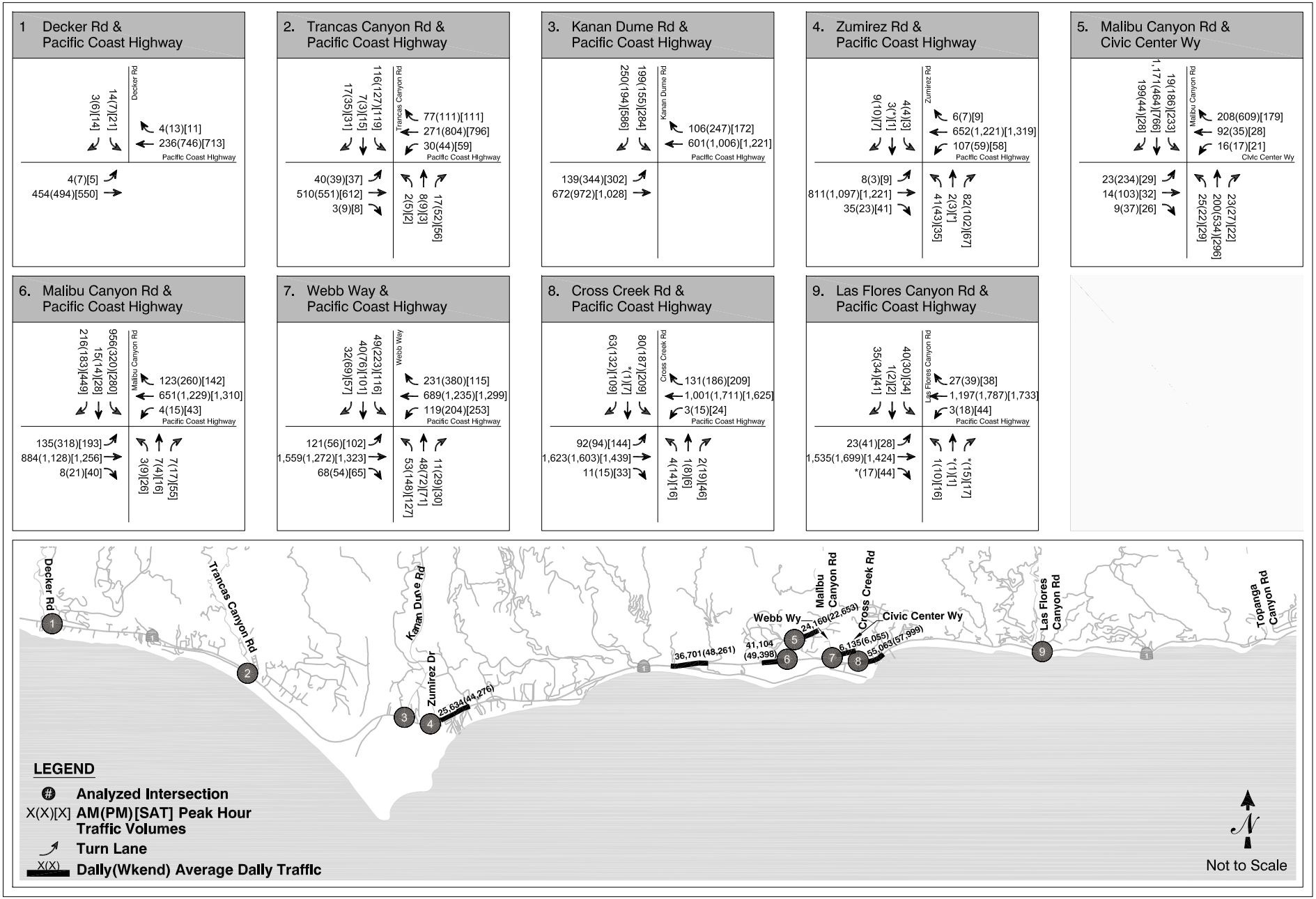
This study uses Intersection Capacity Utilization (ICU) methodology adopted by the *2010 Congestion Management Program for Los Angeles County* (Metro, October 2010) (CMP) and the City of Malibu for signalized intersections, and *Highway Capacity Manual* (Transportation Research Board, 2000) methodology for unsignalized intersections. The ICU methodology determines the V/C ratio of an intersection based on the number of approach lanes, the traffic signal phasing and the traffic volumes. The V/C ratio is then used to find the corresponding LOS based on the definitions in Table 1. Unsignalized intersections are reported in seconds of delay at the critical approach for side-street stop-controlled (SSSC) intersections and average delay for all-way stop-controlled intersections (AWSC), as shown in Table 2.

Existing Peak Hour Levels of Service

The existing weekday peak hour turning movement volumes presented in Figure 3 were used in conjunction with the LOS methodology described above to determine existing operating conditions at each of the study intersections. LOS calculation worksheets are included in Appendix C.

Table 3 summarizes the existing weekday morning and evening peak period V/C ratios and corresponding LOS at each of the study intersections. The results of this analysis indicate that seven of the nine intersections are currently operating at LOS C or better during the weekday morning and evening peak periods. The following intersections operate at an LOS of D or worse during one or more peak periods:

- Malibu Canyon Road & Pacific Coast Highway (Saturday peak hour)
- Cross Creek Road & Pacific Coast Highway (PM and Saturday peak hours)



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EXISTING PEAK HOUR TRAFFIC VOLUMES

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FIGURE 3

TABLE 1
LEVEL OF SERVICE DEFINITIONS
FOR SIGNALIZED INTERSECTIONS

Level of Service	Intersection Capacity Utilization	Definition
A	0.000-0.600	EXCELLENT. No Vehicle waits longer than one red light and no approach phase is fully used.
B	0.601-0.700	VERY GOOD. An occasional approach phase is fully utilized; many drivers begin to feel somewhat restricted within groups of vehicles.
C	0.701-0.800	GOOD. Occasionally drivers may have to wait through more than one red light; backups may develop behind turning vehicles.
D	0.801-0.900	FAIR. Delays may be substantial during portions of the rush hours, but enough lower volume periods occur to permit clearing of developing lines, preventing excessive backups.
E	0.901-1.000	POOR. Represents the most vehicles intersection approaches can accommodate; may be long lines of waiting vehicles through several signal cycles.
F	> 1.000	FAILURE. Backups from nearby locations or on cross streets may restrict or prevent movement of vehicles out of the intersection approaches. Tremendous delays with continuously increasing queue lengths.

Source: *Transportation Research Circular No. 212, Interim Materials on Highway Capacity,* Transportation Research Board, 1980.

TABLE 2
LEVEL OF SERVICE DEFINITIONS FOR
UNSIGNALIZED INTERSECTIONS

Level of Service	Delay (seconds/vehicle)
A	$\leq$ 10.0
B	> 10.0 and $\leq$ 15.0
C	> 15.0 and $\leq$ 25.0
D	> 25.0 and $\leq$ 35.0
E	> 35.0 and $\leq$ 50.0
F	> 50.0

Source: *Highway Capacity Manual, Special Report 209,*
Transportation Research Board, 2000.

TABLE 3
EXISTING (YEAR 2012) INTERSECTION LEVEL OF SERVICE ANALYSIS

Intersection	Jurisdiction	Peak Hour	Existing Base Year (Year 2012)	
			V/C or Delay	LOS
1. Decker Canyon Road		**AM**	11.5 s	B
Pacific Coast Highway [a]		**PM**	16.2 s	C
	Malibu	**SAT**	17.5 s	C
2. Trancas Canyon Road		**AM**	0.319	A
Pacific Coast Highway		**PM**	0.480	A
	Malibu	**SAT**	0.468	A
3. Kanan Dume Road		**AM**	0.394	A
Pacific Coast Highway		**PM**	0.633	B
	Malibu	**SAT**	0.799	C
4. Zumirez Road		**AM**	0.406	A
Pacific Coast Highway		**PM**	0.484	A
	Malibu	**SAT**	0.500	A
5. Malibu Canyon Road		**AM**	0.503	A
Civic Center Drive		**PM**	0.472	A
	Malibu	**SAT**	0.345	A
6. Malibu Canyon Road		**AM**	0.674	B
Pacific Coast Highway		**PM**	0.671	B
	Malibu	**SAT**	0.807	D
7. Webb Way		**AM**	0.517	A
Pacific Coast Highway		**PM**	0.668	B
	Malibu	**SAT**	0.674	B
8. Cross Creek Road		**AM**	0.594	A
Pacific Coast Highway		**PM**	0.781	C
	Malibu	**SAT**	0.809	D
9. Las Flores Canyon Road		**AM**	0.581	A
Pacific Coast Highway		**PM**	0.681	B
	Malibu	**SAT**	0.668	B

Note: Intersections analyzed using Intersection Capacity Utilization (ICU) methodology unless otherwise noted.

[a] Intersection is 2-way stop-controlled. Analysis conducted using *Highway Capacity Manual* stop-controlled methodology. Average vehicular delay in seconds is reported for the stop-controlled approach.

3. Traffic Projections

Project Traffic Volumes

Traffic estimates for the proposed project were developed using a 3-step process: traffic generation, trip distribution, and traffic assignment.

Project Traffic Generation

Trip generation for the proposed pproject was estimated using rates provided in *Trip Generation, 8th Edition* (Institute of Transportation Engineers, 2008). The trip rates for the apartment land use (code 220) were used for this study. As shown in Table 4, the project is expected to generate a total of 1,410 weekday daily trips, including approximately 108 trips during the AM peak hour and 131 trips during the PM peak hour. The project is also expected to generate a total of 1,354 Saturday daily trips, out of which, 110 trips are estimated to occur during the mid-day peak hour.

Project Traffic Distribution

The geographic distribution of trips generated by the proposed project is dependent on characteristics of the street system serving the site, the level of accessibility of routes to and from the proposed project site and the locations of employment and commercial centers to which users of the project would be drawn. Trip distribution for each candidate site was conducted independently of the other two sites, based on access points and the aforementioned characteristics. The combined trip distribution pattern for the three sites is illustrated in Figure 4.

Project Traffic Assignment

The trip generation estimates summarized in Table 4 and the distribution patterns illustrated in Figure 4 were used to assign project-generated traffic to the study intersections. Figure 5 illustrates the estimated project-generated peak period traffic volumes at each of the analyzed intersections during a typical weekday morning and evening peak period.

Existing plus Project Traffic Projections

The proposed project traffic volumes were added to the 2012 baseline traffic counts to develop Existing plus Project traffic volumes. Figure 6 illustrates the resulting Existing plus Project peak period traffic volumes for a typical weekday AM and PM and Saturday mid-day peak hours.

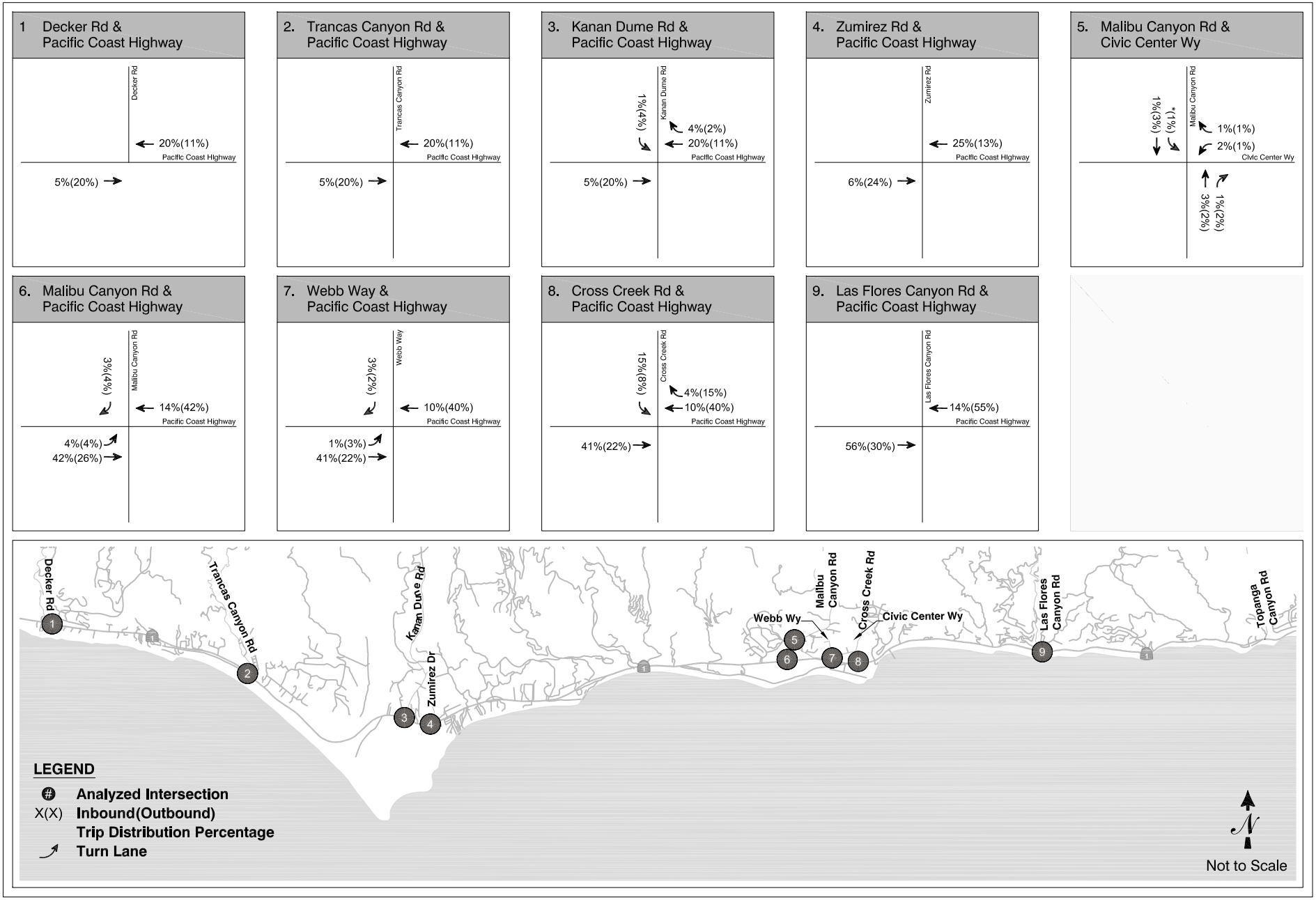
TABLE 4
PROJECT TRIP GENERATION ESTIMATES

Trip Generation Rates													
				AM Peak Hour			PM Peak Hour				Saturday Peak Hour		
Land Use	ITE Code	Unit	Weekday Daily Rate	Rate	% In	% Out	Rate	% In	% Out	Saturday Daily Rate	Rate	% In	% Out
Apartments	220	DU	6.65	0.51	20%	80%	0.62	65%	35%	6.39	0.52	54%	46%

Trip Generation													
				AM Peak Hour			PM Peak Hour				Mid-day Peak Hour		
Site	ITE Code	Size	Weekday Daily Trips	Total	In	Out	Total	In	Out	Saturday Daily Trips	Total	In	Out
1	220	91	605	46	9	37	56	36	20	581	47	25	22
2	220	64	426	33	7	26	40	26	14	409	33	18	15
7	220	57	379	29	6	23	35	23	12	364	30	16	14
Total		***212***	***1,410***	***108***	***22***	***86***	***131***	***85***	***46***	***1,354***	***110***	***59***	***51***

Notes:

Trip generation estimates developed using rates from *Trip Generation, 8th Edition* (Institute of Transportation Engineers, 2008).



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PROJECT TRIP DISTRIBUTION

FIGURE 4

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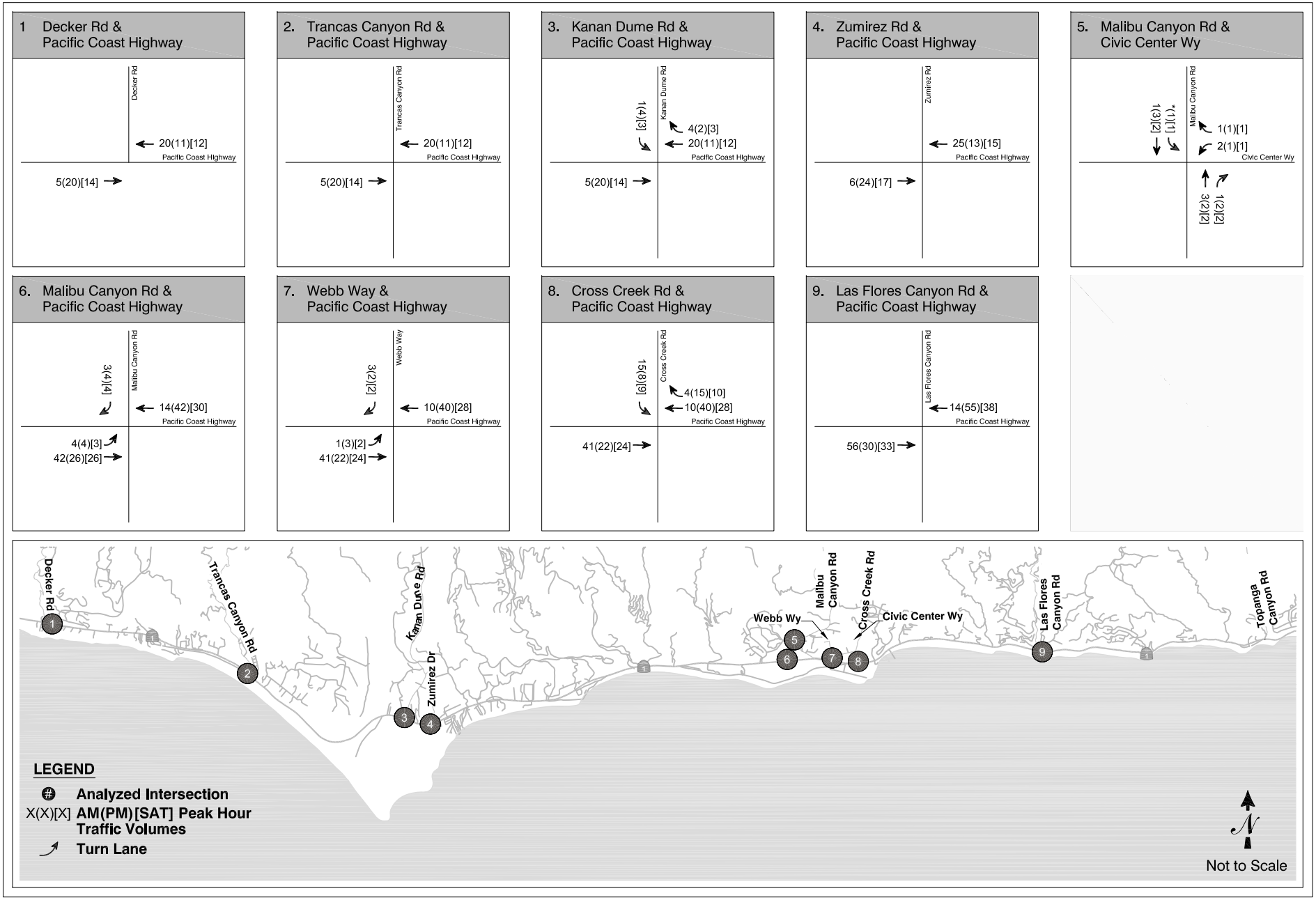

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PROJECT ONLY PEAK HOUR VOLUMES

FIGURE 5

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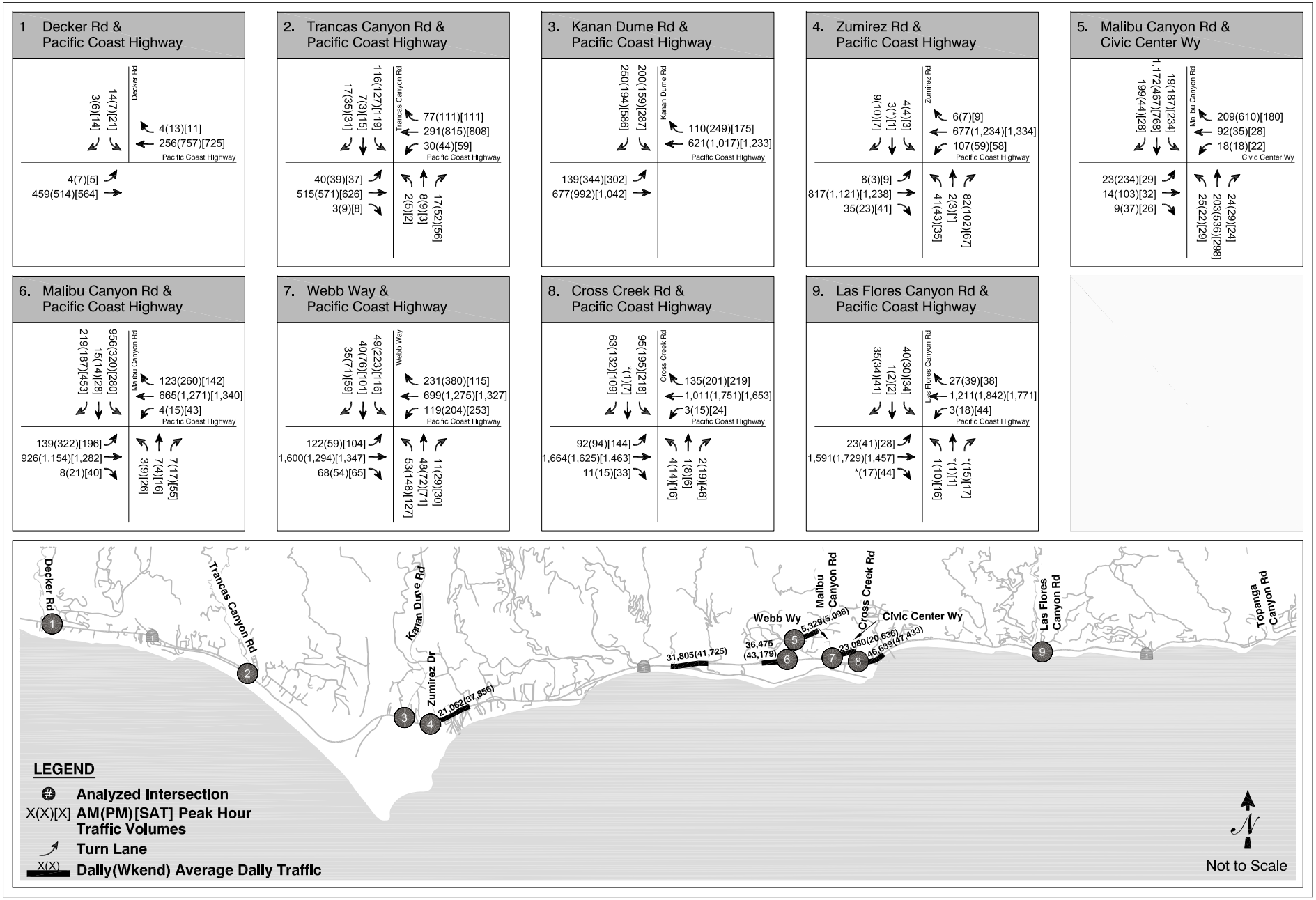

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EXISTING PLUS PROJECT PEAK HOUR TRAFFIC VOLUMES

FIGURE 6

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Opening Year (2014) and Cumulative Year (2030) Base Traffic Volumes

The opening year (2014) and cumulative year (2030) base traffic projections reflect the changes to existing traffic conditions that can be expected from three primary sources. The first source is the ambient growth in traffic, which reflects increases in traffic because of regional growth and development. The second source is traffic generated by specific development projects located within, or in the vicinity of, the study area. The third source is roadway or intersection capacity enhancements. These factors are described below.

Areawide Traffic Growth

Based on discussions with the City of Malibu, it was determined that an ambient growth factor of 1.5% per year (compounded) should be applied to adjust the existing base year traffic volumes to reflect the effects of regional growth and development for the 2014 opening year. This adjustment was applied to the existing year 2012 traffic counts to reflect the effect of ambient growth of 3.02% by year 2014. It was also determined that an ambient growth rate of 0.48% (compounded) per year should be applied to adjust the existing base year traffic volumes to reflect the effects of regional growth and development for the 2030 cumulative year. This adjustment was applied to the existing year 2012 traffic counts to reflect the effect of ambient growth of 9% by year 2030.

Related Project Traffic Generation and Assignment

Cumulative base traffic forecasts include the effects of specific cumulative development projects, also called related projects, expected to be built in the vicinity of the proposed project site prior to the proposed project's buildout. The City of Malibu identified a total of 32 projects, which are noted below and shown on Figure 7:

- Trancas Townhomes (6155 Trancas Canyon Road)
- Trancas County Market (30745 Pacific Coast Highway)
- Malibu Sycamore Village (23575 Civic Center Way)
- Rancho Malibu Hotel (4000 Malibu Canyon Road)
- La Paz Shopping Center (23465 Civic Center Way)
- Whole Foods Shopping Center (23401 Civic Center Way)
- Santa Monica College Satellite Campus (23555 Civic Center Way)
- Pepperdine Campus Life Project (24255 Pacific Coast Highway)
- Pierview Restaurant (22716 Pacific Coast Highway)
- Windsail Restaurant (22706 Pacific Coast Highway)

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LOCATION OF RELATED PROJECTS

FIGURE 7

- Hajian Office Space (24903 Pacific Coast Highway)
- Office and Retail Building (22959 Pacific Coast Highway)
- Office Building (22729 Pacific Coast Highway)
- Carbon Condos (22065 Pacific Coast Highway)
- Single Family Development (11805-18809 Pacific Coast Highway)
- Single Family Development (22301-22309 Pacific Coast Highway)
- Single Family Development (21997 and 22003 Pacific Coast Highway)
- Serra Retreat (3314 Serra Road)
- Single Family Development (20624 and 20630 Pacific Coast Highway)
- Seaboard (21100 Seaboard)
- Sea Star Estates (6270, 6304, 6312, 6282, 6398 Sea Star Drive)
- Malibu High School (30215 Morning View Drive)
- 28811 PCH Subdivision (28811 Pacific Coast Highway)
- LA County Fire Station No. 71 (28722 Pacific Coast Highway)
- Galahad Subdivision (6061 Galahad Road)
- Zuma Mesa (6271 and 6277 Zuma Mesa Drive)
- Sea Level (61864 and 61866 Sea Level Drive)
- Single Family Development (5905 and 5909 Latigo Canyon Road)
- Single Family Development (27535 Pacific Coast Highway)
- Puerco Canyon Road Extension (3500 Puerco Canyon Road)
- Crummer Site Subdivision (24120 Pacific Coast Highway)
- Towing Subdivision (23915 Pacific Coast Highway)

The City of Malibu provided published traffic studies, environmental documents, or approved scoping forms detailing project trip generation and assignment for six of the aforementioned development projects. These projects include: Malibu Sycamore Village, Rancho Malibu Hotel, La Paz Shopping Center, Whole Foods Shopping Center, Pepperdine Campus Life Project, and Crummer Site Subdivision. The project trip assignment for these six projects was based on the assignment presented in their respective traffic studies or scoping forms. For the remaining projects, project traffic was forecasted using ITE *Trip Generation* rates and was assigned based on the location of the project and potential distribution of trips throughout the study area. Trip generation estimates and project descriptions for the aforementioned projects are provided in Appendix C.

Cumulative Baseline Street Improvements

There are currently no planned street improvements scheduled to be in place by 2014 at the study locations.

Related Project Traffic Assignment

Using the estimated trip generation and trip distribution patterns described above, traffic generated by the related projects was assigned to the street network.

Opening Year (2014) Base Traffic Projections

Figure 8 illustrates the opening year (2014) base for weekday morning and evening peak period traffic volumes at the analyzed intersections. The cumulative base traffic conditions represent an estimate of future conditions without development of the proposed project.

Opening Year (2014) plus Project Traffic Projections

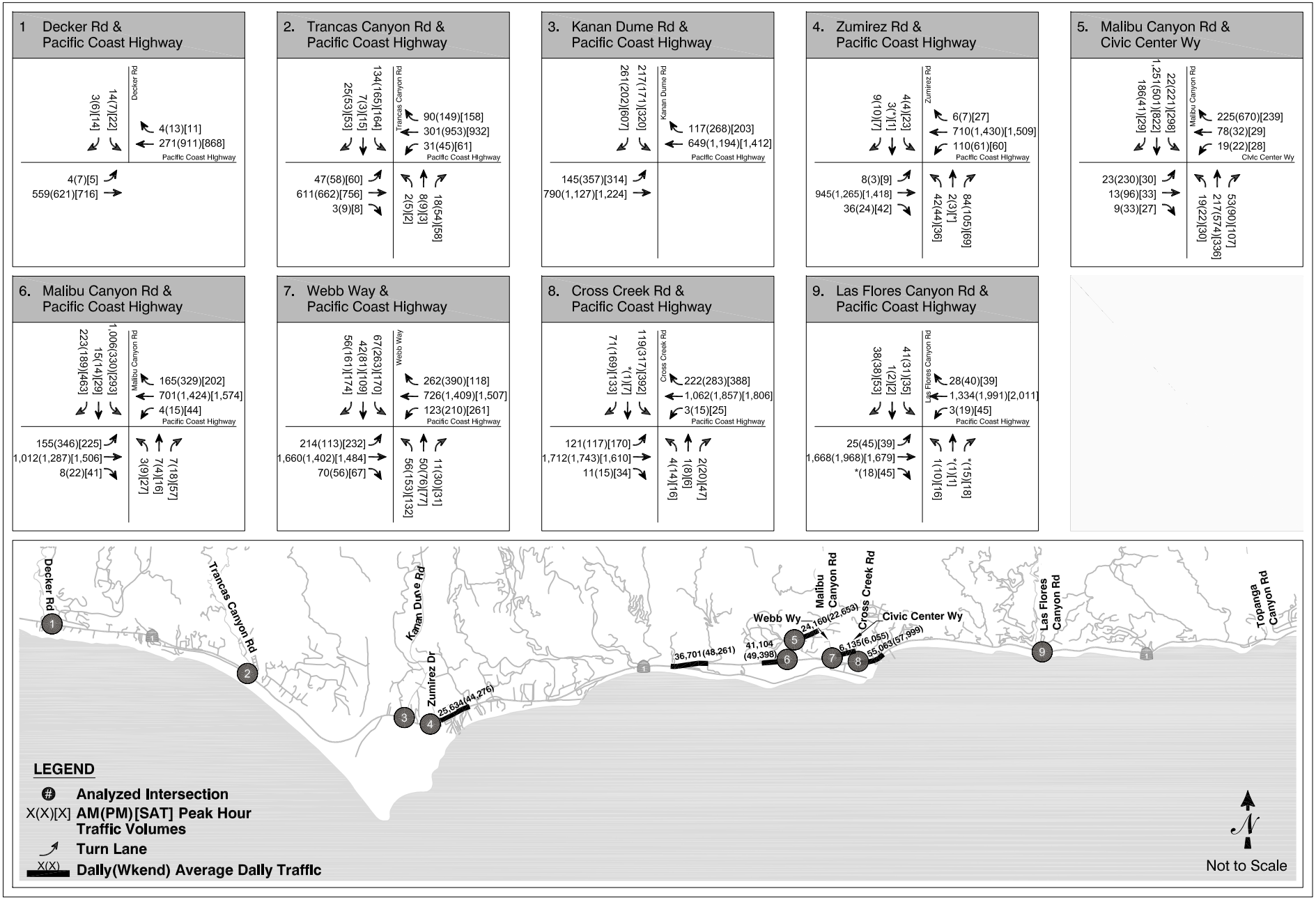
As illustrated in Figure 9, the proposed project traffic volumes were then added to the cumulative base traffic projections to calculate opening year (2014) plus project traffic forecasts for the opening scenario.

Cumulative Year (2030) Base Traffic Projections

Figure 10 illustrates the cumulative year (2030) base for weekday morning and evening peak period traffic volumes at the analyzed intersections. The cumulative base traffic conditions represent an estimate of future conditions without development of the proposed project.

Cumulative Year (2030) plus Project Traffic Projections

As illustrated in Figure 11, proposed project traffic volumes were then added to the cumulative year base traffic projections to calculate Cumulative Year (2030) plus project traffic forecasts for the general plan buildout year.



FEHR PEERS

OPENING YEAR (2014) PEAK HOUR TRAFFIC VOLUMES

Apr 22, 2013 JS
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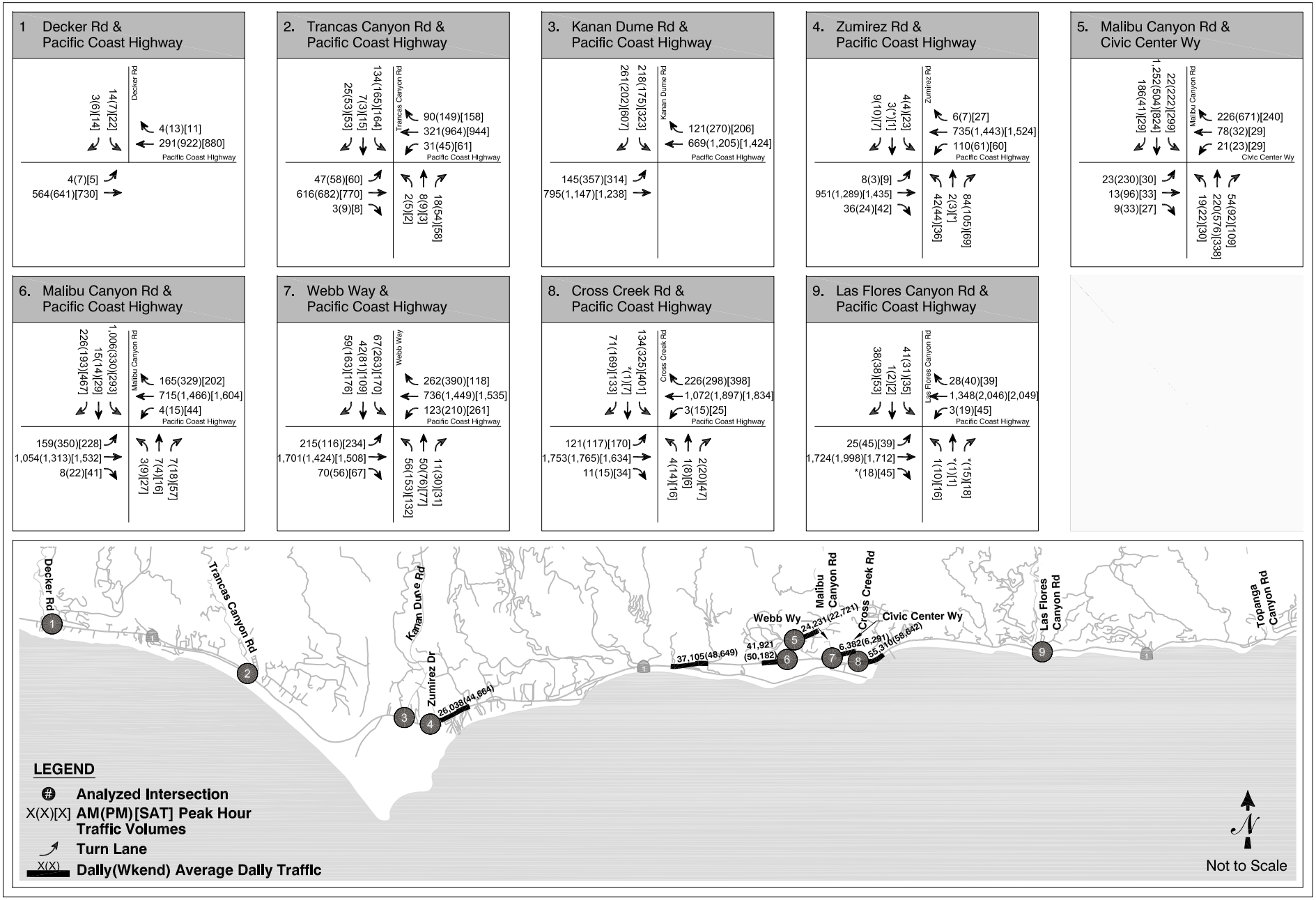
FIGURE 8



FEHR PEERS

OPENING YEAR (2014) PLUS PROJECT PEAK HOUR TRAFFIC VOLUMES

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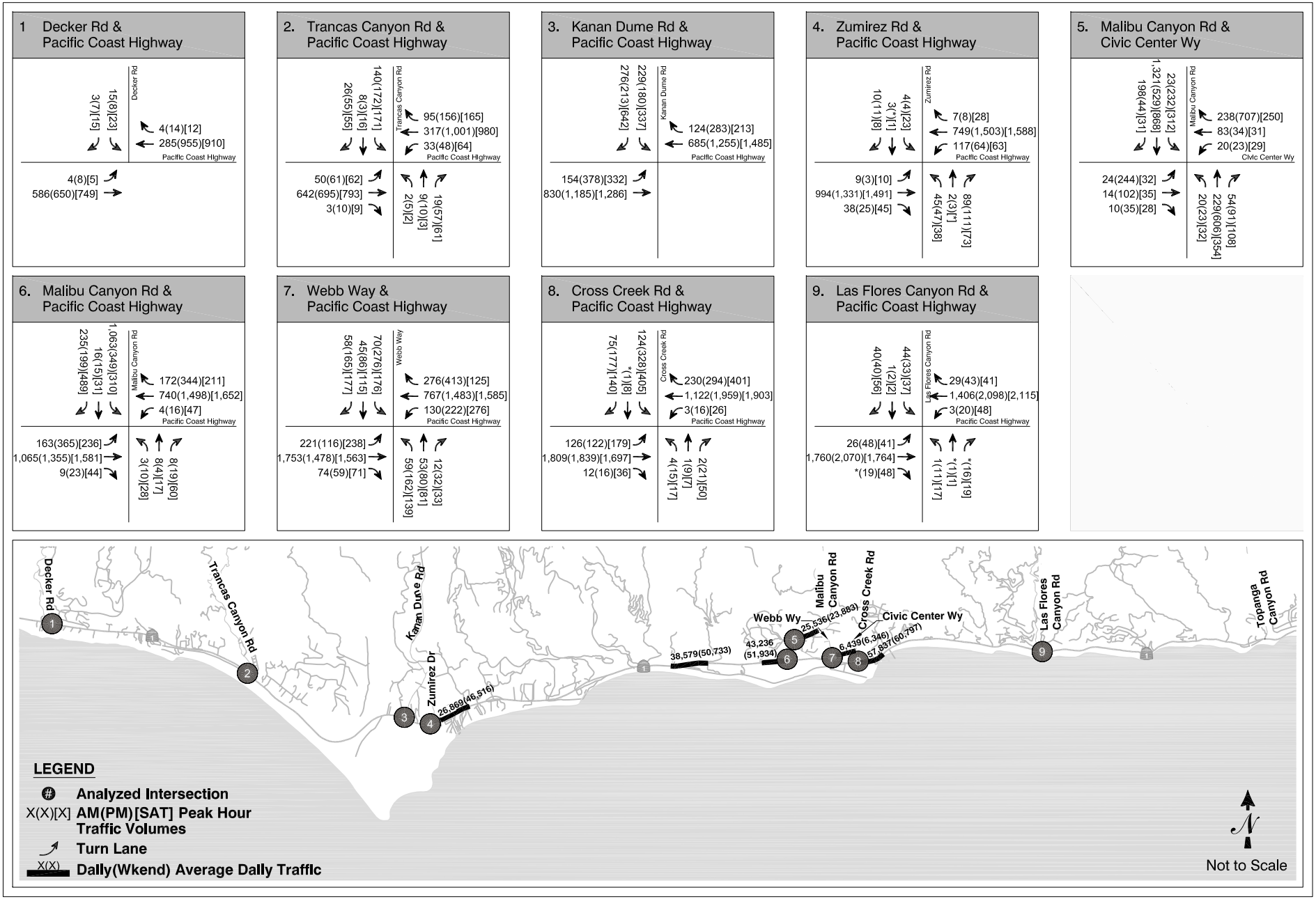
FIGURE 9



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CUMULATIVE YEAR (2030) PEAK HOUR TRAFFIC VOLUMES

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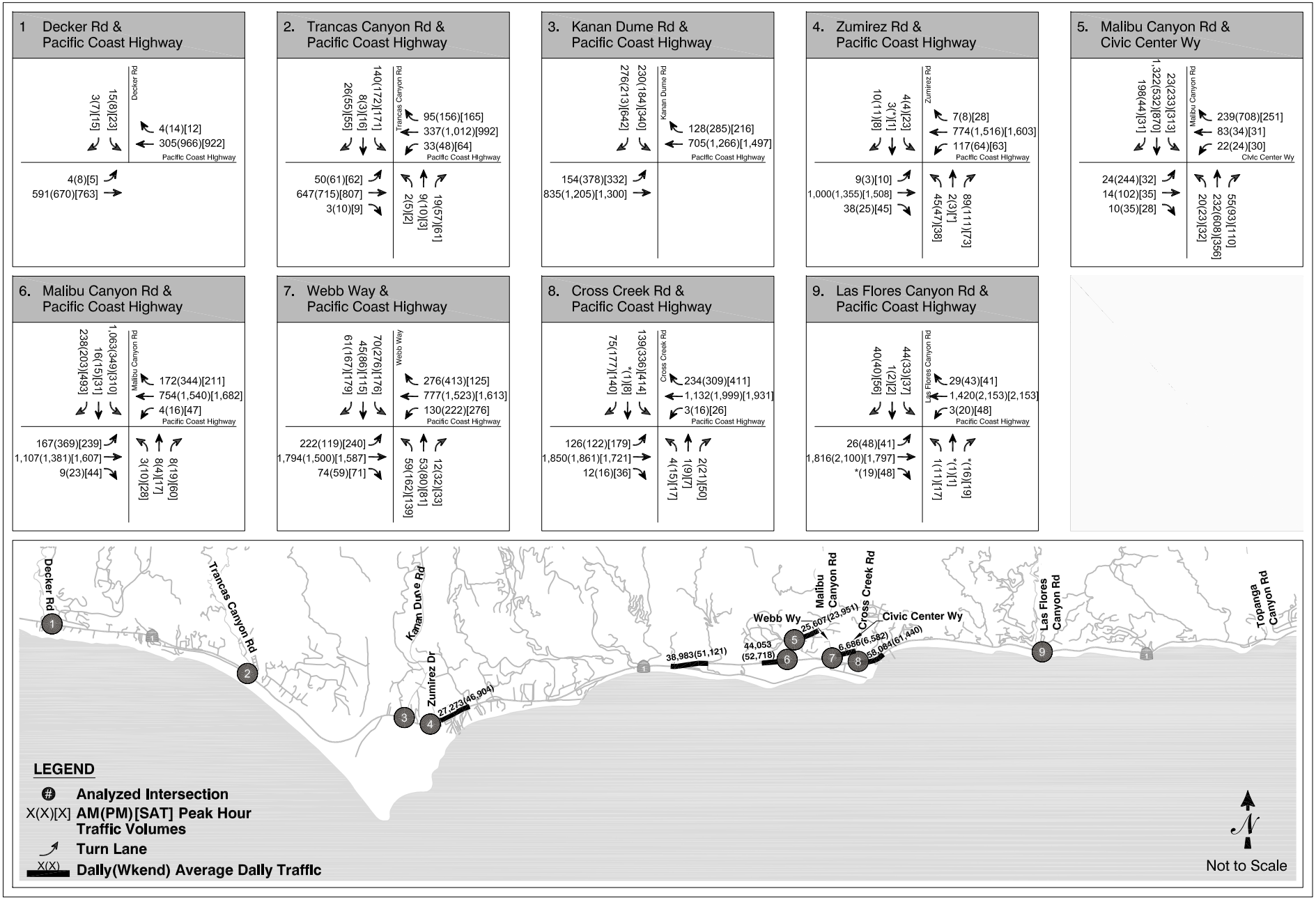
FIGURE 10



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CUMULATIVE YEAR (2030) PLUS PROJECT PEAK HOUR TRAFFIC VOLUMES

Apr 22, 2013 JS
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FIGURE 11

4. Level of Service and Significant Impact Analysis

This section presents an analysis of the existing and future, without and with project conditions to determine the potential for traffic impacts of the proposed project on the operating conditions of the surrounding street system. The traffic impact analysis compares the projected LOS at each study intersection under Existing, Opening Year, and Cumulative Year plus Project conditions to the Existing, Opening Year and Cumulative Year base conditions to estimate the incremental increase in the V/C ratio caused by the proposed project. This provides the information needed to assess the potential impact of the project using significance criteria established by the City of Malibu. Detailed LOS calculations for the proposed project for Existing plus Project, Opening Year (2014) plus Project, and Cumulative Year (2030) plus Project are included in Appendix D.

Criteria for Determination of Significant Traffic Impact

All study intersections are in the City of Malibu. Significance criteria established by the City of Malibu was used to assess the potential for significant project impacts at the study intersections.

The City of Malibu traffic impact study guidelines provides significant impact criteria for intersections operating at LOS C or worse before the addition of project traffic. Intersections operating at LOS A or B prior to the addition of project traffic are not considered significantly impacted regardless of the project-related increase in V/C ratio. The following summarizes the impact criteria:

LOS	***Pre-Project V/C Ratio***	***Increase in V/C***
C	0.71-0.80	0.04 or more
D	0.81-0.90	0.02 or more
E or F	0.91 or more	0.01 or more

Level of Service Analysis

Existing plus Project Traffic Conditions

The resulting Existing plus Project peak period traffic volumes, illustrated in Figure 6, were analyzed to determine the projected existing operating conditions with the addition of the proposed project traffic. The results of the Existing plus Project analysis are presented in Table 5. As indicated in the table, the following intersections are projected to operate at an unacceptable LOS D or worse during one or more peak periods:

TABLE 5
EXISTING PLUS PROJECT INTERSECTION LEVEL OF SERVICE ANALYSIS

Intersection	Jurisdiction	Peak Hour	Existing Base		Existing plus Project		Project Increase	Significant Project
			V/C or Delay	LOS	V/C or Delay	LOS	in V/C	Impact
1. Decker Canyon Road		**AM**	11.5 s	B	11.7 s	B	0.2 s	NO
Pacific Coast Highway		**PM**	16.2 s	C	16.5 s	C	0.3 s	NO
	Malibu	**SAT**	17.5 s	C	17.8 s	C	0.3 s	NO
2. Trancas Canyon Road		**AM**	0.319	A	0.321	A	0.002	NO
Pacific Coast Highway		**PM**	0.480	A	0.483	A	0.003	NO
	Malibu	**SAT**	0.468	A	0.472	A	0.004	NO
3. Kanan Dume Road		**AM**	0.394	A	0.400	A	0.006	NO
Pacific Coast Highway		**PM**	0.633	B	0.638	B	0.005	NO
	Malibu	**SAT**	0.799	C	0.802	D	0.003	NO
4. Zumirez Road		**AM**	0.406	A	0.408	A	0.002	NO
Pacific Coast Highway		**PM**	0.484	A	0.488	A	0.004	NO
	Malibu	**SAT**	0.500	A	0.505	A	0.005	NO
5. Malibu Canyon Road		**AM**	0.503	A	0.503	A	0.000	NO
Civic Center Drive		**PM**	0.472	A	0.474	A	0.002	NO
	Malibu	**SAT**	0.345	A	0.346	A	0.001	NO
6. Malibu Canyon Road		**AM**	0.674	B	0.687	B	0.013	NO
Pacific Coast Highway		**PM**	0.671	B	0.686	B	0.015	NO
	Malibu	**SAT**	0.807	D	0.820	D	0.013	NO
7. Webb Way		**AM**	0.517	A	0.525	A	0.008	NO
Pacific Coast Highway		**PM**	0.668	B	0.682	B	0.014	NO
	Malibu	**SAT**	0.674	B	0.684	B	0.010	NO
8. Cross Creek Road		**AM**	0.594	A	0.611	B	0.017	NO
Pacific Coast Highway		**PM**	0.781	C	0.801	D	0.020	NO
	Malibu	**SAT**	0.809	D	0.824	D	0.015	NO
9. Las Flores Canyon Road		**AM**	0.581	A	0.598	A	0.017	NO
Pacific Coast Highway		**PM**	0.681	B	0.699	B	0.018	NO
	Malibu	**SAT**	0.668	B	0.679	B	0.011	NO

Note: Intersections analyzed using Intersection Capacity Utilization (ICU) methodology unless otherwise noted.

[a] Intersection is 2-way stop-controlled. Analysis conducted using *Highway Capacity Manual* stop-controlled methodology. Average vehicular delay in seconds is reported for the stop-controlled approach.

- Kanan Dume Road & Pacific Coast Highway (Saturday peak hour)
- Malibu Canyon Road & Pacific Coast Highway (Saturday peak hour)
- Cross Creek Road & Pacific Coast Highway (PM and Saturday peak hours)

Existing plus Project Significant Impact Analysis

To determine whether significant impacts would occur at the study intersections, the Existing plus Project operating conditions were compared to the existing operating conditions. As shown in Table 5, using the City of Malibu criteria for determination of significant impacts, under Existing plus Project conditions, the proposed project would result in impacts at the following intersection:

- Cross Creek Road & Pacific Coast Highway (PM peak period)

Opening Year Base (Year 2014) Traffic Conditions

Opening Year (2014) base traffic projections presented in Figure 8 were analyzed to establish Opening Year (2014) base operating conditions without the project.

Opening Year (2014) plus Project Traffic Conditions

The resulting 2014 opening year plus project peak period traffic volumes, illustrated in Figure 9, were analyzed to determine the projected future operating conditions with the addition of the proposed project traffic. The results of the opening year plus project analysis are presented in Table 6. As indicated in the table, the following intersections operate at an unacceptable LOS D or worse during one or more peak periods:

- Kanan Dume Road & Pacific Coast Highway (Saturday peak hour)
- Malibu Canyon Road & Pacific Coast Highway (Saturday peak hour)
- Webb Way & Pacific Coast Highway (Saturday peak hour)
- Cross Creek Road & Pacific Coast Highway (PM and Saturday peak hours)

TABLE 6
OPENING YEAR (2014) PLUS PROJECT INTERSECTION LEVEL OF SERVICE ANALYSIS

Intersection	Jurisdiction	Peak Hour	Cumulative Base		Cumulative plus Project		Project Increase	Significant Project
			V/C or Delay	LOS	V/C or Delay	LOS	in V/C	Impact
1. Decker Canyon Road		**AM**	12.4 s	B	12.6 s	B	0.2 s	NO
Pacific Coast Highway		**PM**	20.2 s	C	20.6 s	C	0.4 s	NO
	Malibu	**SAT**	23.1 s	C	23.7 s	C	0.6 s	NO
2. Trancas Canyon Road		**AM**	0.366	A	0.367	A	0.001	NO
Pacific Coast Highway		**PM**	0.576	A	0.580	A	0.004	NO
	Malibu	**SAT**	0.575	A	0.578	A	0.003	NO
3. Kanan Dume Road		**AM**	0.419	A	0.426	A	0.007	NO
Pacific Coast Highway		**PM**	0.705	C	0.711	C	0.006	NO
	Malibu	**SAT**	0.870	D	0.874	D	0.004	NO
4. Zumirez Road		**AM**	0.450	A	0.452	A	0.002	NO
Pacific Coast Highway		**PM**	0.551	A	0.555	A	0.004	NO
	Malibu	**SAT**	0.578	A	0.583	A	0.005	NO
5. Malibu Canyon Road		**AM**	0.515	A	0.515	A	0.000	NO
Civic Center Drive		**PM**	0.500	A	0.502	A	0.002	NO
	Malibu	**SAT**	0.380	A	0.382	A	0.002	NO
6. Malibu Canyon Road		**AM**	0.732	C	0.745	C	0.013	NO
Pacific Coast Highway		**PM**	0.745	C	0.760	C	0.015	NO
	Malibu	**SAT**	0.906	E	0.918	E	0.012	**YES**
7. Webb Way		**AM**	0.549	A	0.557	A	0.008	NO
Pacific Coast Highway		**PM**	0.776	C	0.791	C	0.015	NO
	Malibu	**SAT**	0.846	D	0.856	D	0.010	NO
8. Cross Creek Road		**AM**	0.634	B	0.653	B	0.019	NO
Pacific Coast Highway		**PM**	0.916	E	0.936	E	0.020	**YES**
	Malibu	**SAT**	1.003	F	1.018	F	0.015	**YES**
9. Las Flores Canyon Road		**AM**	0.624	B	0.642	B	0.018	NO
Pacific Coast Highway		**PM**	0.750	C	0.767	C	0.017	NO
	Malibu	**SAT**	0.768	C	0.780	C	0.012	NO

Note: Intersections analyzed using Intersection Capacity Utilization (ICU) methodology unless otherwise noted.

[a] Intersection is 2-way stop-controlled. Analysis conducted using *Highway Capacity Manual* stop-controlled methodology. Average vehicular delay in seconds is reported for the stop-controlled approach.

Opening Year (2014) plus Project Significant Impact Analysis

To determine whether significant impacts would occur at the study intersections, the 2014 plus project operating conditions were compared to the 2014 base operating conditions. As shown in Table 6, using the City of Malibu criteria for determination of significant impacts, under Cumulative plus Project conditions, the proposed project would result in impacts at the following intersections:

- Malibu Canyon Road & Pacific Coast Highway (Saturday peak hour)
- Cross Creek Road & Pacific Coast Highway (PM and Saturday peak hours)

Cumulative Year (2030) Traffic Conditions

Cumulative (year 2030) base traffic projections presented in Figure 10 were analyzed to establish cumulative (year 2030) base operating conditions without the project.

Cumulative Year (2030) plus Project Traffic Conditions

The resulting 2030 cumulative year plus project peak period traffic volumes, illustrated in Figure 11, were analyzed to determine the projected future operating conditions with the addition of the proposed project traffic. The results of the cumulative year plus project analysis are presented in Table 7. As indicated in the table, the following intersections operate at an unacceptable LOS D or worse during one or more peak periods:

- Decker Road & Pacific Coast Highway (Saturday peak hour)
- Kanan Dume Road & Pacific Coast Highway (Saturday peak hour)
- Malibu Canyon Road & Pacific Coast Highway (PM and Saturday peak hours)
- Webb Way & Pacific Coast Highway (PM and Saturday peak hours)
- Cross Creek Road & Pacific Coast Highway (PM and Saturday peak hours)
- Las Flores Canyon Road & Pacific Coast Highway (PM and Saturday peak hours)

TABLE 7
CUMULATIVE YEAR (2030) PLUS PROJECT INTERSECTION LEVEL OF SERVICE ANALYSIS

Intersection	Jurisdiction	Peak Hour	Cumulative Base		Cumulative plus Project		Project Increase	Significant Project
			V/C or Delay	LOS	V/C or Delay	LOS	in V/C	Impact
1. Decker Canyon Road		**AM**	12.7 s	B	13.0 s	B	0.3 s	NO
Pacific Coast Highway		**PM**	21.6 s	C	22.0 s	C	0.4 s	NO
	Malibu	**SAT**	25.0 s	D	25.6 s	D	0.6 s	NO
2. Trancas Canyon Road		**AM**	0.383	A	0.384	A	0.001	NO
Pacific Coast Highway		**PM**	0.603	B	0.606	B	0.003	NO
	Malibu	**SAT**	0.599	A	0.603	B	0.004	NO
3. Kanan Dume Road		**AM**	0.440	A	0.446	A	0.006	NO
Pacific Coast Highway		**PM**	0.741	C	0.746	C	0.005	NO
	Malibu	**SAT**	0.916	E	0.920	E	0.004	NO
4. Zumirez Road		**AM**	0.473	A	0.475	A	0.002	NO
Pacific Coast Highway		**PM**	0.576	A	0.580	A	0.004	NO
	Malibu	**SAT**	0.605	B	0.610	B	0.005	NO
5. Malibu Canyon Road		**AM**	0.541	A	0.541	A	0.000	NO
Civic Center Drive		**PM**	0.525	A	0.527	A	0.002	NO
	Malibu	**SAT**	0.397	A	0.398	A	0.001	NO
6. Malibu Canyon Road		**AM**	0.770	C	0.783	C	0.013	NO
Pacific Coast Highway		**PM**	0.783	C	0.797	C	0.014	NO
	Malibu	**SAT**	0.951	E	0.964	E	0.013	**YES**
7. Webb Way		**AM**	0.577	A	0.586	A	0.009	NO
Pacific Coast Highway		**PM**	0.813	D	0.827	D	0.014	NO
	Malibu	**SAT**	0.882	D	0.892	D	0.010	NO
8. Cross Creek Road		**AM**	0.667	B	0.685	B	0.018	NO
Pacific Coast Highway		**PM**	0.959	E	0.979	E	0.020	**YES**
	Malibu	**SAT**	1.048	F	1.064	F	0.016	**YES**
9. Las Flores Canyon Road		**AM**	0.656	B	0.674	B	0.018	NO
Pacific Coast Highway		**PM**	0.790	C	0.807	D	0.017	NO
	Malibu	**SAT**	0.807	D	0.819	D	0.012	NO

Note: Intersections analyzed using Intersection Capacity Utilization (ICU) methodology unless otherwise noted.

[a] Intersection is 2-way stop-controlled. Analysis conducted using *Highway Capacity Manual* stop-controlled methodology. Average vehicular delay in seconds is reported for the stop-controlled approach.

Cumulative Year (2030) plus Project Significant Impact Analysis

To determine whether significant impacts would occur at the study intersections, the 2030 plus project operating conditions were compared to the 2030 base operating conditions. As shown in Table 7, using the City of Malibu criteria for determination of significant impacts, under Cumulative plus Project conditions, the proposed project would result in impacts at the following intersections:

- Malibu Canyon Road & Pacific Coast Highway (Saturday peak hour)
- Cross Creek Road & Pacific Coast Highway (PM and Saturday peak hours)

Intersection Mitigation Measures

Mitigation measures have been identified for each of the intersections potentially impacted by the addition of project traffic from the proposed project. The development of mitigation measures was limited to those that were considered physically feasible, and could be implemented without the acquisition of additional right-of-way. Figures illustrating proposed mitigation measures are included in Appendix E of this report.

Impact 1: Malibu Canyon Road & Pacific Coast Highway

The impact of project traffic on the intersection of Malibu Canyon Road & Pacific Coast Highway could be mitigated by changing the southbound left-turn/through lane to a left-turn/through/right-turn lane. Sufficient right-of way exists on Pacific Coast Highway to allow for a second receiving lane on this roadway. With implementation of the aforementioned physical improvement, the impact at this intersection would be reduced to less than significant.

Impact 2: Cross Creek Road & Pacific Coast Highway

The impact of project traffic on the intersection of Cross Creek Road & Pacific Coast Highway could be mitigated by the addition of a westbound right-turn lane on Pacific Coast Highway. Sufficient right-of-way exists on Pacific Coast Highway to accommodate the proposed westbound right-turn lane at Cross Creek Road. The existing roadway, however, is not centered within the existing right-of-way. In order to implement a new westbound right-turn lane at this location, the roadway centerline must be shifted to the south as Pacific Coast Highway passes through the Cross Creek Road intersection. The mitigation would result in the loss of approximately 12 on-street parking spaces on the shoulder of the south side of Pacific Coast Highway west of Cross Creek Road. It would also result in a substandard 11-foot left-turn lane on Pacific Coast Highway east of Cross Creek Road, which would require Caltrans approval. If Caltrans does not approve of non-standard narrower lane widths, then roadway widening on the south side of Pacific Coast Highway on the approach and departure legs would allow the standard width lanes for this mitigation measure. With implementation of the aforementioned physical improvement, the impact at this intersection would be reduced to less than significant.

5. Roadway Segment Analysis

This section presents an analysis of the existing and future, without and with project conditions of roadway segments to determine the potential for traffic impacts of the proposed project on the operating conditions of the surrounding roadway segments. The traffic impact analysis compares the projected LOS at each study segments under Existing, Opening Year, and Cumulative Year plus Project conditions to the Existing, Opening Year and Cumulative Year base conditions to estimate the incremental increase in the V/C ratio caused by the proposed project. This provides the information needed to assess the potential impact of the project using significance criteria established by the City of Malibu.

Existing Conditions

Twenty-four hour roadway segment counts were collected along the following six roadway segments during a summer Thursday and Saturday in 2012:

1. Pacific Coast Highway east of Paradise Cove Road
2. Pacific Coast Highway east of Corral Canyon Road
3. Pacific Coast Highway between Malibu Canyon Road and John Tyler Drive
4. Pacific Coast Highway east of Cross Creek Road
5. Malibu Canyon Road north of Civic Center Way
6. Civic Center Way between Webb Way and Cross Creek Road

The roadway segments along Pacific Coast Highway operate as a 4-lane divided arterial, with a daily capacity of 37,400 vehicles, per Highway Capacity Manual (HCM 2000) guidelines. The roadway segments on Malibu Canyon Road and Civic Center Way operate as a two-lane arterial with a roadway capacity of 18,700 vehicles. Table 8 presents existing daily roadway segment volumes and segment LOS. As shown in Table 8, under existing conditions, the following roadway segments operate at LOS D or worse during one or more days or peak hours:

- Pacific Coast Highway east of Paradise Cove Road (Saturday mid-day and daily)
- Pacific Coast Highway east of Corral Canyon Road (weekday daily; Saturday mid-day and daily)
- Pacific Coast Highway between Malibu Canyon Road and John Tyler Drive (weekday daily; Saturday mid-day and daily)
- Pacific Coast Highway east of Cross Creek Road (weekday PM and daily; Saturday mid-day and daily)
- Malibu Canyon Road north of Civic Center Way (weekday AM, PM and daily; Saturday mid-day and daily)

TABLE 8
EXISTING ROADWAY SEGMENT LEVEL OF SERVICE

Roadway Segment	Class	Hourly Capacity	Daily Capacity	Weekday									Saturday					
				AM			PM			Daily			Mid-Day Peak			Daily		
				Volume	V/C	LOS	Volume	V/C	LOS	Volume	V/C	LOS	Volume	V/C	LOS	Volume	V/C	LOS
Pacific Coast Highway																		
east of Paradise Cove	4 Lane Divided Arterial	3,740	37,400	1,020	0.27	A	2,627	0.70	C	20,658	0.55	A	3,135	0.84	D	37,468	1.00	F
east of Corral Canyon Road	4 Lane Divided Arterial	3,740	37,400	1,978	0.53	A	2,878	0.77	C	31,401	0.84	D	3,280	0.88	D	41,337	1.11	F
Malibu Canyon Road to John Tyler Drive	4 Lane Divided Arterial	3,740	37,400	2,037	0.54	A	2,969	0.79	C	35,658	0.95	E	3,423	0.92	E	42,395	1.13	F
east of Cross Creek Road	4 Lane Divided Arterial	3,740	37,400	2,856	0.76	C	3,685	0.99	E	46,392	1.24	F	3,552	0.95	E	46,790	1.25	F
Malibu Canyon Road																		
north of Civic Center Way	2 Lane Arterial	1,870	18,700	1,861	1.00	E	2,073	1.11	F	23,009	1.23	F	1,678	0.90	D	20,568	1.10	F
Civic Center Way																		
Webb Way to Cross Creek Road	2 Lane Arterial	1,870	18,700	351	0.19	A	449	0.24	A	5,082	0.27	A	366	0.20	A	4,862	0.26	A

Traffic Projections

Project Traffic Volumes

Vehicular traffic generation, distribution, and assignment are described in Chapter 3 of this report. Daily roadway segment project trips were assigned in the same manner as intersection project trips.

Future Background Traffic

Roadway segment volumes for the Opening Year (2014) and Cumulative Year (2030) baseline scenarios were developed using the same approach discussed in Chapter 3. A growth rate of 1.5% per year (compounded) was applied to traffic counts to develop Opening Year (2014) growth, and a growth rate of 0.48% per year (compounded) was applied to traffic counts to Cumulative Year (2030) growth. Additionally, daily traffic generated from related projects was applied to the roadway segments to develop the Opening Year (2014) and Cumulative Year (2030) traffic volumes.

Criteria for Determination of Significant Traffic Impact

The City of Malibu traffic impact study guidelines provide significance criteria for roadway segments. A roadway segment is considered significantly impacted if it "increases the volume-to-capacity (v/c) ratio on a roadway segment operating at an unacceptable level (LOS D, E, or F) by 0.05 or more, summarized below:

Pre- Project LOS	***Project-Related Increase in V/C***
D	0.05
E	0.05
F	0.05

Level of Service Analysis

Existing plus Project Traffic Conditions

The resulting Existing plus Project daily roadway segment traffic volumes, illustrated in Figure 6, were analyzed to determine the projected existing operating conditions with the addition of the proposed project traffic. The results of the Existing plus Project analysis are presented in Table 9. As indicated in the table, the following roadway segments are projected to operate at an unacceptable LOS D or worse during one or more peak hours or days:

- Pacific Coast Highway east of Paradise Cove Road (Saturday mid-day and daily)
- Pacific Coast Highway east of Corral Canyon Road (Weekday daily; Saturday mid-day and daily)
- Pacific Coast Highway between Malibu Canyon Road and John Tyler Drive (Weekday PM and daily; Saturday mid-day and daily)
- Pacific Coast Highway east of Cross Creek Road (Weekday PM and daily; Saturday mid-day and daily)

TABLE 9
EXISTING ROADWAY SEGMENT LEVEL OF SERVICE

				Weekday																						Saturday													
				AM										PM									Daily							Mid-Day Peak											
				Existing			Existing plus Project						Existing			Existing plus Project						Existing			Existing plus Project							Existing			Existing plus Project					
Roadway Segment	Class	Hourly Capacity	Daily Capacity	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?
Pacific Coast Highway																																														
east of Paradise Cove	4 Lane Divided Arterial	3,740	37,400	1,020	0.273	A	31	1051	0.281	A	0.008	NO	2,627	0.702	C	37	2,664	0.712	C	0.010	NO	20,658	0.552	A	404	21,062	0.563	A	0.011	NO	3,135	0.838	D	32	3,167	0.847	D	0.009	NO	37,468	1.00	F	388	37,856	1.012	F	0.010	NO
east of Corral Canyon Road	4 Lane Divided Arterial	3,740	37,400	1,978	0.529	A	31	2009	0.537	A	0.008	NO	2,878	0.770	C	37	2,915	0.779	C	0.010	NO	31,401	0.840	D	404	31,805	0.850	D	0.011	NO	3,280	0.877	D	32	3,312	0.886	D	0.009	NO	41,337	1.11	F	388	41,725	1.116	F	0.010	NO
Malibu Canyon Road to John Tyler Drive	4 Lane Divided Arterial	3,740	37,400	2,037	0.545	A	63	2100	0.561	A	0.017	NO	2,969	0.794	C	76	3,045	0.814	D	0.020	NO	35,658	0.953	E	817	36,475	0.975	E	0.022	NO	3,423	0.915	E	60	3,483	0.931	E	0.016	NO	42,395	1.13	F	784	43,179	1.155	F	0.021	NO
east of Cross Creek Road	4 Lane Divided Arterial	3,740	37,400	2,856	0.764	C	70	2926	0.782	C	0.019	NO	3,685	0.985	E	85	3,770	1.008	F	0.023	NO	46,392	1.240	F	247	46,639	1.247	F	0.007	NO	670	0.179	A	71	741	0.198	A	0.019	NO	46,790	1.25	F	643	47,433	1.268	F	0.017	NO
Malibu Canyon Road																																														
north of Civic Center Way	2 Lane Arterial	1,870	18,700	1,861	0.995	E	4	1865	0.997	E	0.002	NO	2,073	1.109	F	7	2,080	1.112	F	0.004	NO	23,009	1.230	F	71	23,080	1.234	F	0.004	NO	1,678	0.897	D	6	1,684	0.901	E	0.003	NO	20,568	1.10	F	68	20,636	1.104	F	0.004	NO
Civic Center Way																																														
Webb Way to Cross Creek Road	2 Lane Arterial	1,870	18,700	351	0.188	A	19	370	0.198	A	0.010	NO	449	0.240	A	23	472	0.252	A	0.012	NO	5,082	0.272	A	247	5,329	0.285	A	0.013	NO	366	0.196	A	19	385	0.206	A	0.010	NO	4,862	0.26	A	236	5,098	0.273	A	0.013	NO

- Malibu Canyon Road north of Civic Center Way (Weekday AM, PM and daily; and Saturday mid-day and daily)

Existing plus Project Significant Impact Analysis

To determine whether significant impacts would occur at the study roadway segments, the Existing plus Project operating conditions were compared to the existing operating conditions. As shown in Table 9, using the City of Malibu criteria for determination of significant impacts, under Existing plus Project conditions, the proposed project would not result in impacts at any study roadway segments.

Opening Year Base (Year 2014) Traffic Conditions

Opening Year (2014) base traffic projections presented in Figure 8 were analyzed to establish Opening Year (2014) base operating conditions without the project.

Opening Year (2014) plus Project Traffic Conditions

The resulting 2014 opening year plus project daily traffic volumes, illustrated in Figure 9, were analyzed to determine the projected future operating conditions with the addition of the proposed project traffic. The results of the opening year plus project analysis are presented in Table 10. As indicated in the table, the following intersections operate at an unacceptable LOS D or worse during one or more peak hours or days:

- Pacific Coast Highway east of Paradise Cove Road (weekday PM and daily; Saturday mid-day and daily)
- Pacific Coast Highway east of Corral Canyon Road (weekday PM and daily; Saturday mid-day and daily)
- Pacific Coast Highway between Malibu Canyon Road and John Tyler Drive (weekday PM and daily; Saturday mid-day and daily)
- Pacific Coast Highway east of Cross Creek Road (weekday AM, PM and daily; Saturday mid-day and daily)
- Malibu Canyon Road north of Civic Center Way (weekday AM, PM and daily; Saturday mid-day and daily)

Opening Year (2014) plus Project Significant Impact Analysis

To determine whether significant impacts would occur at the study roadway segments, the Opening Year plus Project operating conditions were compared to the Opening Year no Project operating conditions. As shown in Table 10, using the City of Malibu criteria for determination of significant impacts, under Existing plus Project conditions, the proposed project would not result in impacts at any study roadway segments.

Cumulative Year (2030) Traffic Conditions

Cumulative (year 2030) base traffic projections presented in Figure 10 were analyzed to establish cumulative (year 2030) base operating conditions without the project.

TABLE 10
OPENING YEAR (2014) ROADWAY SEGMENT LEVEL OF SERVICE

				Weekday																												Saturday													
				AM								PM								Daily								Mid-Day Peak								Daily							
				Opening Year (2014)			Opening Year (2014) plus Project					Opening Year (2014)			Opening Year (2014) plus Project					Opening Year (2014)			Opening Year (2014) plus Project					Opening Year (2014)			Opening Year (2014) plus Project					Opening Year (2014)			Opening Year (2014) plus Project				
Roadway Segment	Class	Hourly Capacity	Daily Capacity	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?
Pacific Coast Highway																																													
east of Paradise Cove	4 Lane Divided Arterial	3,740	37,400	1,199	0.321	A	31	1,230	0.329	A	0.008	NO	3,015	0.806	D	37	3,052	0.816	D	0.010	NO	25,634	0.685	B	404	26,038	0.696	B	0.011	NO	3,602	0.963	E	32	3,634	0.972	E	0.009	NO	44,276	1.18	F	388	44,664	1.194	F	0.010	NO
east of Corral Canyon Road	4 Lane Divided Arterial	3,740	37,400	2,186	0.584	A	31	2,217	0.593	A	0.008	NO	3,274	0.875	D	37	3,311	0.885	D	0.010	NO	36,701	0.981	E	404	37,105	0.992	E	0.011	NO	3,751	1.003	F	32	3,783	1.011	F	0.009	NO	48,261	1.29	F	388	48,649	1.301	F	0.010	NO
Malibu Canyon Road to John Tyler Drive	4 Lane Divided Arterial	3,740	37,400	2,246	0.601	B	63	2,309	0.617	B	0.017	NO	3,360	0.898	D	76	3,436	0.919	E	0.020	NO	41,104	1.099	F	817	41,921	1.121	F	0.022	NO	3,988	1.066	F	60	4,048	1.082	F	0.016	NO	49,398	1.32	F	784	50,182	1.342	F	0.021	NO
east of Cross Creek Road	4 Lane Divided Arterial	3,740	37,400	3,137	0.839	D	70	3,207	0.857	D	0.019	NO	4,197	1.122	F	85	4,282	1.145	F	0.023	NO	55,063	1.472	F	247	55,310	1.479	F	0.007	NO	1,300	0.348	A	71	1,371	0.367	A	0.019	NO	57,999	1.55	F	643	58,642	1.568	F	0.017	NO
Malibu Canyon Road																																													
north of Civic Center Way	2 Lane Arterial	1,870	18,700	1,967	1.052	F	4	1,971	1.054	F	0.002	NO	2,240	1.198	F	7	2,247	1.202	F	0.004	NO	24,160	1.292	F	71	24,231	1.296	F	0.004	NO	1,906	1.019	F	6	1,912	1.022	F	0.003	NO	22,653	1.21	F	68	22,721	1.215	F	0.004	NO
Civic Center Way																																													
Webb Way to Cross Creek Road	2 Lane Arterial	1,870	18,700	393	0.210	A	19	412	0.220	A	0.010	NO	587	0.314	A	23	610	0.326	A	0.012	NO	6,135	0.328	A	247	6,382	0.341	A	0.013	NO	523	0.280	A	19	542	0.290	A	0.010	NO	6,055	0.32	A	236	6,291	0.336	A	0.013	NO

Cumulative Year (2030) plus Project Traffic Conditions

The resulting 2030 cumulative year plus project peak period traffic volumes, illustrated in Figure 11, were analyzed to determine the projected future operating conditions with the addition of the proposed project traffic. The results of the cumulative year plus project analysis are presented in Table 11. As indicated in the table, the following intersections operate at an unacceptable LOS D or worse during one or more peak periods or days:

- Pacific Coast Highway east of Paradise Cove Road (weekday PM daily; Saturday mid-day and daily)
- Pacific Coast Highway east of Corral Canyon Road (weekday PM and daily; Saturday mid-day and daily)
- Pacific Coast Highway between Malibu Canyon Road and John Tyler Drive (weekday PM and daily; Saturday mid-day and daily)
- Pacific Coast Highway east of Cross Creek Road (weekday AM, PM and daily; Saturday mid-day and daily)
- Malibu Canyon Road north of Civic Center Way (weekday AM, PM and daily; Saturday mid-day and daily)

Cumulative Year (2030) plus Project Significant Impact Analysis

To determine whether significant impacts would occur at the study roadway segments, the Cumulative Year plus Project operating conditions were compared to the Cumulative Year no Project operating conditions. As shown in Table 11, using the City of Malibu criteria for determination of significant impacts, under Existing plus Project conditions, the proposed project would not result in impacts at any study roadway segments.

Roadway Segment Mitigation Measures

There are no significant impacts along study roadway segments. As such, no mitigation measures were considered as part of this analysis.

TABLE 11
CUMULATIVE YEAR (2030) ROADWAY SEGMENT LEVEL OF SERVICE

				Weekday																										Saturday													
				AM									PM								Daily									Mid-Day Peak								Daily					
				Cumulative Year (2030)			Cumulative Year (2030) plus Project						Cumulative Year (2030)			Cumulative Year (2030) plus Project						Cumulative Year (2030)			Cumulative Year (2030) plus Project						Cumulative Year (2030)						Cumulative Year (2030)			Cumulative Year (2030) plus Project					
Roadway Segment	Class	Hourly Capacity	Daily Capacity	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?	Volume	V/C	LOS	Project Trips	Volume	V/C	LOS	ΔV/C	Impact?
Pacific Coast Highway																																													
east of Paradise Cove	4 Lane Divided Arterial	3,740	37,400	1,260	0.337	A	31	1,291	0.345	A	0.008	NO	3172	0.848	D	37	3,209	0.858	D	0.010	NO	26,869	0.718	C	404	27,273	0.729	C	0.011	NO	3,789	1.013	F	32	3,821	1.022	F	0.009	NO	46,516	1.24	F	388	46,904	1.254	F	0.010	NO
east of Corral Canyon Road	4 Lane Divided Arterial	3,740	37,400	2,304	0.616	B	31	2,335	0.624	B	0.008	NO	3446	0.921	E	37	3,483	0.931	E	0.010	NO	38,579	1.032	F	404	38,983	1.042	F	0.011	NO	3,947	1.055	F	32	3,979	1.064	F	0.009	NO	50,733	1.36	F	388	51,121	1.367	F	0.010	NO
Malibu Canyon Road to John Tyler Drive	4 Lane Divided Arterial	3,740	37,400	2,367	0.633	B	63	2,430	0.650	B	0.017	NO	3537	0.946	E	76	3,613	0.966	E	0.020	NO	43,236	1.156	F	817	44,053	1.178	F	0.022	NO	4,193	1.121	F	60	4,253	1.137	F	0.016	NO	51,934	1.39	F	784	52,718	1.410	F	0.021	NO
east of Cross Creek Road	4 Lane Divided Arterial	3,740	37,400	3,308	0.884	D	70	3,378	0.903	E	0.019	NO	4418	1.181	F	85	4,503	1.204	F	0.023	NO	57,837	1.546	F	247	58,084	1.553	F	0.007	NO	1,340	0.358	A	71	1,411	0.377	A	0.019	NO	60,797	1.63	F	643	61,440	1.643	F	0.017	NO
Malibu Canyon Road																																													
north of Civic Center Way	2 Lane Arterial	1,870	18,700	2,078	1.111	F	4	2,082	1.113	F	0.002	NO	2364	1.264	F	7	2,371	1.268	F	0.004	NO	25,536	1.366	F	71	25,607	1.369	F	0.004	NO	2,006	1.073	F	6	2,012	1.076	F	0.003	NO	23,883	1.28	F	68	23,951	1.281	F	0.004	NO
Civic Center Way																																													
Webb Way to Cross Creek Road	2 Lane Arterial	1,870	18,700	414	0.221	A	19	433	0.232	A	0.010	NO	613	0.328	A	23	636	0.340	A	0.012	NO	6,439	0.344	A	247	6,686	0.358	A	0.013	NO	545	0.291	A	19	564	0.302	A	0.010	NO	6,346	0.34	A	236	6,582	0.352	A	0.013	NO

6. Transit System Impact Analysis

This chapter discusses impacts related to the transit system. Potential impacts could include disruptions to existing transit service, interference with planned transit facilities, conflicts with adopted transit system plans, guidelines, policies, or standards, and creation of demand for public transit above the available capacity.

Disruptions to Existing Transit Service

Significance Criteria

A significant impact occurs if a project or project-related mitigation disrupts existing transit services or facilities. This includes disruptions caused by proposed project driveways on transit streets and impacts to transit stops/shelters; and impacts to transit operations from traffic improvements proposed or resulting from a project.

Project Impact

Currently, there is one transit line that serves the project area, Metro 534, which travels along Pacific Coast Highway within the vicinity of the project. Development of the project will not disrupt the existing transit services or facilities on Pacific Coast Highway. Therefore, the project is determined not to impact or affect existing transit service; the impact is less than significant.

Interference with Planned Transit Services

Significance Criteria

Per City's impact criteria, a significant impact occurs if a project interferes with planned transit services or facilities.

Project Impact

Based on a thorough review of existing documents, no transit facilities are planned on or along the perimeter of the project candidate site in the future; therefore the impact is considered to be less than significant.

Project Conflicts or Creates Inconsistencies with Adopted Transit System Plans, Guidelines, Policies, or Standards

Significance Criteria

A significant impact occurs if a project conflicts or creates inconsistencies with adopted transit system plans, guidelines, policies, or standards.

Project Impact

The City of Malibu General Plan includes the following policy statements regarding transit in the circulation element:

- Policy 1.2.2 – The City shall encourage the use of alternative modes of transportation
- Policy 1.2.3 – The City shall develop year-round local and public transportation

Based on our review of the proposed project, it is determined that the project would not conflict with these policies or other policies related to transit. The impact is less than significant, and no mitigation is required.

Demand for Public Transit Services above Capacity

Significance Criteria

A significant impact will occurs if the project creates demand for public transit service above the capacity which is provided, or planned.

Project Impact

Using the Los Angeles CMP methodology, 3.5% of person trips generated by the project were considered to be transit trips. Therefore, the project is expected to generate six transit trips during each peak hour. Given the existing transit service servicing site, it is determined that the incremental transit trips produced by the project would not generate a demand beyond the capacity already provided.

7. Bicycle Network – Project Impacts

This chapter reviews project-related impacts on the bicycle network in the study area. Potential impacts include disruptions on existing facilities, interference with planned facilities, and conflicts with adopted plans, guidelines, policies, or standards relating to bicycles.

Disruptions to Existing Facilities

Significance Criteria

Per the City's criteria, a significant impact occurs if a project disrupts existing bicycle facilities.

Project Impact

There are no identified on- or off-street bicycle facilities in the project study area. Therefore, the impact is determined to be less than significant.

Project Interferes with Planned Bicycle Facilities

Significance Criteria

A significant impact occurs if a project interferes with planned bicycle facilities. This includes failure to dedicate right-of-way for planned on- and off-street bicycle facilities included in an adopted Bicycle Master Plan or to contribute towards construction of planned bicycle facilities along the project frontage.

Project Impact

Based on a thorough review of available documents, no planned bicycle facilities were identified along the project frontage; therefore the impact is determined to be less than significant.

Project Conflicts with Adopted Bicycle System Plans, Guidelines, Policies, or Standards

Significance Criteria

A significant impact occurs if the project conflicts or creates inconsistencies with adopted bicycle system, plans, guidelines, policies, or standards.

Project Impact

The City of Malibu General Plan provides the following two policy statements related to bicycles:

- Policy 1.2.2 – The City shall encourage the use of alternative modes of transportation.
- Policy 1.2.4 – The City shall develop bikeways, pedestrian walkways and equestrian paths in areas that can safely accommodate them.

While the project is not proposing any new bicycle facilities, it is also does not interfere with any planned or proposed facilities. Additionally, the project does not conflict with the above policy statements. Therefore, the impact is determined to be less than significant and no mitigation would be required.

8. Pedestrian Network – Project Impacts

This chapter reviews project-related impacts on the pedestrian network in the study area. Potential impacts include disruptions on existing facilities, interference with planned facilities, and conflicts with adopted plans, guidelines, policies, or standards relating to pedestrians.

Disruptions to Existing Facilities

Significance Criteria

A significant impact occurs if a project disrupts existing pedestrian facilities. This can include adding new vehicular, pedestrian, or bicycle traffic at locations experiencing pedestrian safety concerns such as an adjacent crosswalk or school, particularly if the added traffic reduces the number of pedestrian acceptable gaps at an unsignalized crossing or causes queues to spillback through pedestrian crossings.

Project Impact

There are sidewalks along Civic Center Way near La Paz Lane. Additionally, the intersection of Civic Center Way & La Paz Lane has two marked crosswalks, and one marked crosswalk mid-block. Since, the Project does not propose any changes to the existing pedestrian facilities, the project impact is determined to be less than significant, and no mitigation is required.

Project Interferes with Planned Pedestrian Facilities

Significance Criteria

A significant impact occurs if a project interferes with pedestrian facilities. In existing or planned urbanized areas, main streets or pedestrian districts, this can include impacts to the quality of the walking environment.

Project Impact

No planned pedestrian facilities were identified along the project frontage; therefore, the impact is determined to be less than significant.

Project Conflicts with Adopted Pedestrian System Plans, Guidelines, Policies, or Standards

Significance Criteria

A significant impact occurs if a project conflicts or creates inconsistencies with adopted pedestrian system plans, guidelines, policies, or standards.

Project Impact

The City of Malibu General Plan provides the following two policy statements related to bicycles:

- Policy 1.2.2 – The City shall encourage the use of alternative modes of transportation.
- Policy 1.2.4 – The City shall develop bikeways, pedestrian walkways and equestrian paths in areas that can safely accommodate them.

The project site plan maintains the existing sidewalks along Civic Center Way. Therefore, the project is determined to result in a less than significant impact, and no mitigation would be required.

9. Truck Traffic – Project Impacts

This chapter reviews project-related impacts from the addition of truck traffic generated by the project.

Truck Traffic Generation

The project would provide 212 units of affordable multi-family housing units at three locations within the City of Malibu. In general, residential projects do not generate truck traffic other than deliveries. To maintain a conservative estimate, we assume that 2% of project trips will occur by truck. As such, the project would generate no more than 28 daily truck trips, including three peak hour truck trips.

Project Impact

The City has not identified significant impact criteria related to truck trips. However, the truck trip generation is very low; therefore, no significant impacts would occur related to truck traffic.

Truck Traffic Design Accommodations

As mentioned above, the proposed project is not expected to be a high truck traffic generator, so no specific design accommodations are required on-site. However, on-site facilities associated with the project would be able to accommodate delivery vehicles (i.e., UPS trucks). The impact is determined to be less than significant.

10. Project Site Plan Review

This chapter reviews the project site plan for the proposed project, shown in Figure 1. The site locations are in the early phase of development, so specific information such as on-site circulation and parking has not yet been reviewed. This chapter considers access to off-site streets, on-site parking for vehicles, pedestrian connections to adjacent locations, and access management standards.

Project Overview

The project is located on three parcels:

- 28517 Pacific Coast Highway (APN: 4467-013-022 & 4467-013-023) – 91 units
- 28401 Pacific Coast Highway (APN: 4467-012-005) – 64 units
- 3700 La Paz Lane (APN: 4458-022-023 & 4458-022-024) – 57 units

Parcel 1 (28517 PCH) and Parcel 2 (28401), which are adjacent to one another, would provide vehicular access from Ramirez Mesa Drive, along the eastern extent of Parcel 2. Parcel 7 (3700 La Paz Lane) would provide vehicular access from La Paz Lane.

Project On-Site Circulation and Access

Significance Criteria

A significant impact occurs if the project designs for on-site circulation, access, and parking areas fail to meet industry standard design guidelines.

Project Impact

This review of on-site circulation and access considers the following items:

1. Are all areas of the site accessible from each other?
2. Do the project driveways operate at an acceptable LOS, which ensures easy access to the project site?
3. Is there adequate access for emergency vehicles?

Intra-Site Accessibility

Parcels 1 and 2 are located adjacent to one another but will share internal connections to access Ramirez Mesa Drive. Parcel 7 is distinct from Parcels 1 and 2, but can access these parcels using off-site roadway facilities.

Project Driveway Operation

The project driveways will be located on Ramirez Mesa Drive and La Paz Lane. These two roadways carry less vehicular traffic when compared to other roadways fronting the parcels (Pacific Coast Highway and Civic Center Way, respectively) and are expected to operate at an acceptable level with the addition of project traffic.

Emergency Vehicle Access

To determine the adequacy of emergency vehicle access, both the external and internal accessibility of the site were considered.

The external accessibility is defined as the ease by which emergency vehicles can travel to the site on the external roadway system. It is determined that both site locations have major roadways that can be used to travel to/from the site. The main route for emergency vehicles accessing Parcels 1 and 2 would likely be via Pacific Coast Highway, which can be used to access the site from the south. The main route for emergency vehicles accessing Parcel 7 would likely be via Pacific Coast Highway to either Cross Creek Road or Civic Center Way.

The internal accessibility reflects the ability of an emergency vehicle to travel through the site to reach the various buildings through the internal roadway network. The internal roadway for the proposed project sites was not finalized at the time of the study, but will be developed to sufficiently serve the project site's emergency needs.

On-Site and Off-site Pedestrian Connections

Significance Criteria

A significant impact occurs if project fails to provide accessible and safe pedestrian connections between buildings and to adjacent streets and transit facilities.

Project Impact

The project site plan was not finalized at the time of the study to identify on-site pedestrian connections. Along adjacent off-site roads, Ramirez Mesa Drive (accessed by Parcels 1 and 2) has a sidewalk on the east side of the street. The project will ensure a safe connection from the site to the sidewalk. On La Paz Lane, there are sidewalks on the west side of the street, and Civic Center Way has sidewalks on both sides of the street. The project will provide accommodations to safely connect to these pedestrian facilities. The site plan will be reviewed for on-site pedestrian connectivity once complete, but at this time the impact is determined to be less than significant, and no mitigation is required.

Delivery Vehicle Access and Circulation

Significance Criteria

A significant impact occurs if a project fails to provide adequate accessibility for service and delivery trucks on-site including access to truck loading areas.

Project Impact

Although, the proposed project is expected to generate only a minimal number of delivery trucks, but would be able to accommodate these vehicles. Therefore, the project is determined to result in a less than significant impact.

Access Management Standards

Significance Criteria

A significant impact occurs if a project violates access management standards (e.g., driveway spacing, signal spacing, sight distance, etc.) in a way that causes an adverse effect on the environment or reduction in public safety.

Project Impact

Driveway Spacing

The exact location of the driveways has not yet been finalized. However, the driveways would be located on low-volume roadways to reduce access conflicts.

Sight Distance

To review the adequacy of sight distance, potential visual obstructions at the project driveways were considered along Ramirez Mesa Drive and La Paz Lane. Potential visual obstructions include:

- Landscaping
- Walls
- Entry monuments
- Signage

Of particular importance are those items that are visually obstructive for a driver. The typical viewing area for a driver extends from about four feet above the ground to eight feet above the ground, which represents the range of likely views for drivers. Items are not prohibited within this viewing area; instead they must only provide a clear viewing area. For example, a bush which was two to three feet tall would not obscure the viewing area. Likewise, a tree whose canopy did not extend below the 8-foot mark would be adequate.

As mentioned, the project site plan has not yet been finalized, but the existing physical features at this location are not expected to create sight distance issues. Therefore, the impacts are considered to be less than significant.

11. Summary and Conclusions

This study was undertaken to analyze the potential for traffic impacts resulting from an update to the Malibu Housing Element. The Housing Element proposes a total of 212 multi-family affordable housing units at three different locations in the City of Malibu. The key findings and conclusions of the study are summarized below:

- The proposed project is composed of 212 units of multi-family affordable housing at three candidate sites in Malibu. Each of the three sites is located on or near Pacific Coast Highway.

- Detailed intersection capacity and operation analyses were conducted at nine intersections in the vicinity of the project site for weekday morning (7:00 to 10:00 AM) and evening (3:00 to 6:00 PM), and Saturday mid-day (11:00 AM to 2:00 PM). Under existing conditions, seven of the nine study intersections operate at an acceptable LOS C or better. The intersections of Malibu Canyon Road & Pacific Coast Highway and Las Flores Canyon Road & Pacific Coast Highway operate at LOS D or worse.

- The project is expected to generate a total of approximately 1,410 daily weekday trips and 1,354 daily Saturday trips, including approximately 108 trips during the AM peak hour, 131 trips during the PM peak hour, and 110 trips during the Saturday mid-day peak hour.

Using City of Malibu's significant impact criteria, it is determined that the project would result in significant impacts at the intersections of Malibu Canyon Road & Pacific Coast Highway and Cross Creek Road & Pacific Coast Highway during one or more peak periods. There is a feasible mitigation measure at the intersection of Malibu Canyon Road & Pacific Coast Highway, which entails converting the southbound left-turn/through lane to accommodate all turning movements. This mitigation would reduce the impact to less than significant levels. There is also a feasible mitigation measure at the intersection of Cross Creek Road & Pacific Coast Highway, which entails adding a westbound right-turn lane. This would reduce the impact to less than significant levels.

- The project would not result in significant impacts along the study roadway segments.

- The project would not result in transit, bicycle, or pedestrian impacts.

- The project would not generate many truck trips, and delivery vehicles would be able to be accommodated.

- The project site plan will be reviewed in further detail once finalized, but the initial site locations and access points would not result in significant impacts.

REFERENCES

2010 Traffic Volumes on California State Highways, California Department of Transportation, http://www.dot.ca.gov/hq/traffops/saferesr/trafdata/index.htm, accessed March 2012.

Traffic Impact Analysis Guidelines, City of Malibu, August 2012.

Congestion Management Program for Los Angeles County, Los Angeles County Metropolitan Transportation Authority, October 2010.

Highway Capacity Manual, Transportation Research Board, 2000.

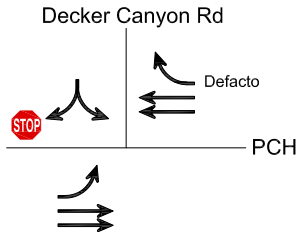
Transportation Research Circular No. 212, Interim Materials on Highway Capacity, Transportation Research Board, 1980.

Trip Generation, 8th Edition, Institute of Transportation Engineers, 2008.

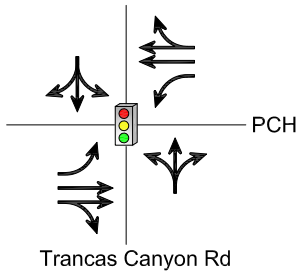
APPENDIX A:
INTERSECTION LANE CONFIGURATIONS

EXISTING CONDITOINS

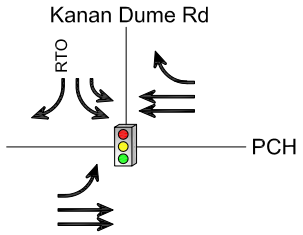
1. Decker Canyon Rd &
   Pacific Coast Hwy (PCH)



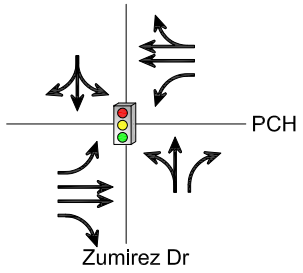
2. Trancas Canyon Rd &
   Pacific Coast Hwy (PCH)



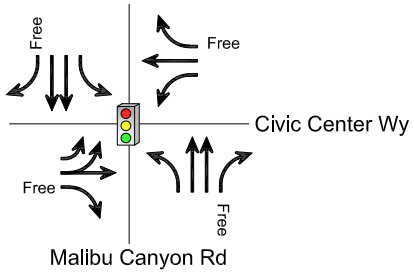
3. Kanan Dume Rd &
   Pacific Coast Hwy (PCH)



4. Zumirez Dr &
   Pacific Coast Hwy (PCH)

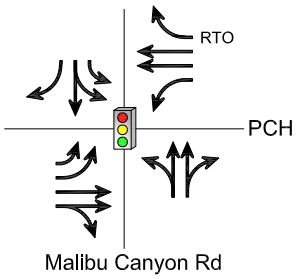


5. Malibu Canyon Rd &
   Civic Center Wy

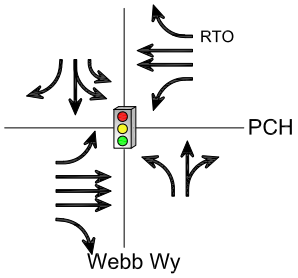


EXISTING CONDITOINS

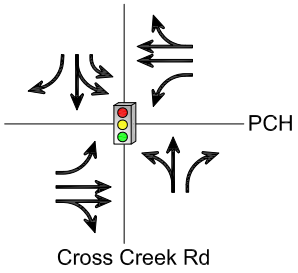
6. Malibu Canyon Rd & Pacific Coast Hwy (PCH)



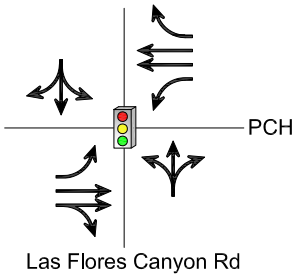
7. Webb Wy & Pacific Coast Hwy (PCH)



8. Cross Creek Rd & Pacific Coast Hwy (PCH)



9. Las Flores Canyon Rd & Pacific Coast Hwy (PCH)



APPENDIX B:
TRAFFIC COUNTS

Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_001 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

AM

NS/EW Streets:	Decker Canyon Rd			Decker Canyon Rd			Pacific Coast Highway			Pacific Coast Highway			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
7:00 AM				1		1	0	101			45	0	148
7:15 AM				2		0	0	132			49	1	184
7:30 AM				2		0	1	121			47	0	171
7:45 AM				4		0	0	135			50	2	191
8:00 AM				3		2	3	97			38	0	143
8:15 AM				4		0	0	126			54	2	186
8:30 AM				4		1	1	112			70	2	190
8:45 AM				3		0	0	119			74	0	196
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	0	0	0	23	0	4	5	943	0	0	427	7	1409
APPROACH %'s :	#DIV/0!	#DIV/0!	#DIV/0!	85.19%	0.00%	14.81%	0.53%	99.47%	0.00%	0.00%	98.39%	1.61%	
PEAK HR START TIME :	800 AM												TOTAL
PEAK HR VOL :	0	0	0	14	0	3	4	454	0	0	236	4	715
PEAK HR FACTOR :		0.000			0.850			0.909			0.811		0.912

CONTROL :

Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_001 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

PM

NS/EW Streets:	Decker Canyon Rd			Decker Canyon Rd			Pacific Coast Highway			Pacific Coast Highway			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
4:00 PM				3		0	2	146			185	4	340
4:15 PM				1		2	1	113			183	4	304
4:30 PM				0		1	2	113			171	3	290
4:45 PM				3		3	2	122			207	2	339
5:00 PM				4		3	3	112			166	5	293
5:15 PM				2		0	0	104			192	1	299
5:30 PM				1		0	3	131			173	6	314
5:45 PM				2		0	3	111			164	3	283
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	0	0	0	16	0	9	16	952	0	0	1441	28	2462
APPROACH %'s :	#DIV/0!	#DIV/0!	#DIV/0!	64.00%	0.00%	36.00%	1.65%	98.35%	0.00%	0.00%	98.09%	1.91%	
PEAK HR START TIME :	400 PM												TOTAL
PEAK HR VOL :	0	0	0	7	0	6	7	494	0	0	746	13	1273
PEAK HR FACTOR :		0.000			0.542			0.846			0.908		0.936

CONTROL :

ITM Peak Hour Summary

Prepared by:

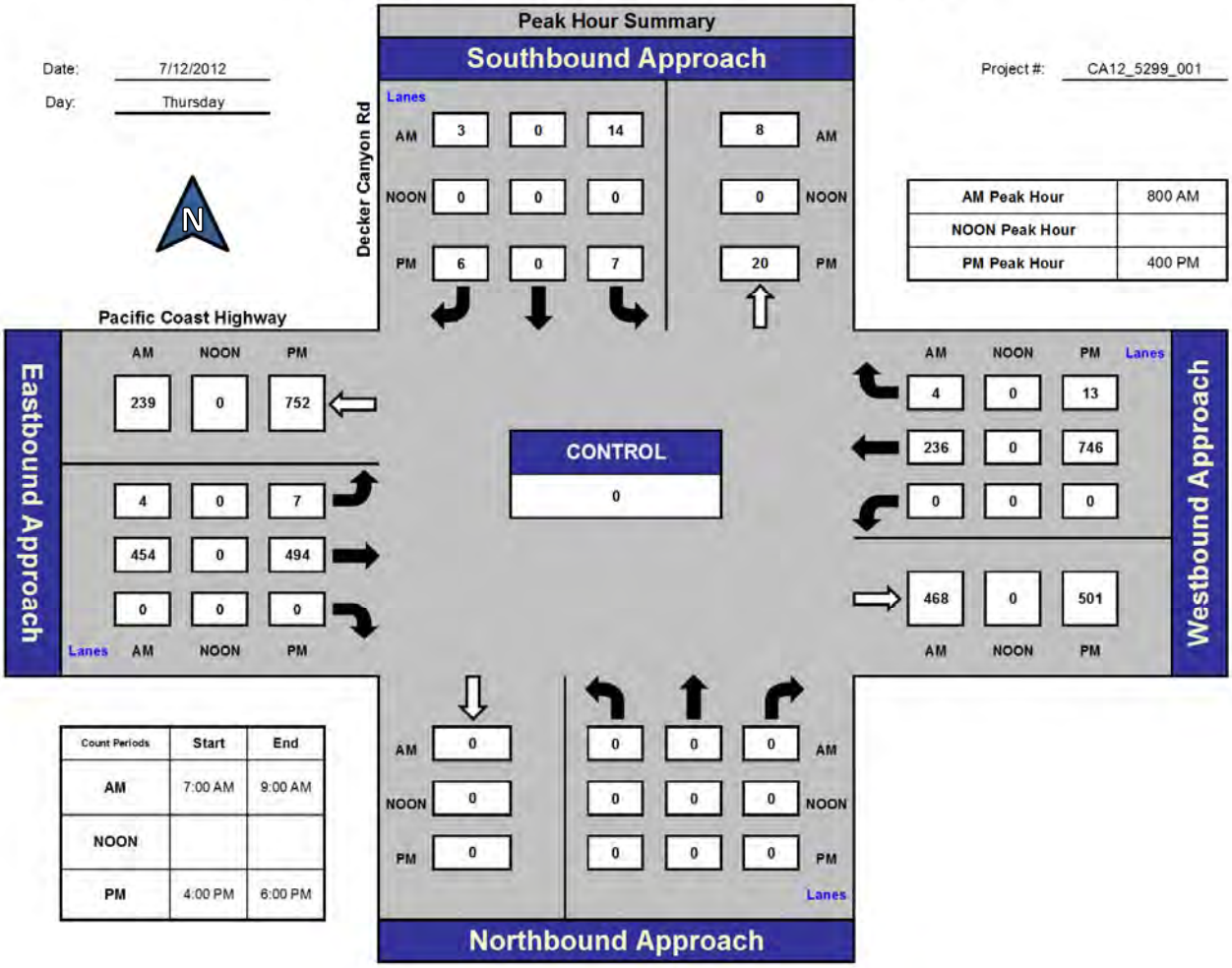
National Data & Surveying Services

Decker Canyon Rd and Pacific Coast Highway , City of Malibu

Date: 7/12/2012

Day: Thursday

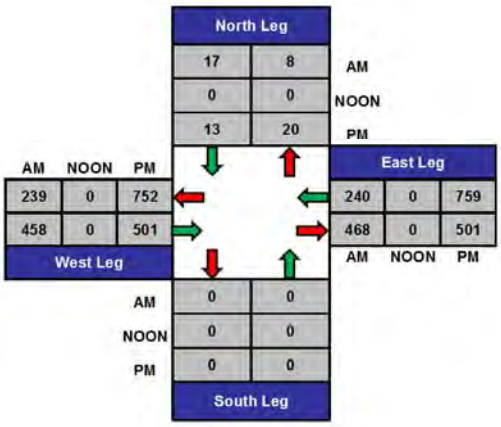
Project #: CA12_5299_001



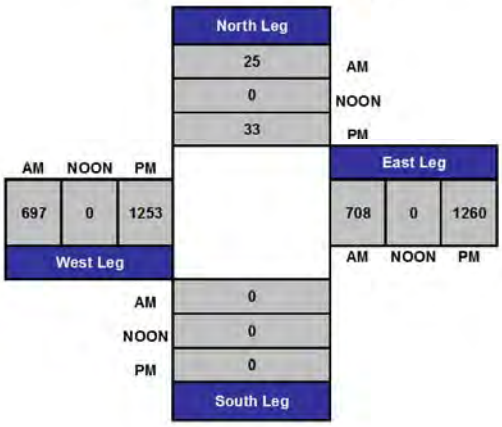
AM Peak Hour	800 AM
NOON Peak Hour	
PM Peak Hour	400 PM

Count Periods	Start	End
AM	7:00 AM	9:00 AM
NOON		
PM	4:00 PM	6:00 PM

Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_001 **Day:** SATURDAY

City: City of Malibu **Date:** 07/14/2012

NOON

NS/EW Streets:	Decker Canyon Rd			Decker Canyon Rd			Pacific Coast Highway			Pacific Coast Highway			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
11:00 AM				5		0	2	129			161	4	301
11:15 AM				5		3	2	130			185	3	328
11:30 AM				4		0	0	132			191	3	330
11:45 AM				7		7	3	146			162	4	329
12:00 PM				5		4	0	142			175	1	327
12:15 PM				3		7	0	148			166	2	326
12:30 PM				4		3	1	121			184	2	315
12:45 PM				7		7	1	126			195	7	343
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	0	0	0	40	0	31	9	1074	0	0	1419	26	2599
APPROACH %'s :	#DIV/0!	#DIV/0!	#DIV/0!	56.34%	0.00%	43.66%	0.83%	99.17%	0.00%	0.00%	98.20%	1.80%	
PEAK HR START TIME :	1115 AM												TOTAL
PEAK HR VOL :	0	0	0	21	0	14	5	550	0	0	713	11	1314
PEAK HR FACTOR :		0.000			0.625			0.931			0.933		0.995

CONTROL :

ITM Peak Hour Summary

Prepared by:

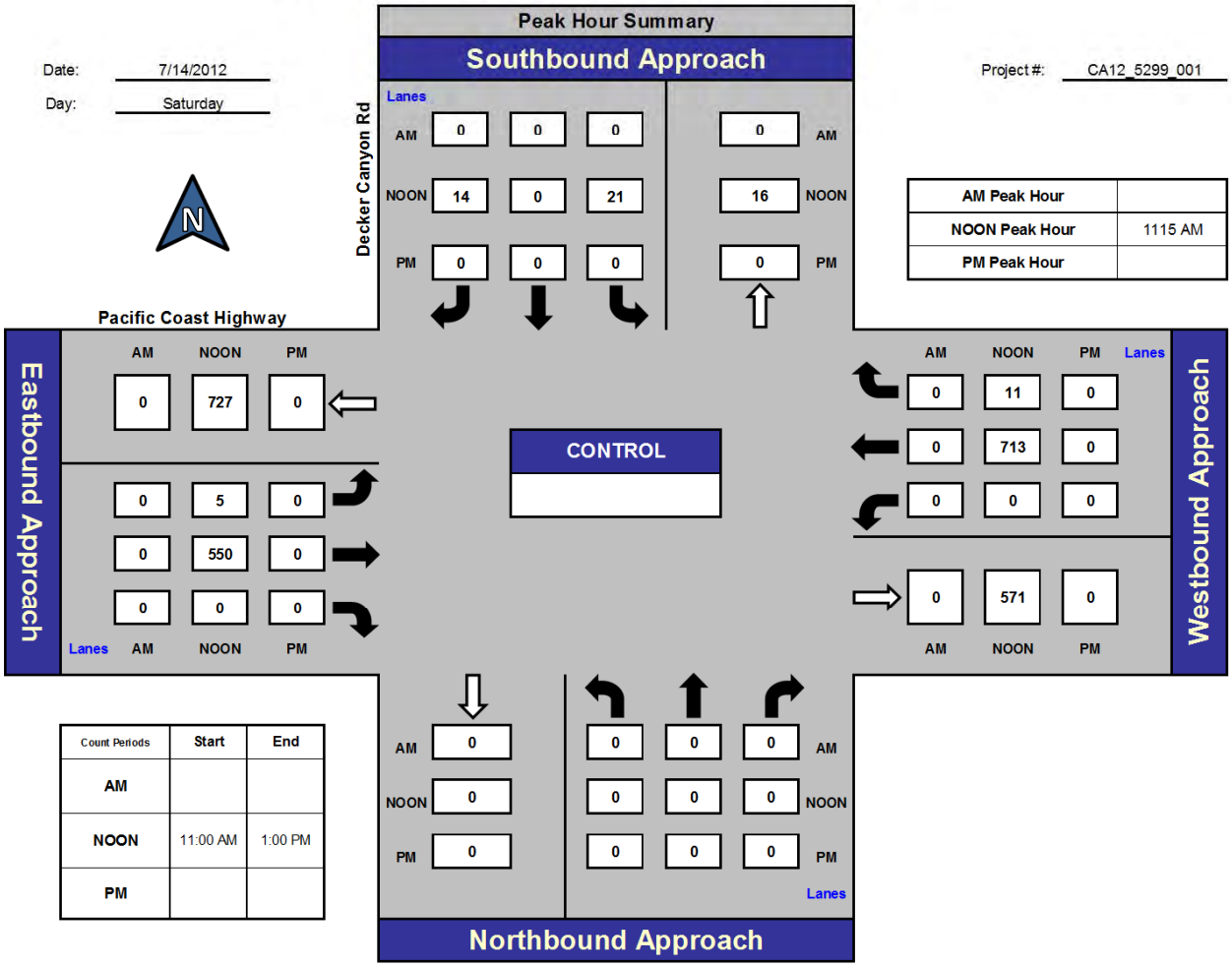
National Data & Surveying Services

Decker Canyon Rd and Pacific Coast Highway , City of Malibu

Date: 7/14/2012

Day: Saturday

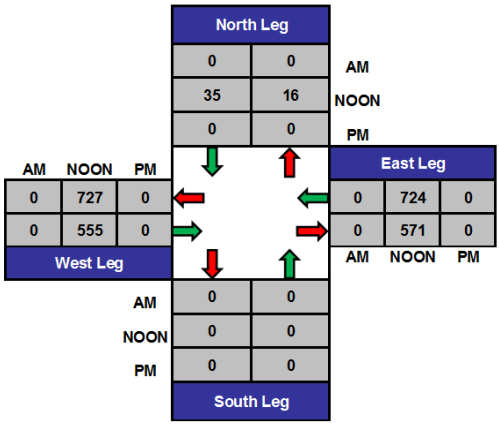
Project #: CA12_5299_001



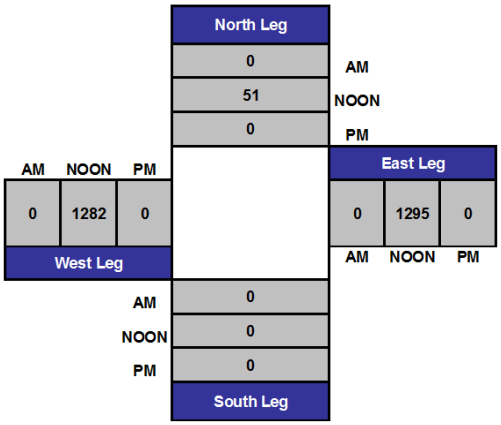
AM Peak Hour	
NOON Peak Hour	1115 AM
PM Peak Hour	

Count Periods	Start	End
AM		
NOON	11:00 AM	1:00 PM
PM		

Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_004 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

AM

NS/EW Streets:	Trancas Canyon Rd			Trancas Canyon Rd			Pacific Coast Highway			Pacific Coast Highway			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
7:00 AM	0	3	4	16	1	1	7	104	0	13	56	13	218
7:15 AM	0	0	2	18	1	7	7	120	1	10	46	13	225
7:30 AM	1	3	2	20	2	2	16	127	0	9	52	14	248
7:45 AM	1	2	5	35	3	2	11	142	2	8	68	19	298
8:00 AM	1	0	2	28	1	6	6	109	0	7	58	25	243
8:15 AM	0	4	8	21	2	6	14	137	1	6	66	10	275
8:30 AM	0	2	2	32	1	3	9	122	0	9	79	23	282
8:45 AM	0	1	7	27	1	6	7	128	0	9	81	22	289
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	3	15	32	197	12	33	77	989	4	71	506	139	2078
APPROACH %'s :	6.00%	30.00%	64.00%	81.40%	4.96%	13.64%	7.20%	92.43%	0.37%	9.92%	70.67%	19.41%	
PEAK HR START TIME :	745 AM												TOTAL
PEAK HR VOL :	2	8	17	116	7	17	40	510	3	30	271	77	1098
PEAK HR FACTOR :		0.563			0.875			0.892			0.851		0.921

CONTROL :

Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_004 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

PM

NS/EW Streets:	Trancas Canyon Rd			Trancas Canyon Rd			Pacific Coast Highway			Pacific Coast Highway			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
4:00 PM	2	2	19	31	1	7	7	152	3	12	197	37	470
4:15 PM	2	3	12	32	0	13	9	117	2	13	192	19	414
4:30 PM	1	3	13	37	1	8	11	148	4	11	191	27	455
4:45 PM	0	1	8	27	1	7	12	134	0	8	224	28	450
5:00 PM	0	3	8	47	1	3	9	130	0	6	188	26	421
5:15 PM	1	0	12	37	1	7	3	109	0	6	185	26	387
5:30 PM	1	0	9	23	0	2	9	137	0	4	196	19	400
5:45 PM	0	0	10	24	2	2	3	128	0	4	160	24	357
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	7	12	91	258	7	49	63	1055	9	64	1533	206	3354
APPROACH %'s :	6.36%	10.91%	82.73%	82.17%	2.23%	15.61%	5.59%	93.61%	0.80%	3.55%	85.02%	11.43%	
PEAK HR START TIME :	400 PM												TOTAL
PEAK HR VOL :	5	9	52	127	3	35	39	551	9	44	804	111	1789
PEAK HR FACTOR :		0.717			0.897			0.919			0.922		0.952

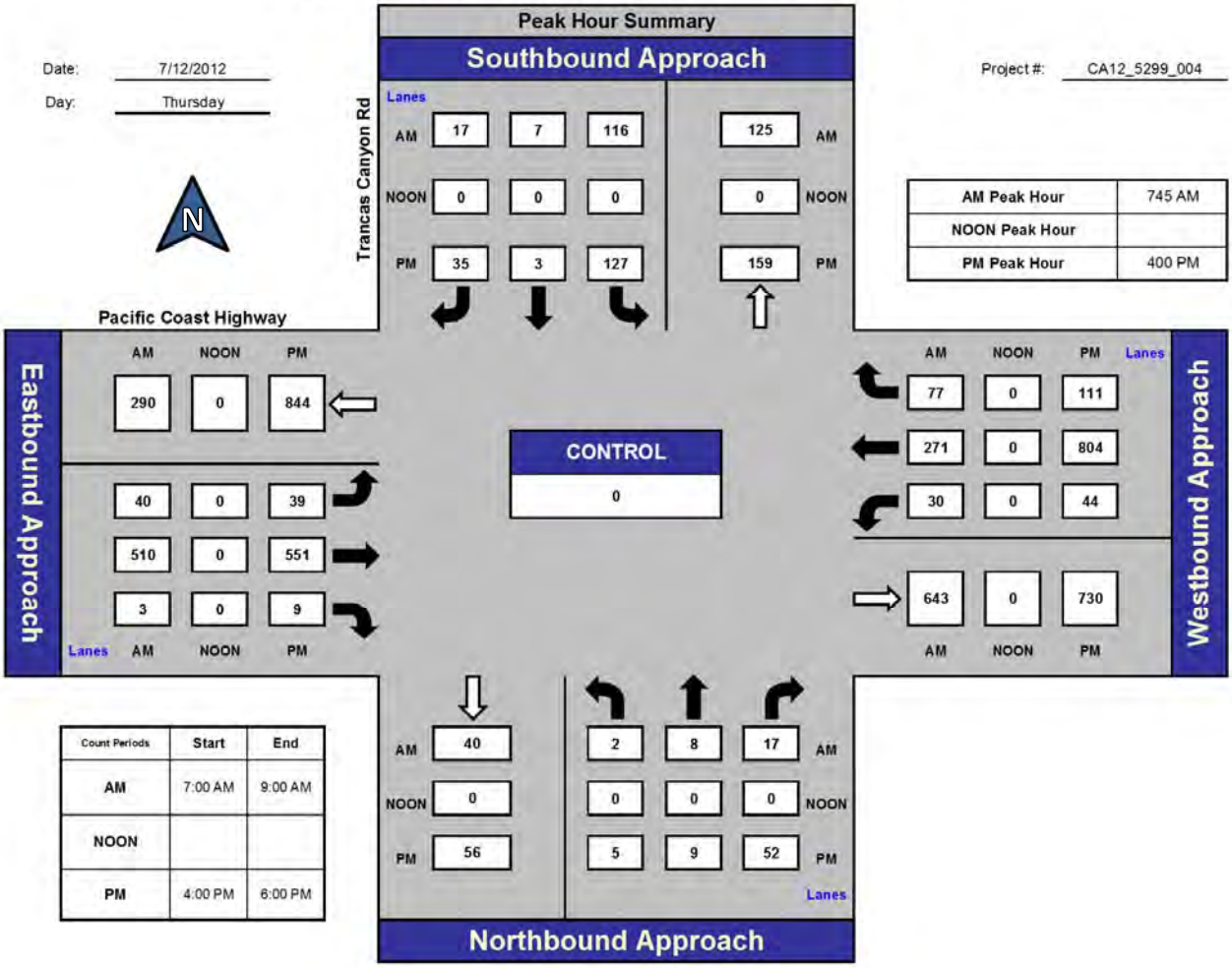
CONTROL :

ITM Peak Hour Summary

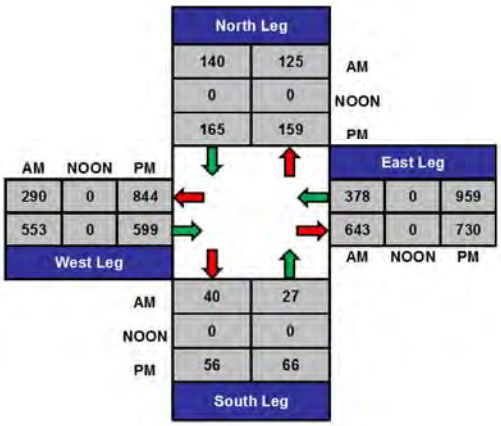
Prepared by:

National Data & Surveying Services

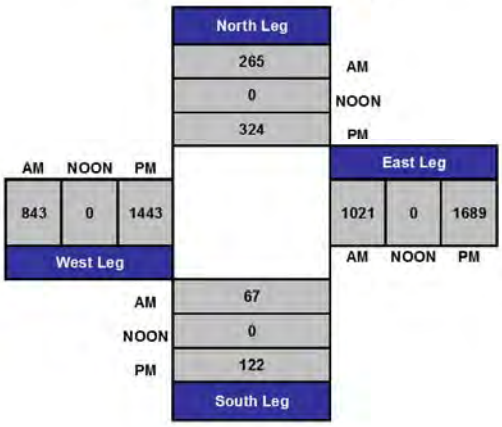
Trancas Canyon Rd and Pacific Coast Highway , City of Malibu



Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_004 **Day:** SATURDAY

City: City of Malibu **Date:** 07/14/2012

NOON

NS/EW Streets:	Trancas Canyon Rd			Trancas Canyon Rd			Pacific Coast Highway			Pacific Coast Highway			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
11:00 AM	1	1	6	28	2	10	8	143	0	10	176	31	416
11:15 AM	1	2	12	31	3	7	8	134	4	6	165	29	402
11:30 AM	0	2	6	24	1	8	8	166	2	11	187	27	442
11:45 AM	2	0	13	34	2	8	9	138	3	11	203	38	461
12:00 PM	0	1	14	34	2	13	9	170	1	13	192	24	473
12:15 PM	1	0	12	23	1	4	8	139	3	10	191	32	424
12:30 PM	1	1	16	30	8	7	9	161	2	24	207	22	488
12:45 PM	0	1	14	32	4	7	11	142	2	12	206	33	464
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	6	8	93	236	23	64	70	1193	17	97	1527	236	3570
APPROACH %'s :	5.61%	7.48%	86.92%	73.07%	7.12%	19.81%	5.47%	93.20%	1.33%	5.22%	82.10%	12.69%	
PEAK HR START TIME :	1200 PM												TOTAL
PEAK HR VOL :	2	3	56	119	15	31	37	612	8	59	796	111	1849
PEAK HR FACTOR :		0.847			0.842			0.913			0.955		0.947

CONTROL :

ITM Peak Hour Summary

Prepared by:

National Data & Surveying Services

Trancas Canyon Rd and Pacific Coast Highway , City of Malibu

Date: 7/14/2012

Day: Saturday

Project #: CA12_5299_004

AM Peak Hour	
NOON Peak Hour	1200 PM
PM Peak Hour	

Count Periods	Start	End
AM		
NOON	11:00 AM	1:00 PM
PM		

Total Ins & Outs

	North Leg		
AM	0	0	AM
NOON	165	151	NOON
PM	0	0	PM

West Leg				East Leg			
AM	NOON	PM		AM	NOON	PM	
0	829	0		0	966	0	
0	657	0		0	787	0	

	South Leg	
AM	0	0
NOON	82	61
PM	0	0

Total Volume Per Leg

	North Leg	
AM	0	AM
NOON	316	NOON
PM	0	PM

West Leg			East Leg		
AM	NOON	PM	AM	NOON	PM
0	1486	0	0	1753	0

	South Leg
AM	0
NOON	143
PM	0

Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_010 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

AM

NS/EW Streets:	Kanan Dume Rd			Kanan Dume Rd			Pacific Coast Highway			Pacific Coast Highway			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
7:00 AM				38		45	23	125			107	11	349
7:15 AM				44		25	13	154			102	19	357
7:30 AM				67		60	26	160			106	19	438
7:45 AM				61		72	30	183			131	22	499
8:00 AM				59		51	23	164			134	23	454
8:15 AM				41		60	34	154			152	28	469
8:30 AM				56		68	39	173			138	28	502
8:45 AM				43		71	43	181			177	27	542

	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	0	0	0	409	0	452	231	1294	0	0	1047	177	3610
APPROACH %'s :	#DIV/0!	#DIV/0!	#DIV/0!	47.50%	0.00%	52.50%	15.15%	84.85%	0.00%	0.00%	85.54%	14.46%	

PEAK HR START TIME :	800 AM												TOTAL
PEAK HR VOL :	0	0	0	199	0	250	139	672	0	0	601	106	1967
PEAK HR FACTOR :		0.000			0.905			0.905			0.866		0.907

CONTROL :

Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_010 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

PM

NS/EW Streets:	Kanan Dume Rd			Kanan Dume Rd			Pacific Coast Highway			Pacific Coast Highway			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
4:00 PM				41		63	95	240			236	58	733
4:15 PM				38		54	85	247			261	58	743
4:30 PM				40		36	97	256			253	61	743
4:45 PM				36		41	67	229			256	70	699
5:00 PM				37		47	77	217			243	66	687
5:15 PM				47		54	59	245			258	72	735
5:30 PM				29		53	82	206			245	83	698
5:45 PM				43		51	56	200			198	60	608

	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	0	0	0	311	0	399	618	1840	0	0	1950	528	5646
APPROACH %'s :	#DIV/0!	#DIV/0!	#DIV/0!	43.80%	0.00%	56.20%	25.14%	74.86%	0.00%	0.00%	78.69%	21.31%	

PEAK HR START TIME :	400 PM												TOTAL
PEAK HR VOL :	0	0	0	155	0	194	344	972	0	0	1006	247	2918
PEAK HR FACTOR :		0.000			0.839			0.932			0.961		0.982

CONTROL :

ITM Peak Hour Summary

Prepared by:

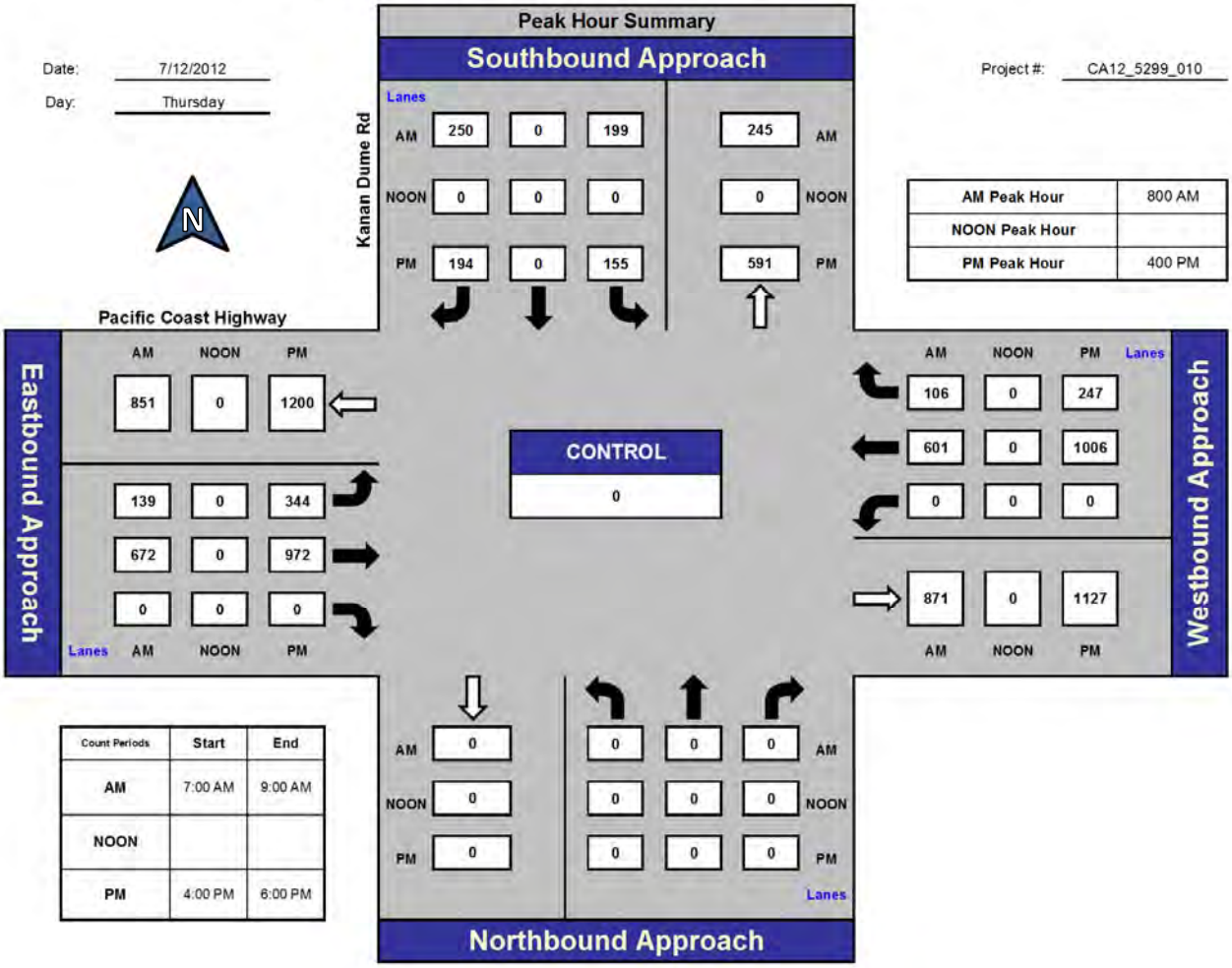
National Data & Surveying Services

Kanan Dume Rd and Pacific Coast Highway , City of Malibu

Date: 7/12/2012

Day: Thursday

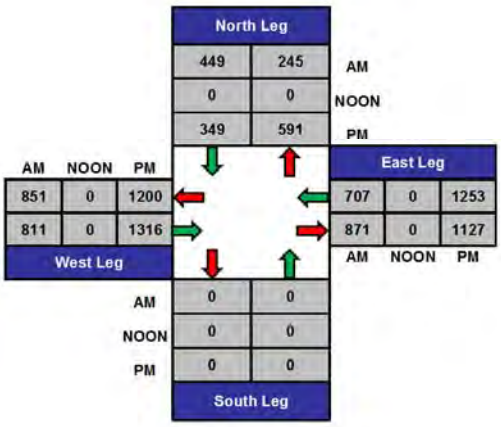
Project #: CA12_5299_010



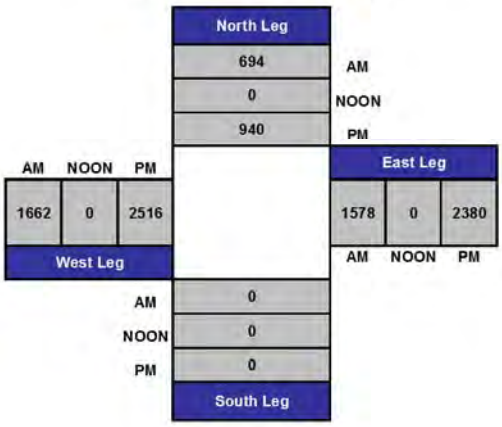
AM Peak Hour	800 AM
NOON Peak Hour	
PM Peak Hour	400 PM

Count Periods	Start	End
AM	7:00 AM	9:00 AM
NOON		
PM	4:00 PM	6:00 PM

Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_010 **Day:** SATURDAY

City: City of Malibu **Date:** 07/14/2012

NOON

NS/EW Streets:	Kanan Dume Rd			Kanan Dume Rd			Pacific Coast Highway			Pacific Coast Highway			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
11:00 AM				40		111	51	219			304	40	765
11:15 AM				51		126	56	181			291	53	758
11:30 AM				49		133	72	251			288	42	835
11:45 AM				62		147	58	220			326	37	850
12:00 PM				64		144	90	252			298	26	874
12:15 PM				66		166	73	223			271	45	844
12:30 PM				77		142	81	315			333	52	1000
12:45 PM				77		134	58	238			319	49	875
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	0	0	0	486	0	1103	539	1899	0	0	2430	344	6801
APPROACH %'s :	#DIV/0!	#DIV/0!	#DIV/0!	30.59%	0.00%	69.41%	22.11%	77.89%	0.00%	0.00%	87.60%	12.40%	
PEAK HR START TIME :	1200 PM												TOTAL
PEAK HR VOL :	0	0	0	284	0	586	302	1028	0	0	1221	172	3593
PEAK HR FACTOR :		0.000			0.938			0.840			0.905		0.898

CONTROL :

ITM Peak Hour Summary

Prepared by:

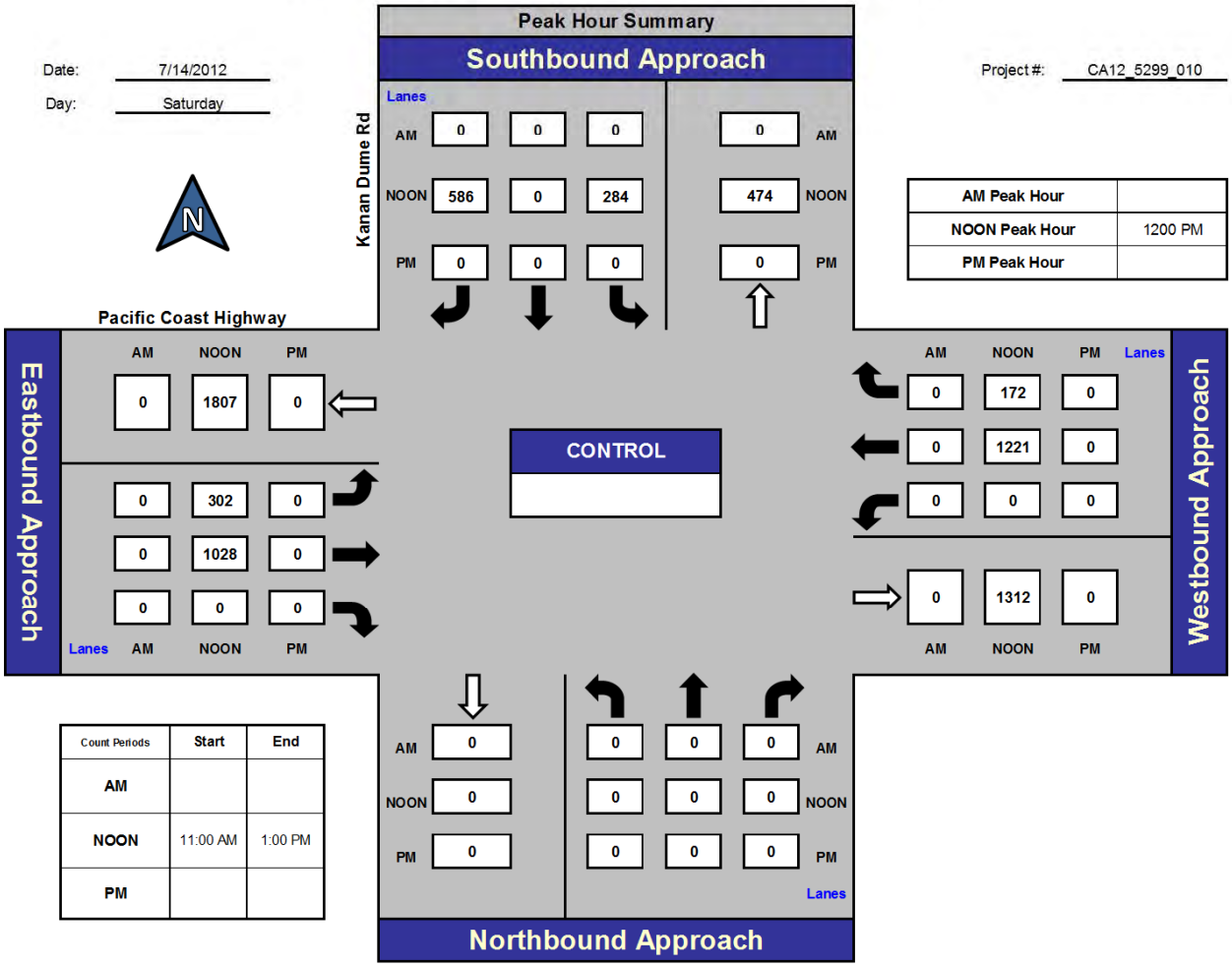
National Data & Surveying Services

Kanan Dume Rd and Pacific Coast Highway , City of Malibu

Date: 7/14/2012

Day: Saturday

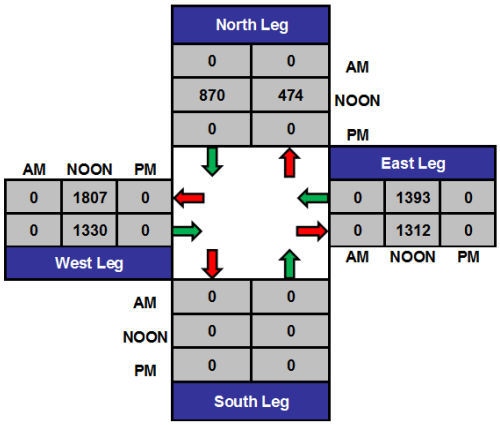
Project #: CA12_5299_010



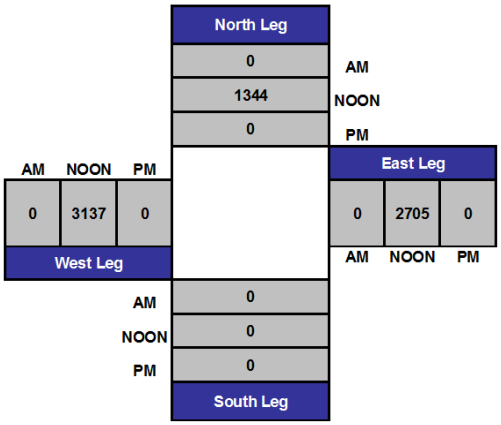
AM Peak Hour	
NOON Peak Hour	1200 PM
PM Peak Hour	

Count Periods	Start	End
AM		
NOON	11:00 AM	1:00 PM
PM		

Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_011 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

AM

NS/EW Streets:	Zumirez Dr			Zumirez Dr			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
7:00 AM	6	0	15	0	0	0	1	148	8	13	99	3	293
7:15 AM	5	1	11	5	0	3	2	192	1	15	114	3	352
7:30 AM	4	0	16	1	1	1	1	216	9	22	122	2	395
7:45 AM	8	0	17	1	0	1	0	237	10	16	148	1	439
8:00 AM	6	0	13	2	0	1	1	210	8	27	140	0	408
8:15 AM	5	0	16	0	2	4	2	185	12	18	172	4	420
8:30 AM	17	1	27	1	0	2	3	209	7	32	152	1	452
8:45 AM	13	1	26	1	1	2	2	207	8	30	188	1	480
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	64	3	141	11	4	14	12	1604	63	173	1135	15	3239
APPROACH %'s :	30.77%	1.44%	67.79%	37.93%	13.79%	48.28%	0.71%	95.53%	3.75%	13.08%	85.79%	1.13%	
PEAK HR START TIME :	800 AM												TOTAL
PEAK HR VOL :	41	2	82	4	3	9	8	811	35	107	652	6	1760
PEAK HR FACTOR :		0.694			0.667			0.975			0.873		0.917

CONTROL : Signalized

Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_011 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

PM

NS/EW Streets:	Zumirez Dr			Zumirez Dr			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
4:00 PM	11	1	29	1	0	3	2	278	4	12	279	0	620
4:15 PM	8	2	18	0	0	2	1	278	8	18	336	4	675
4:30 PM	14	0	32	1	0	2	0	281	9	19	297	3	658
4:45 PM	10	0	23	2	0	3	0	260	2	10	309	0	619
5:00 PM	12	0	23	0	0	0	1	241	3	14	295	0	589
5:15 PM	12	0	17	0	1	1	1	296	6	27	339	2	702
5:30 PM	6	0	28	1	1	1	0	230	4	18	304	0	593
5:45 PM	3	0	9	0	0	3	1	243	4	18	266	2	549
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	76	3	179	5	2	15	6	2107	40	136	2425	11	5005
APPROACH %'s :	29.46%	1.16%	69.38%	22.73%	9.09%	68.18%	0.28%	97.86%	1.86%	5.29%	94.28%	0.43%	
PEAK HR START TIME :	400 PM												TOTAL
PEAK HR VOL :	43	3	102	4	0	10	3	1097	23	59	1221	7	2572
PEAK HR FACTOR :		0.804			0.700			0.968			0.899		0.953

CONTROL : Signalized

ITM Peak Hour Summary

Prepared by:

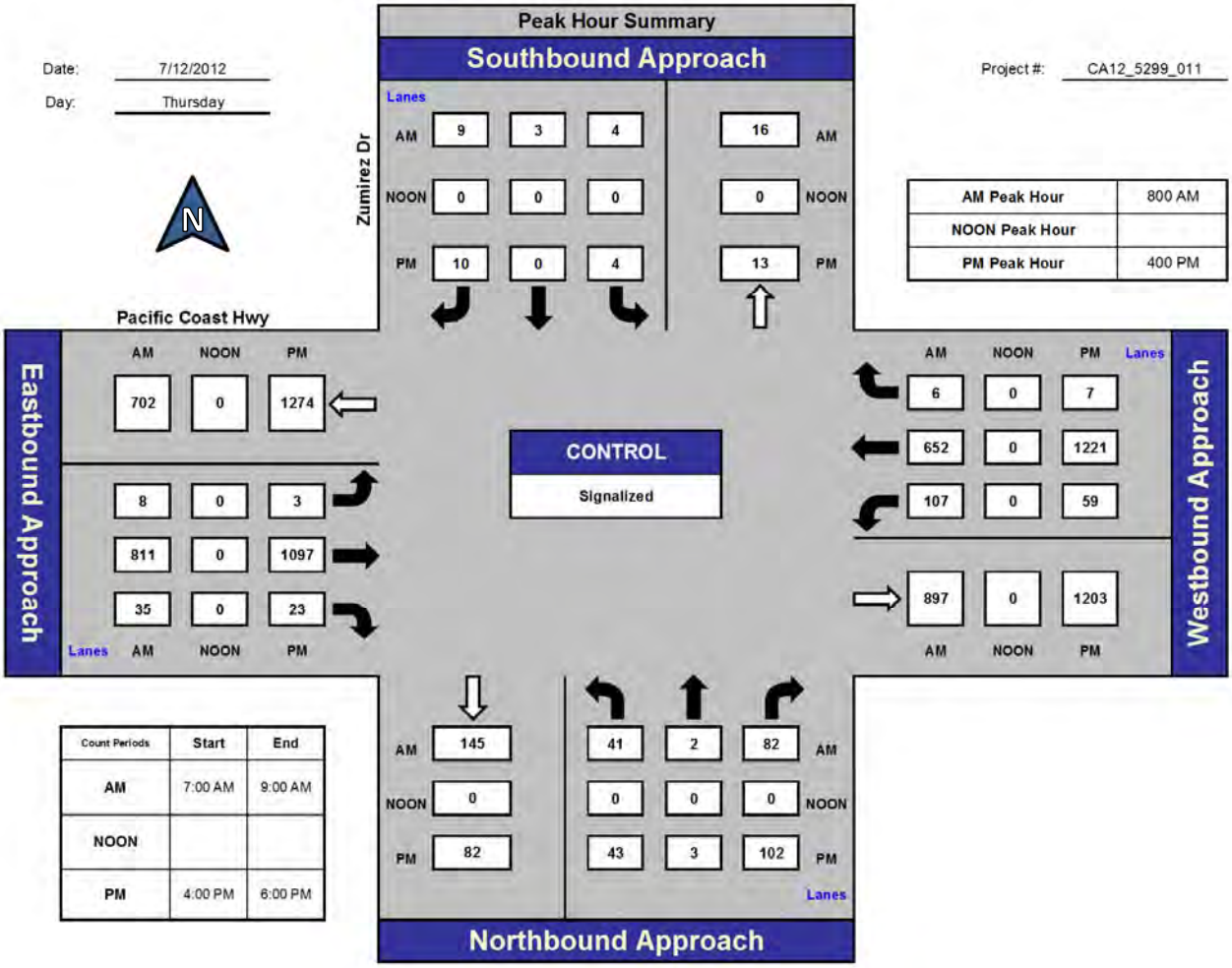
National Data & Surveying Services

Zumirez Dr and Pacific Coast Hwy , City of Malibu

Date: 7/12/2012

Day: Thursday

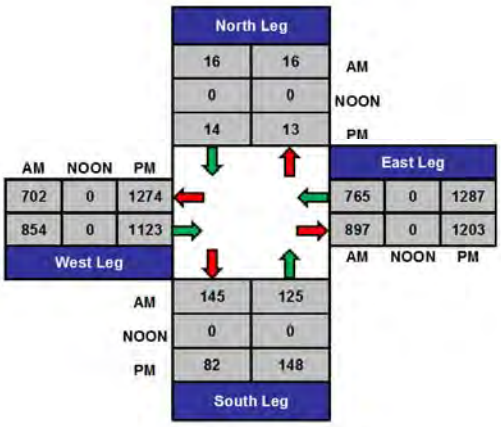
Project #: CA12_5299_011



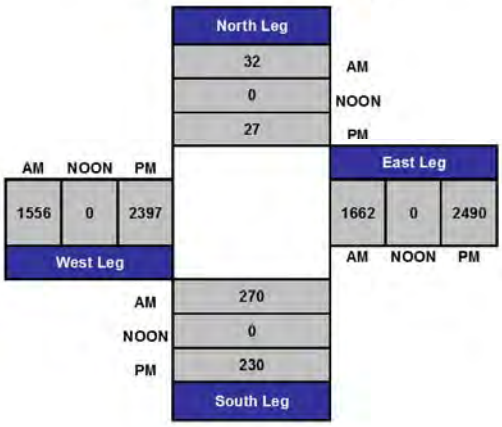
AM Peak Hour	800 AM
NOON Peak Hour	
PM Peak Hour	400 PM

Count Periods	Start	End
AM	7:00 AM	9:00 AM
NOON		
PM	4:00 PM	6:00 PM

Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_011 **Day:** SATURDAY

City: City of Malibu **Date:** 07/14/2012

NOON

NS/EW Streets:	Zumirez Dr			Zumirez Dr			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
11:00 AM	8		22	6	1	0	1	258	5	14	325	2	642
11:15 AM	13		23	1	0	2	2	232	4	22	354	0	653
11:30 AM	8		21	0	0	4	1	268	10	18	306	2	638
11:45 AM	6		13	2	1	1	4	287	6	22	337	1	680
12:00 PM	11		15	1	1	1	5	289	11	9	299	4	646
12:15 PM	6		21	1	0	4	2	260	6	20	319	2	641
12:30 PM	7		16	1	0	2	2	344	14	16	361	1	764
12:45 PM	11		15	0	0	0	0	328	10	13	340	2	719
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	70	0	146	12	3	14	17	2266	66	134	2641	14	5383
APPROACH %'s :	32.41%	0.00%	67.59%	41.38%	10.34%	48.28%	0.72%	96.47%	2.81%	4.80%	94.69%	0.50%	
PEAK HR START TIME :	1200 PM												TOTAL
PEAK HR VOL :	35	0	67	3	1	7	9	1221	41	58	1319	9	2770
PEAK HR FACTOR :		0.944			0.550			0.883			0.917		0.906

CONTROL : Signalized

ITM Peak Hour Summary

Prepared by:

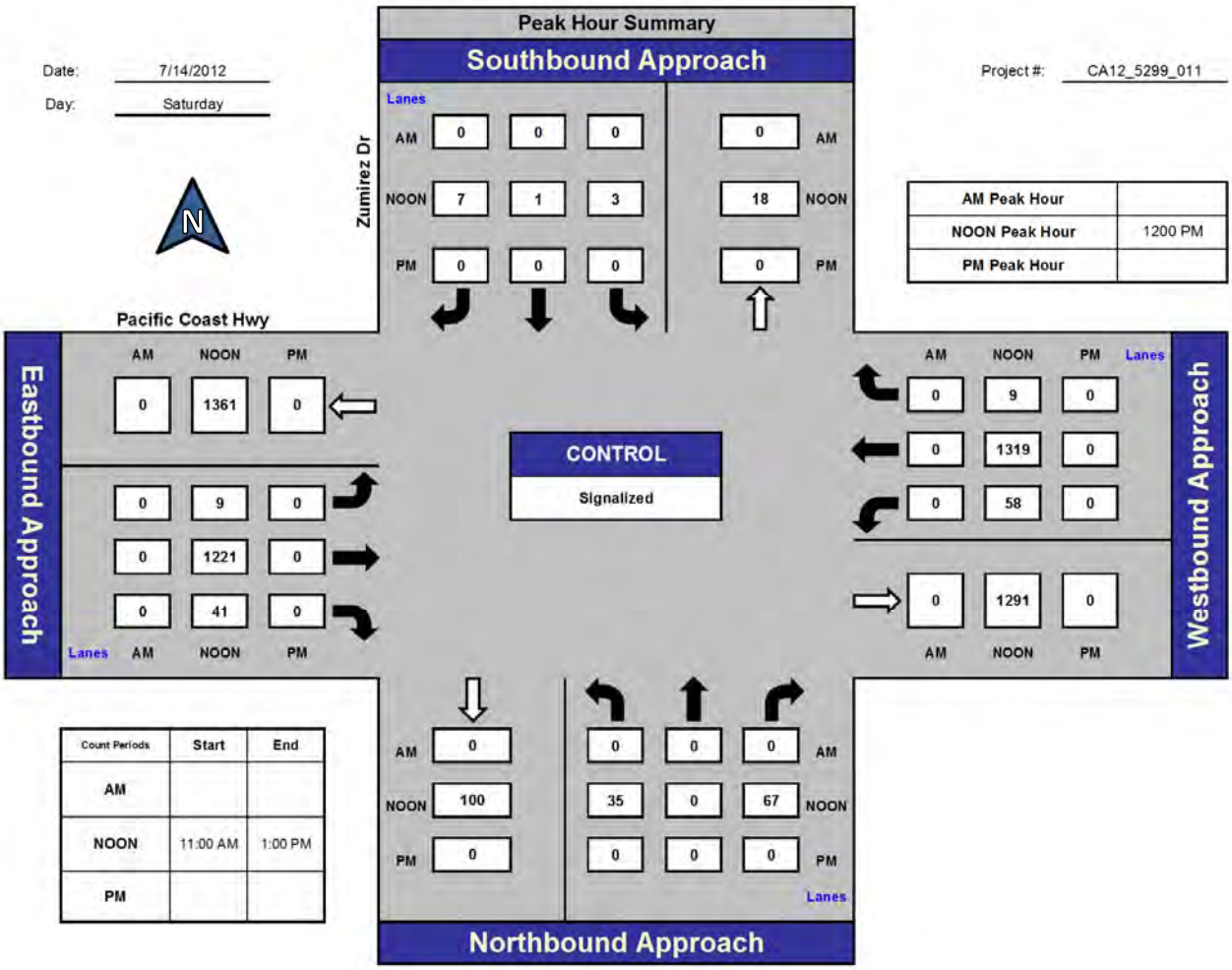
National Data & Surveying Services

Zumirez Dr and Pacific Coast Hwy , City of Malibu

Date: 7/14/2012

Day: Saturday

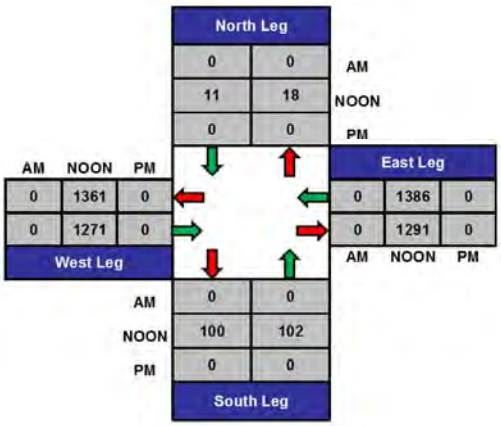
Project #: CA12_5299_011



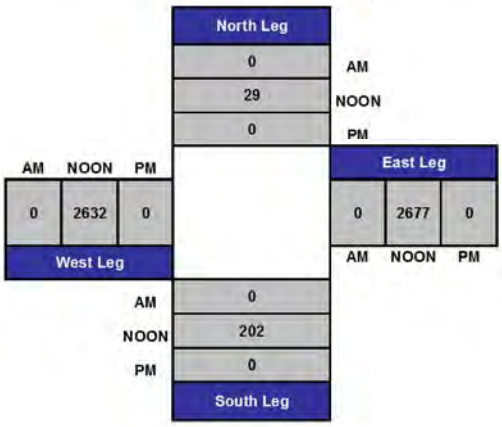
AM Peak Hour	
NOON Peak Hour	1200 PM
PM Peak Hour	

Count Periods	Start	End
AM		
NOON	11:00 AM	1:00 PM
PM		

Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_018 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

AM

NS/EW Streets:	Malibu Canyon Rd			Malibu Canyon Rd			Civic Center Way/Seaver Dr			Civic Center Way/Seaver Dr			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
7:00 AM	1	28	1	1	309	17	4	6	0	2	8	25	402
7:15 AM	5	30	6	2	233	19	2	2	1	2	7	32	341
7:30 AM	6	43	12	7	294	40	5	2	0	6	18	45	478
7:45 AM	12	39	6	2	263	61	6	6	2	3	43	40	483
8:00 AM	6	61	9	4	314	59	4	1	3	2	22	50	535
8:15 AM	5	45	4	4	261	48	8	3	2	3	11	65	459
8:30 AM	2	55	4	9	333	31	5	4	2	8	16	53	522
8:45 AM	3	74	5	12	253	30	4	10	6	4	15	53	469
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	40	375	47	41	2260	305	38	34	16	30	140	363	3689
APPROACH %'s :	8.66%	81.17%	10.17%	1.57%	86.72%	11.70%	43.18%	38.64%	18.18%	5.63%	26.27%	68.11%	
PEAK HR START TIME :	745 AM												TOTAL
PEAK HR VOL :	25	200	23	19	1171	199	23	14	9	16	92	208	1999
PEAK HR FACTOR :		0.816			0.921			0.821			0.919		0.934

CONTROL :

Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_018 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

PM

NS/EW Streets:	Malibu Canyon Rd			Malibu Canyon Rd			Civic Center Way/Seaver Dr			Civic Center Way/Seaver Dr			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
4:00 PM	3	120	9	37	99	5	25	13	10	4	18	131	474
4:15 PM	10	133	6	40	122	9	15	7	8	7	13	124	494
4:30 PM	4	117	3	37	93	6	20	11	7	4	5	146	453
4:45 PM	6	160	10	52	102	9	42	17	6	2	7	144	557
5:00 PM	6	131	7	45	115	8	91	43	9	9	8	173	645
5:15 PM	8	116	4	46	129	9	50	30	10	4	8	143	557
5:30 PM	2	127	6	43	118	18	51	13	12	2	12	149	553
5:45 PM	8	124	6	64	104	18	29	14	6	4	10	144	531
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	47	1028	51	364	882	82	323	148	68	36	81	1154	4264
APPROACH %'s :	4.17%	91.30%	4.53%	27.41%	66.42%	6.17%	59.93%	27.46%	12.62%	2.83%	6.37%	90.79%	
PEAK HR START TIME :	445 PM												TOTAL
PEAK HR VOL :	22	534	27	186	464	44	234	103	37	17	35	609	2312
PEAK HR FACTOR :		0.828			0.943			0.654			0.870		0.896

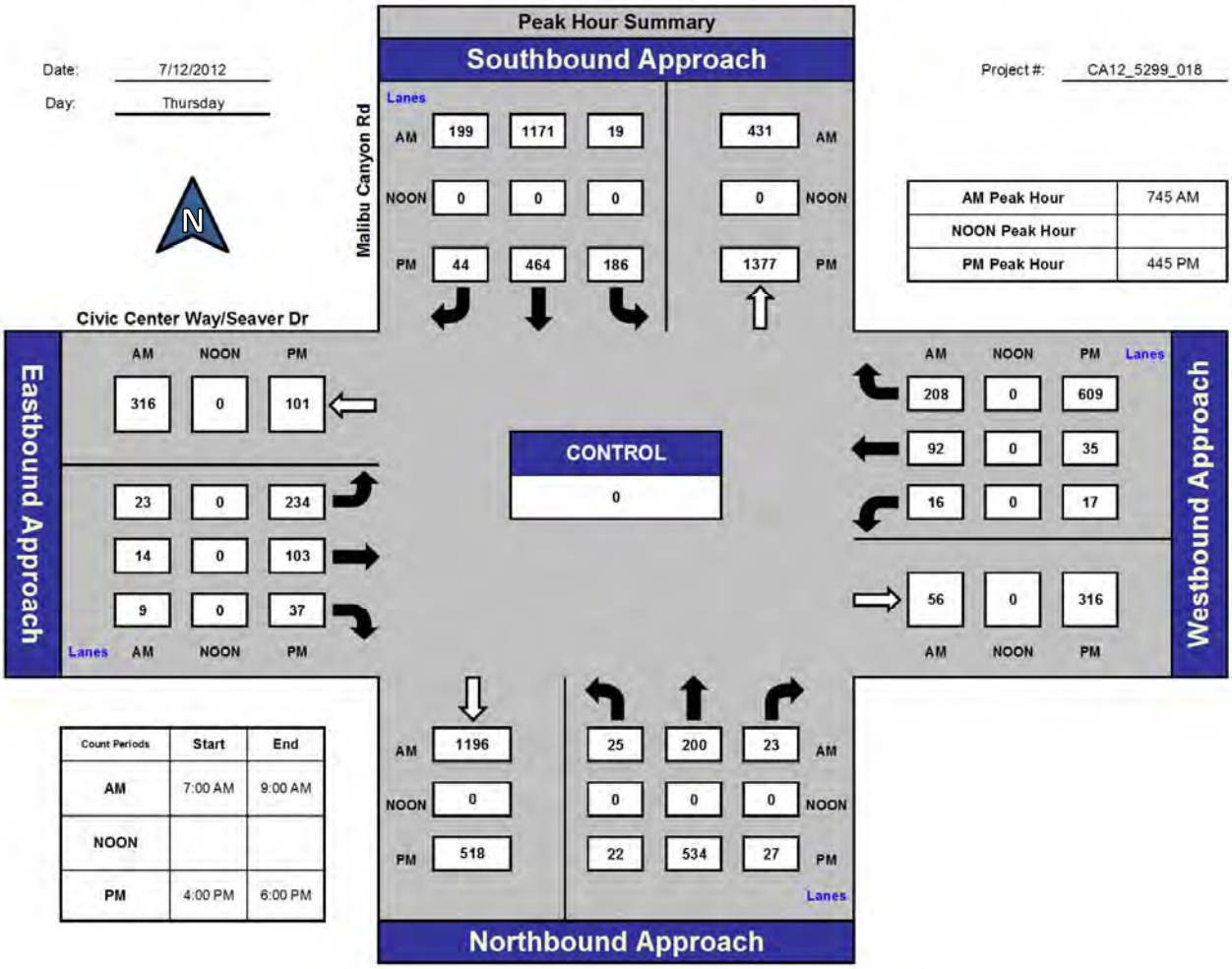
CONTROL :

ITM Peak Hour Summary

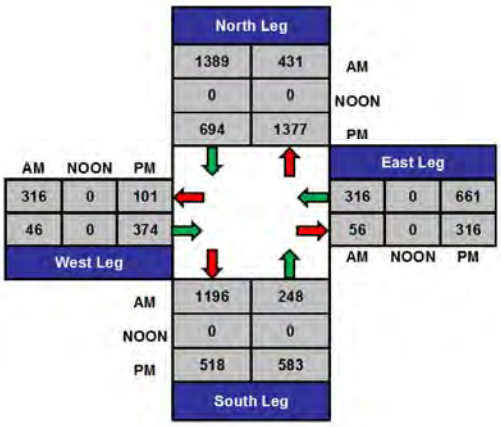
Prepared by:

National Data & Surveying Services

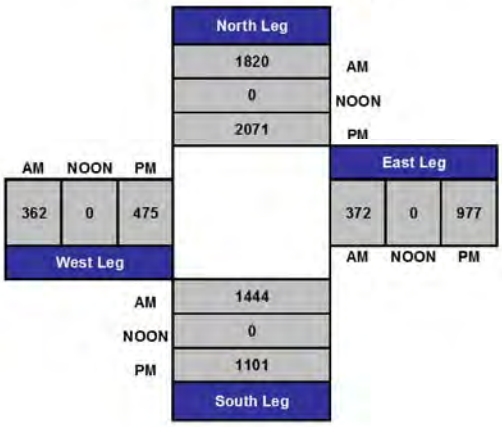
Malibu Canyon Rd and Civic Center Way/Seaver Dr , City of Malibu



Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_018 **Day:** SATURDAY

City: City of Malibu **Date:** 07/14/2012

NOON

NS/EW Streets:	Malibu Canyon Rd			Malibu Canyon Rd			Civic Center Way/Seaver Dr			Civic Center Way/Seaver Dr			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
11:00 AM	5	71	6	58	165	10	6	1	6	7	7	40	382
11:15 AM	4	69	4	39	179	4	6	6	3	4	6	41	365
11:30 AM	3	94	5	59	185	6	3	1	1	3	6	37	403
11:45 AM	6	69	7	52	195	8	8	7	4	10	4	40	410
12:00 PM	4	70	4	61	172	5	11	15	11	1	9	53	416
12:15 PM	10	84	4	58	209	10	8	4	4	5	6	37	439
12:30 PM	9	73	7	62	190	5	2	6	7	5	9	49	424
12:45 PM	8	79	3	48	184	12	6	7	9	4	7	33	400
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	49	609	40	437	1479	60	50	47	45	39	54	330	3239
APPROACH %'s :	7.02%	87.25%	5.73%	22.12%	74.85%	3.04%	35.21%	33.10%	31.69%	9.22%	12.77%	78.01%	
PEAK HR START TIME :	1145 AM												TOTAL
PEAK HR VOL :	29	296	22	233	766	28	29	32	26	21	28	179	1689
PEAK HR FACTOR :		0.885			0.927			0.588			0.905		0.962

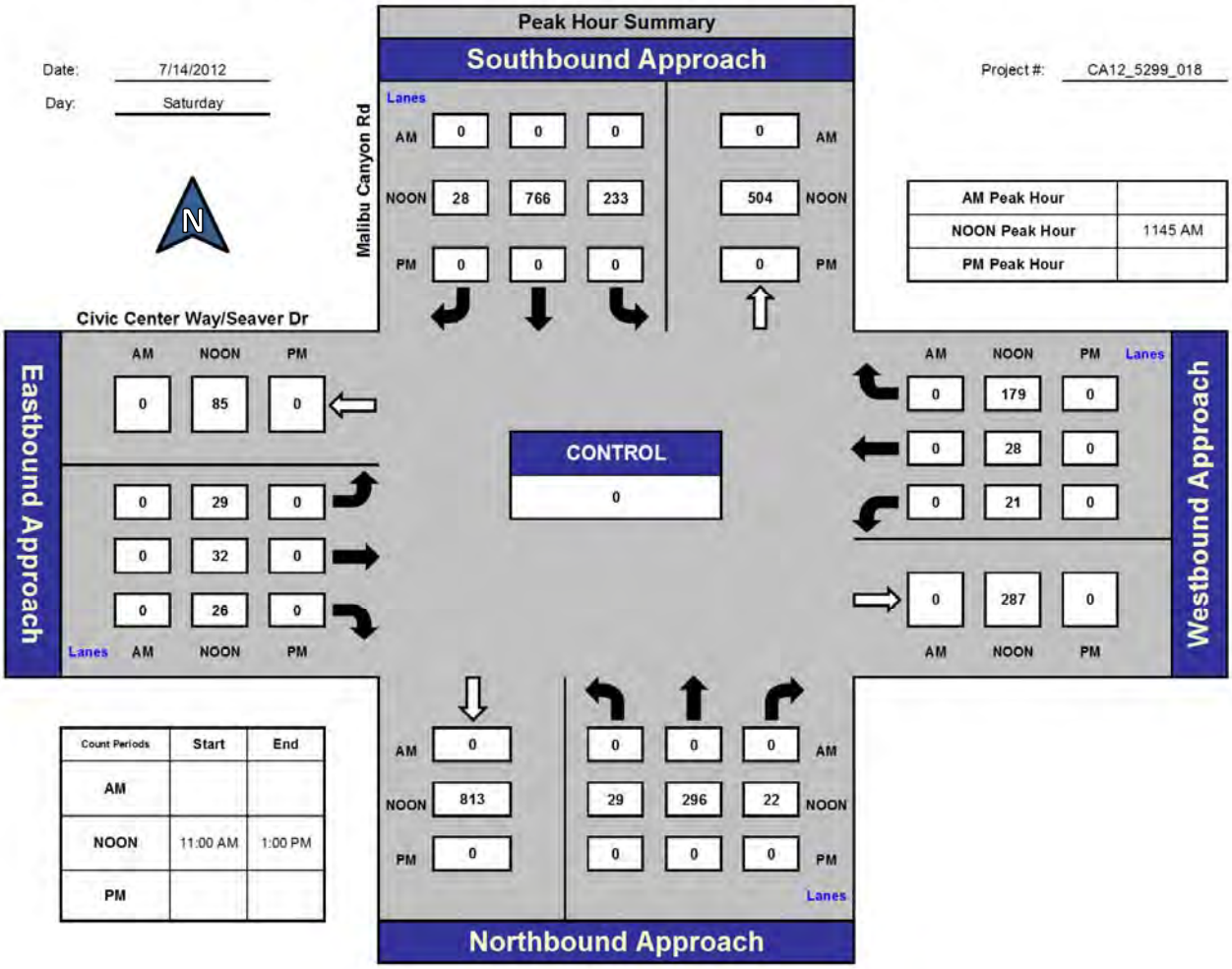
CONTROL :

ITM Peak Hour Summary

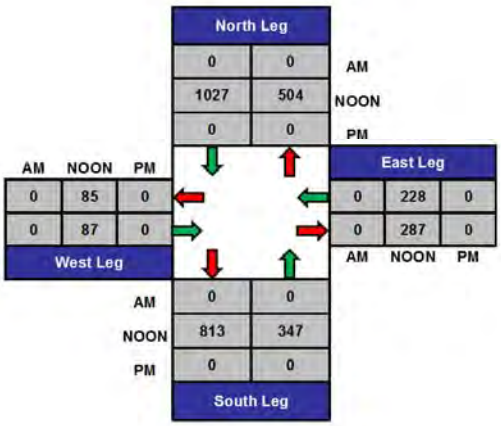
Prepared by:

National Data & Surveying Services

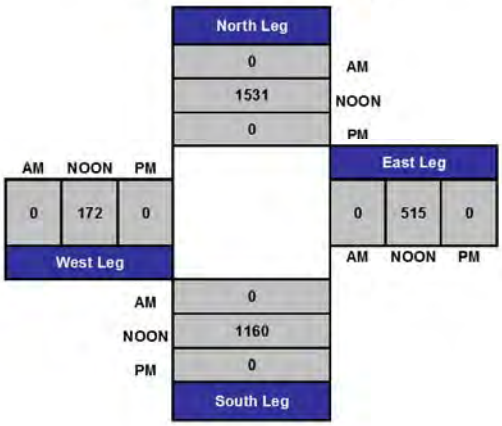
Malibu Canyon Rd and Civic Center Way/Seaver Dr , City of Malibu



Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_017 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

AM

NS/EW Streets:	Malibu Canyon Rd			Malibu Canyon Rd			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
7:00 AM	0	0	1	248	3	47	13	192	0	1	130	14	649
7:15 AM	0	3	2	215	2	39	18	178	1	2	120	20	600
7:30 AM	0	1	1	224	1	53	29	227	3	1	154	32	726
7:45 AM	0	0	2	203	2	55	22	194	0	2	178	37	695
8:00 AM	1	2	1	270	7	49	38	238	1	1	150	28	786
8:15 AM	0	1	3	200	3	35	20	198	2	2	178	32	674
8:30 AM	1	1	3	276	3	65	35	212	2	0	138	22	758
8:45 AM	1	3	0	210	2	67	42	236	3	1	185	41	791
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	3	11	13	1846	23	410	217	1675	12	10	1233	226	5679
APPROACH %'s :	11.11%	40.74%	48.15%	81.00%	1.01%	17.99%	11.40%	87.97%	0.63%	0.68%	83.93%	15.38%	
PEAK HR START TIME :	800 AM												TOTAL
PEAK HR VOL :	3	7	7	956	15	216	135	884	8	4	651	123	3009
PEAK HR FACTOR :		0.850			0.863			0.914			0.857		0.951

CONTROL :

Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_017 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

PM

NS/EW Streets:	Malibu Canyon Rd			Malibu Canyon Rd			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
4:00 PM	3	1	2	74	1	46	78	291	4	2	281	57	840
4:15 PM	4	0	4	52	2	52	83	312	1	6	266	64	846
4:30 PM	3	6	8	57	1	50	85	264	8	3	287	52	824
4:45 PM	2	2	3	67	2	40	94	307	4	2	314	63	900
5:00 PM	3	1	0	61	3	48	82	294	1	1	313	70	877
5:15 PM	1	0	1	112	6	51	67	264	8	7	288	60	865
5:30 PM	3	1	13	80	3	44	75	263	8	5	314	67	876
5:45 PM	1	4	7	88	1	30	53	242	5	9	256	75	771
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	20	15	38	591	19	361	617	2237	39	35	2319	508	6799
APPROACH %'s :	27.40%	20.55%	52.05%	60.87%	1.96%	37.18%	21.33%	77.32%	1.35%	1.22%	81.03%	17.75%	
PEAK HR START TIME :	445 PM												TOTAL
PEAK HR VOL :	9	4	17	320	14	183	318	1128	21	15	1229	260	3518
PEAK HR FACTOR :		0.441			0.765			0.906			0.974		0.977

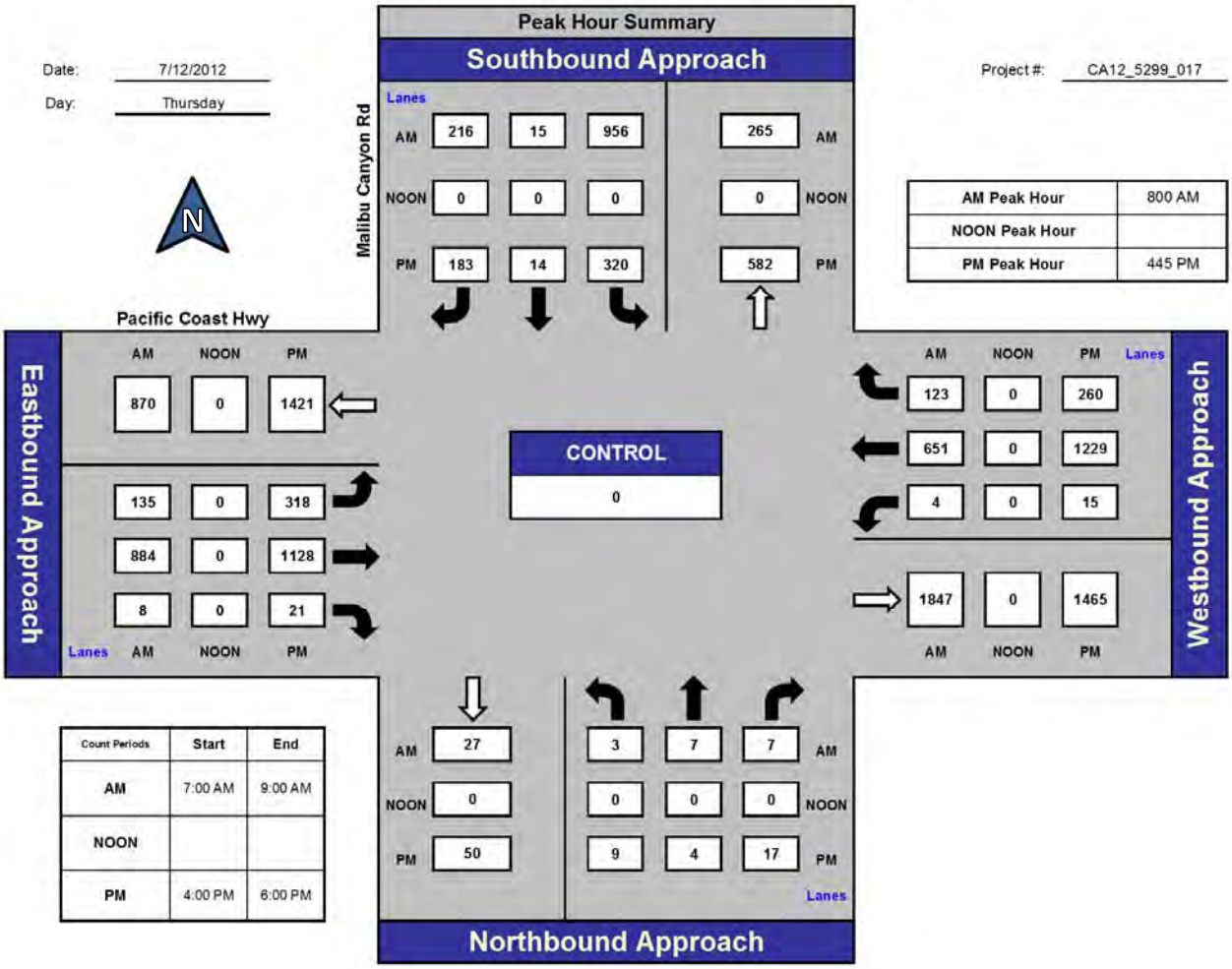
CONTROL :

ITM Peak Hour Summary

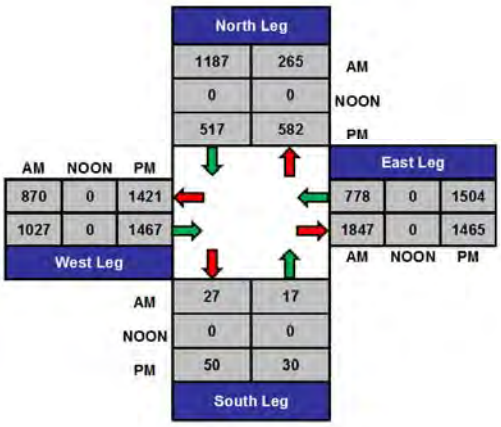
Prepared by:

National Data & Surveying Services

Malibu Canyon Rd and Pacific Coast Hwy , City of Malibu



Total Ins & Outs



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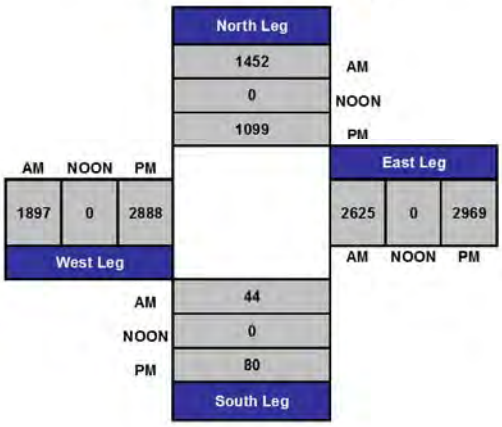


Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_017 **Day:** SATURDAY

City: City of Malibu **Date:** 07/14/2012

NOON

NS/EW Streets:	Malibu Canyon Rd			Malibu Canyon Rd			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
11:00 AM	2	4	10	66	6	90	33	248	13	4	321	47	844
11:15 AM	2	4	15	63	8	90	40	265	6	8	278	24	803
11:30 AM	2	2	11	81	6	111	44	244	11	11	326	57	906
11:45 AM	1	3	6	88	3	113	47	287	6	9	316	32	911
12:00 PM	5	1	12	72	9	100	50	275	9	12	305	21	871
12:15 PM	3	4	12	71	3	123	53	291	14	15	290	48	927
12:30 PM	6	7	21	79	7	117	50	317	8	9	355	37	1013
12:45 PM	12	4	10	58	9	109	40	373	9	7	360	36	1027
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	33	29	97	578	51	853	357	2300	76	75	2551	302	7302
APPROACH %'s :	20.75%	18.24%	61.01%	39.00%	3.44%	57.56%	13.06%	84.16%	2.78%	2.56%	87.12%	10.31%	
PEAK HR START TIME :	1200 PM												TOTAL
PEAK HR VOL :	26	16	55	280	28	449	193	1256	40	43	1310	142	3838
PEAK HR FACTOR :		0.713			0.932			0.882			0.927		0.934

CONTROL :

ITM Peak Hour Summary

Prepared by:

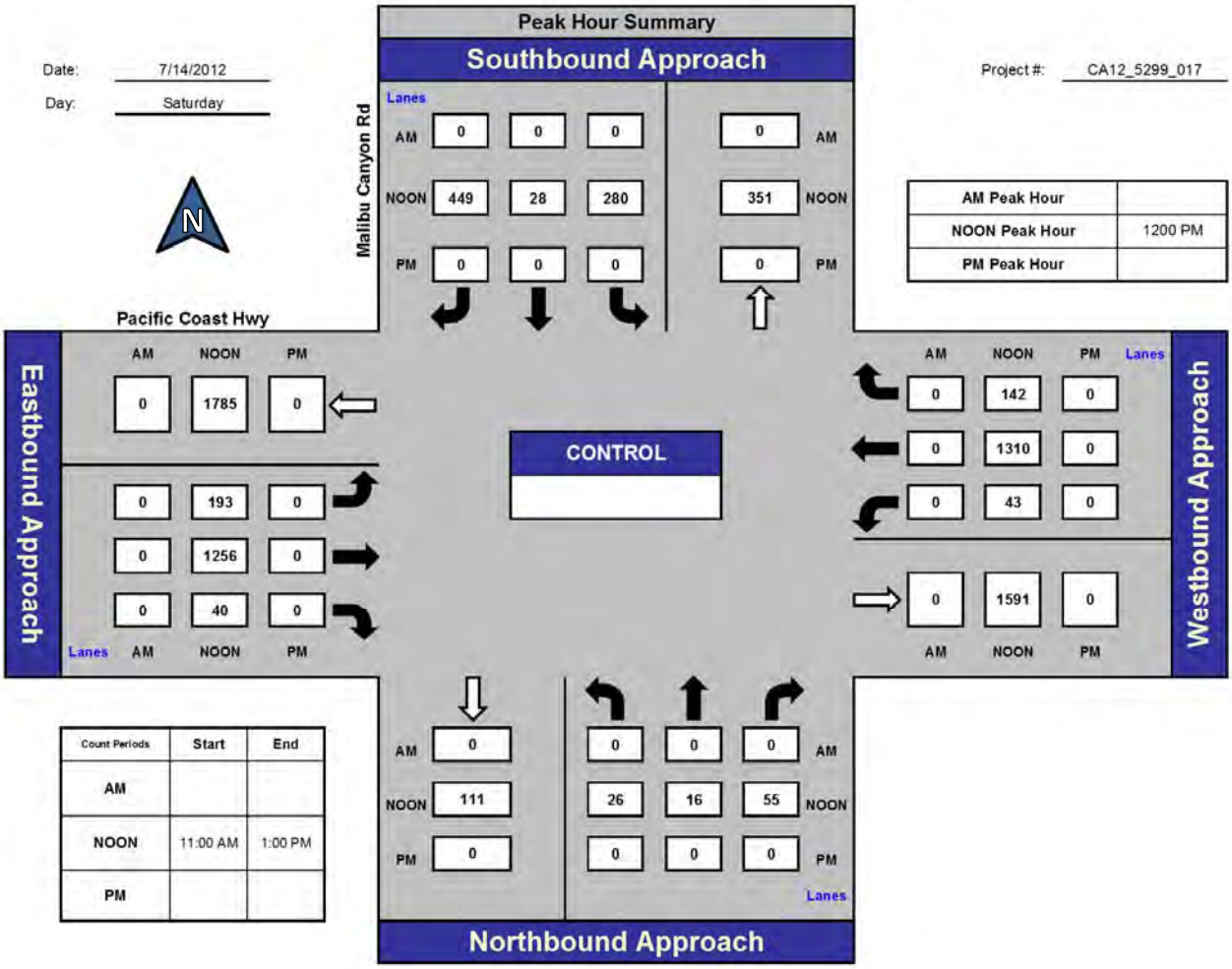
National Data & Surveying Services

Malibu Canyon Rd and Pacific Coast Hwy , City of Malibu

Date: 7/14/2012

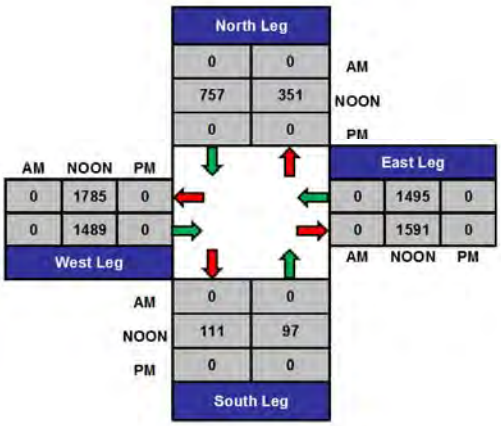
Day: Saturday

Project #: CA12_5299_017

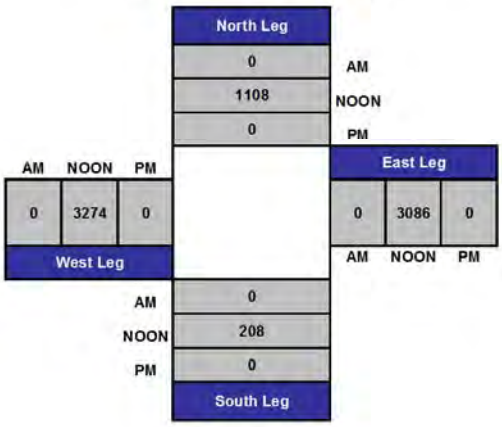


AM Peak Hour	
NOON Peak Hour	1200 PM
PM Peak Hour	

Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_020 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

AM

NS/EW Streets:	Webb Way			Webb Way			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
7:00 AM	7	7	2	4	0	4	23	419	26	18	128	29	667
7:15 AM	4	5	2	7	7	3	28	331	12	23	125	39	586
7:30 AM	12	9	5	10	5	6	30	405	11	21	162	54	730
7:45 AM	16	13	5	8	2	3	29	354	21	36	195	72	754
8:00 AM	10	9	2	12	11	7	23	404	10	26	160	61	735
8:15 AM	11	16	4	13	2	7	30	372	13	30	199	62	759
8:30 AM	17	10	2	11	11	7	31	411	26	34	135	46	741
8:45 AM	15	13	3	13	16	11	37	372	19	29	195	62	785
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	92	82	25	78	54	48	231	3068	138	217	1299	425	5757
APPROACH %'s :	46.23%	41.21%	12.56%	43.33%	30.00%	26.67%	6.72%	89.26%	4.02%	11.18%	66.92%	21.90%	
PEAK HR START TIME :	800 AM												TOTAL
PEAK HR VOL :	53	48	11	49	40	32	121	1559	68	119	689	231	3020
PEAK HR FACTOR :		0.903			0.756			0.934			0.893		0.962

CONTROL : Signalized

Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_020 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

PM

NS/EW Streets:	Webb Way			Webb Way			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
4:00 PM	38	22	10	40	20	19	18	306	20	54	260	82	889
4:15 PM	33	12	7	36	24	19	27	336	14	43	292	101	944
4:30 PM	34	21	7	45	22	13	10	291	11	47	298	85	884
4:45 PM	40	21	4	58	24	13	14	329	10	63	306	97	979
5:00 PM	40	25	7	56	21	18	17	314	14	52	314	91	969
5:15 PM	36	11	11	63	15	20	15	328	18	48	319	91	975
5:30 PM	32	15	7	46	16	18	10	301	12	41	296	101	895
5:45 PM	32	17	14	66	17	10	15	300	13	39	290	93	906
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	285	144	67	410	159	130	126	2505	112	387	2375	741	7441
APPROACH %'s :	57.46%	29.03%	13.51%	58.66%	22.75%	18.60%	4.59%	91.32%	4.08%	11.05%	67.80%	21.15%	
PEAK HR START TIME :	445 PM												TOTAL
PEAK HR VOL :	148	72	29	223	76	69	56	1272	54	204	1235	380	3818
PEAK HR FACTOR :		0.865			0.939			0.957			0.976		0.975

CONTROL : Signalized

ITM Peak Hour Summary

Prepared by:

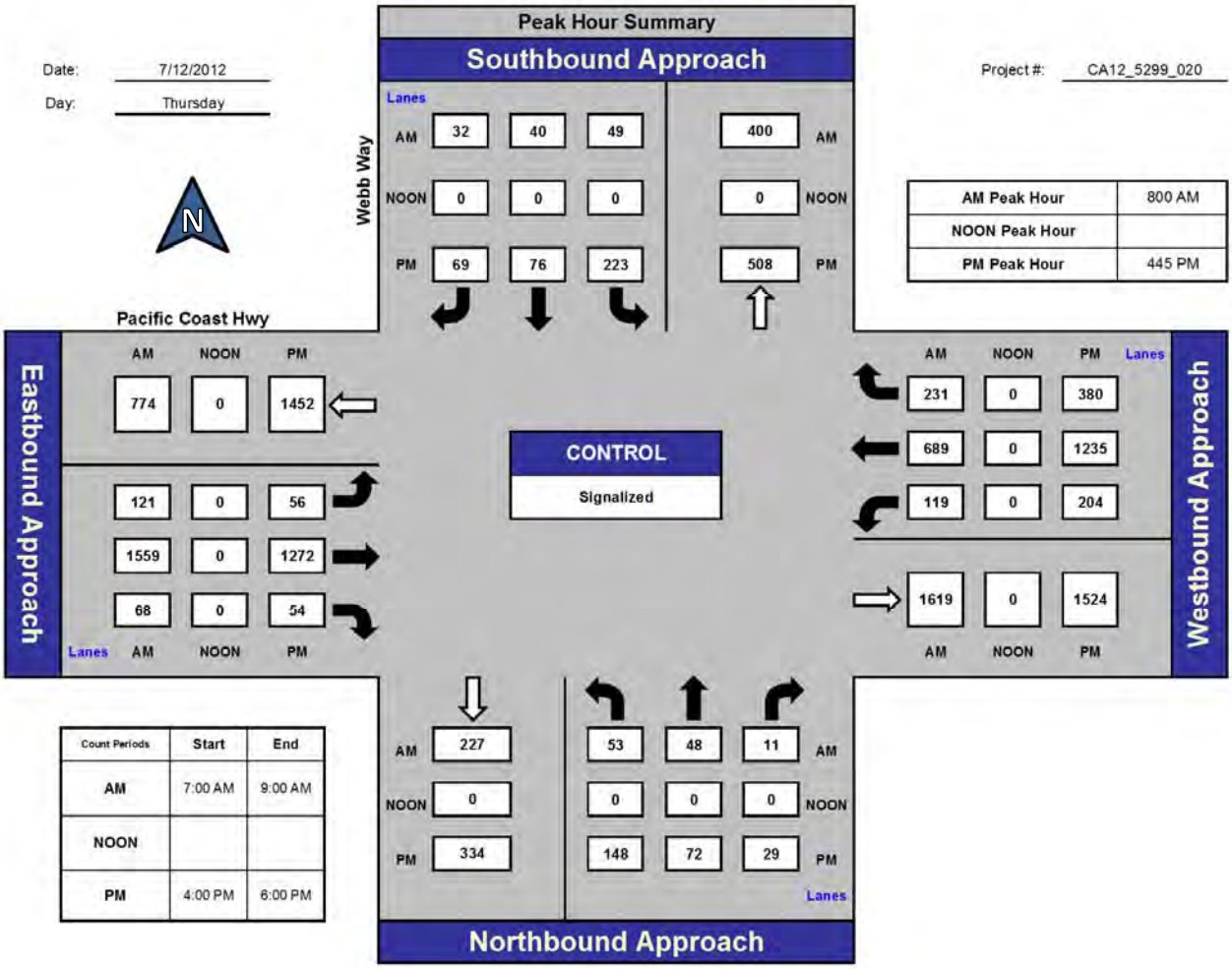
National Data & Surveying Services

Webb Way and Pacific Coast Hwy , City of Malibu

Date: 7/12/2012

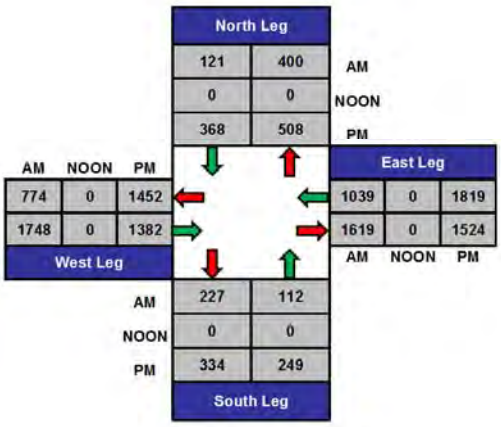
Day: Thursday

Project #: CA12_5299_020

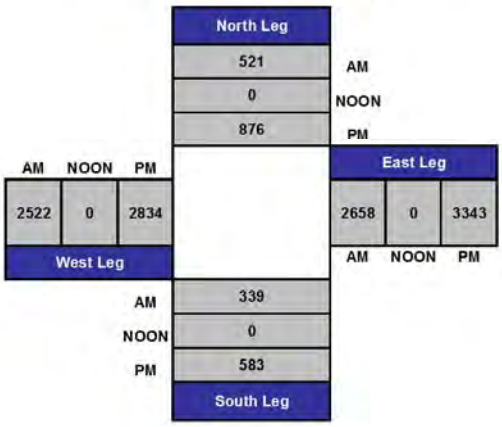


AM Peak Hour	800 AM
NOON Peak Hour	
PM Peak Hour	445 PM

Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_020 **Day:** SATURDAY

City: City of Malibu **Date:** 07/14/2012

NOON

NS/EW Streets:	Webb Way			Webb Way			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
11:00 AM	35	7	8	29	23	15	16	266	26	39	316	27	807
11:15 AM	42	22	3	24	18	4	21	261	23	54	265	27	764
11:30 AM	37	23	5	35	22	15	11	273	17	56	344	25	863
11:45 AM	30	21	10	30	19	8	32	289	18	54	290	24	825
12:00 PM	31	18	3	32	36	12	23	299	15	55	302	34	860
12:15 PM	25	16	9	30	14	16	25	329	18	66	336	21	905
12:30 PM	36	20	8	28	19	13	32	349	10	71	299	22	907
12:45 PM	35	17	10	26	32	16	22	346	22	61	362	38	987
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	271	144	56	234	183	99	182	2412	149	456	2514	218	6918
APPROACH %'s :	57.54%	30.57%	11.89%	45.35%	35.47%	19.19%	6.64%	87.93%	5.43%	14.30%	78.86%	6.84%	
PEAK HR START TIME :	1200 PM												TOTAL
PEAK HR VOL :	127	71	30	116	101	57	102	1323	65	253	1299	115	3659
PEAK HR FACTOR :		0.891			0.856			0.953			0.904		0.927

CONTROL : Signalized

ITM Peak Hour Summary

Prepared by:

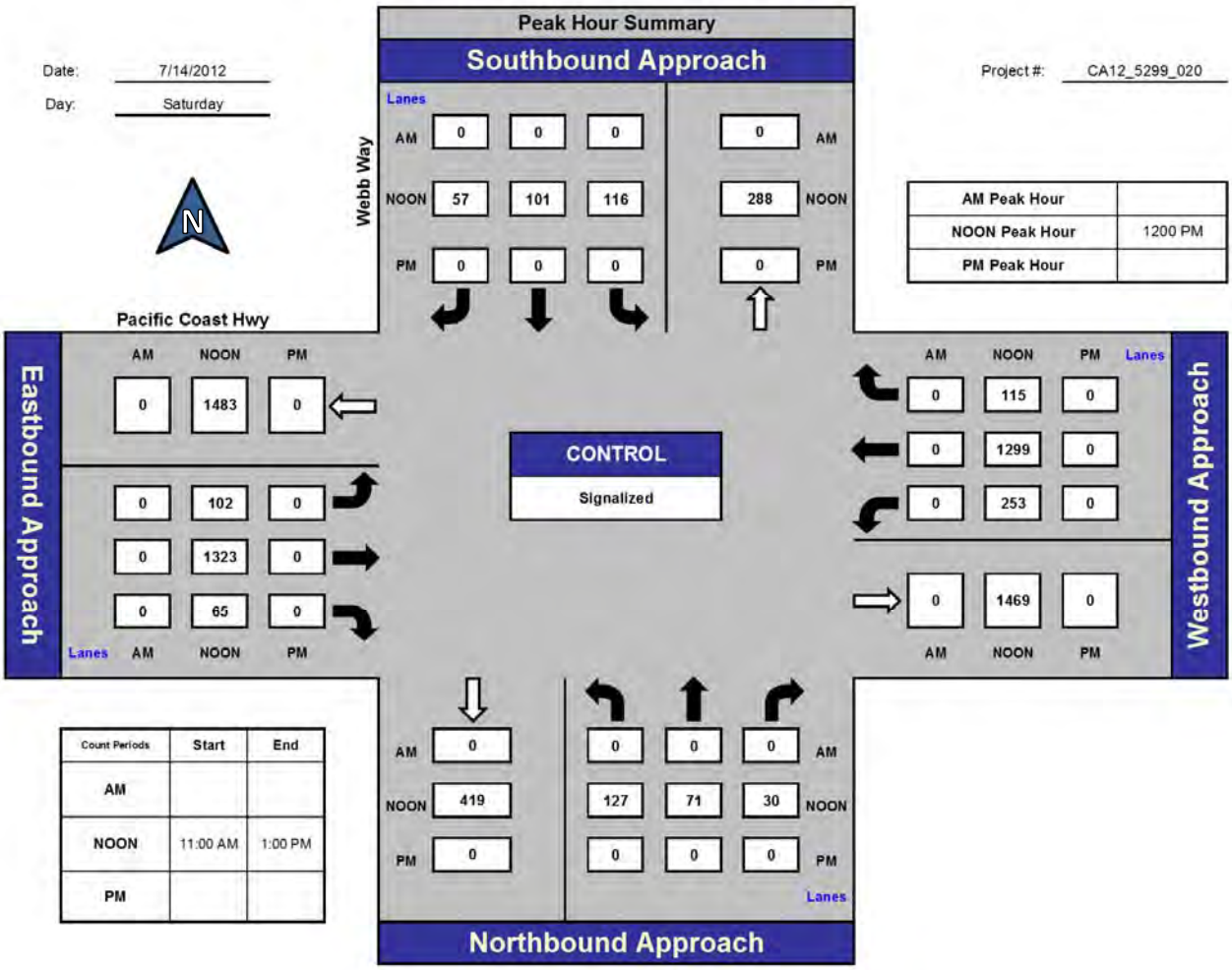
National Data & Surveying Services

Webb Way and Pacific Coast Hwy , City of Malibu

Date: 7/14/2012

Day: Saturday

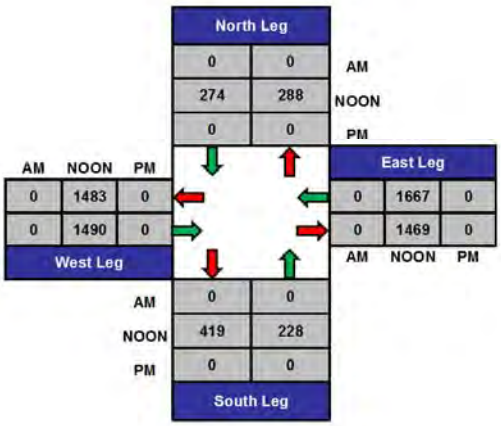
Project #: CA12_5299_020



AM Peak Hour	
NOON Peak Hour	1200 PM
PM Peak Hour	

Count Periods	Start	End
AM		
NOON	11:00 AM	1:00 PM
PM		

Total Ins & Outs



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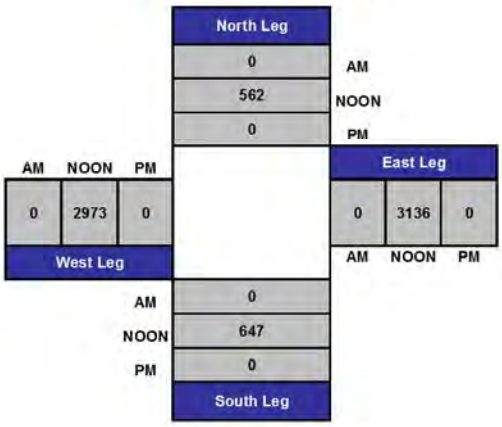


Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_022 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

AM

NS/EW Streets:	Cross Creek Rd			Cross Creek Rd			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
7:00 AM	2	1	1	19	1	9	21	401	2	0	154	17	628
7:15 AM	1	0	2	10	0	10	11	343	2	2	193	24	598
7:30 AM	1	0	0	17	0	8	19	419	1	0	225	35	725
7:45 AM	0	0	0	25	0	18	16	369	0	0	305	37	770
8:00 AM	0	0	1	23	0	15	32	412	2	2	239	32	758
8:15 AM	2	0	0	19	0	9	23	396	3	0	273	30	755
8:30 AM	1	0	1	24	0	18	16	424	2	1	212	28	727
8:45 AM	1	1	0	14	0	21	21	391	4	0	277	41	771
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	8	2	5	151	1	108	159	3155	16	5	1878	244	5732
APPROACH %'s :	53.33%	13.33%	33.33%	58.08%	0.38%	41.54%	4.77%	94.74%	0.48%	0.24%	88.29%	11.47%	
PEAK HR START TIME :	800 AM												TOTAL
PEAK HR VOL :	4	1	2	80	0	63	92	1623	11	3	1001	131	3011
PEAK HR FACTOR :		0.875			0.851			0.967			0.892		0.976

CONTROL : Signalized

Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_022 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

PM

NS/EW Streets:	Cross Creek Rd			Cross Creek Rd			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
4:00 PM	3	1	5	45	1	37	35	400	2	6	407	38	980
4:15 PM	3	1	2	32	0	26	21	412	3	0	410	47	957
4:30 PM	4	0	2	56	1	30	21	350	2	3	383	48	900
4:45 PM	3	3	8	44	1	33	26	389	7	6	453	51	1024
5:00 PM	3	2	2	54	0	37	21	419	2	3	447	47	1037
5:15 PM	5	2	6	53	0	34	26	405	3	3	416	37	990
5:30 PM	3	1	3	36	0	28	21	390	3	3	395	51	934
5:45 PM	1	2	1	34	1	30	25	378	2	1	424	34	933
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	25	12	29	354	4	255	196	3143	24	25	3335	353	7755
APPROACH %'s :	37.88%	18.18%	43.94%	57.75%	0.65%	41.60%	5.83%	93.46%	0.71%	0.67%	89.82%	9.51%	
PEAK HR START TIME :	445 PM												TOTAL
PEAK HR VOL :	14	8	19	187	1	132	94	1603	15	15	1711	186	3985
PEAK HR FACTOR :		0.732			0.879			0.968			0.937		0.961

CONTROL : Signalized

ITM Peak Hour Summary

Prepared by:

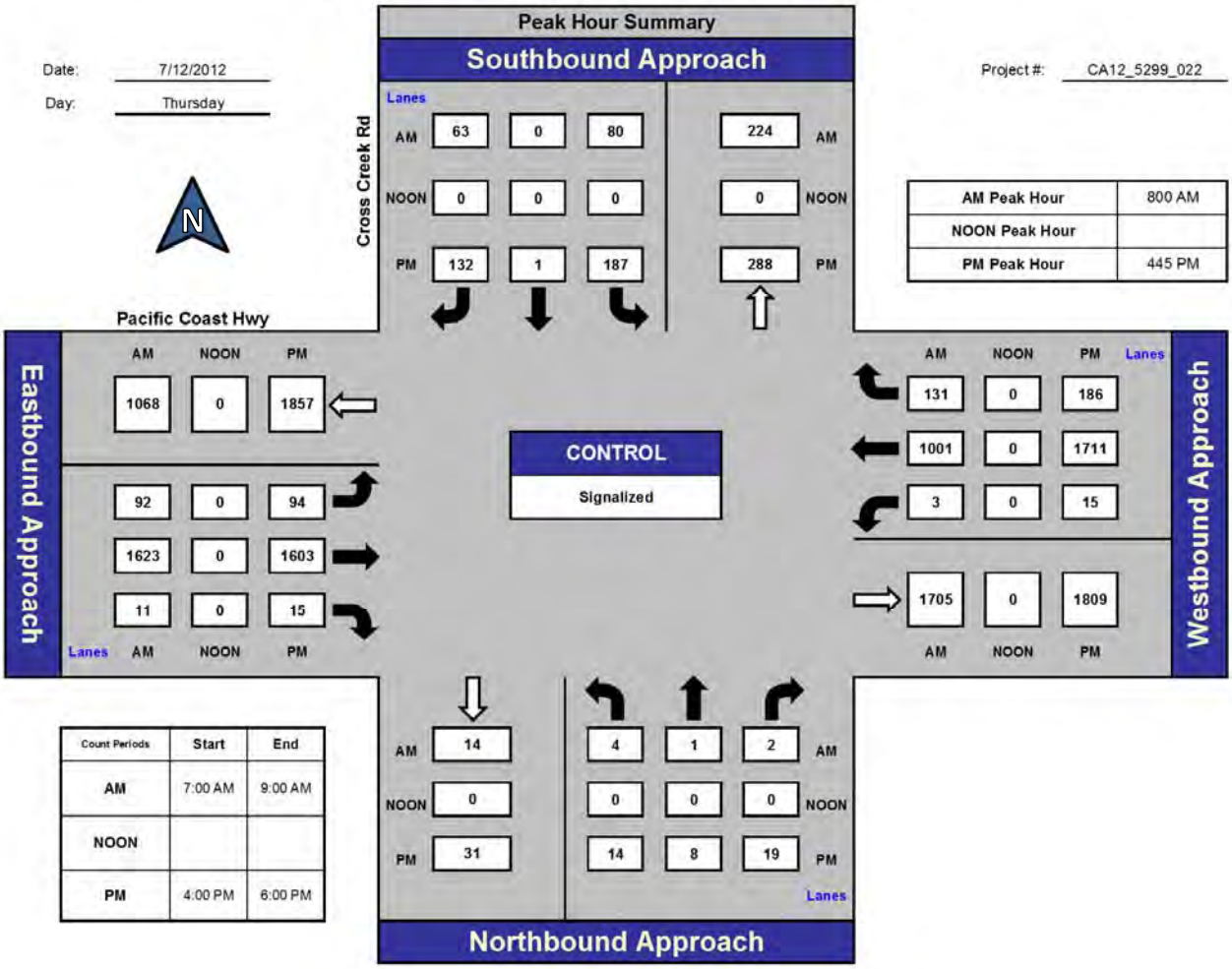
National Data & Surveying Services

Cross Creek Rd and Pacific Coast Hwy , City of Malibu

Date: 7/12/2012

Day: Thursday

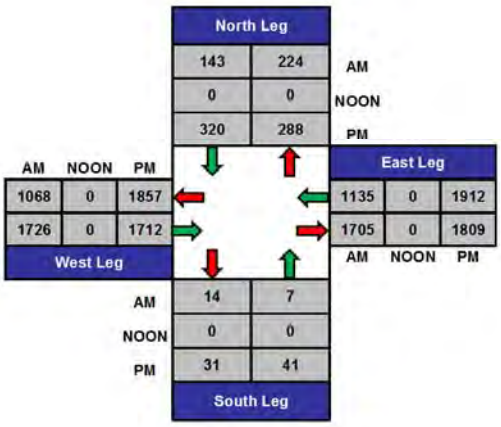
Project #: CA12_5299_022



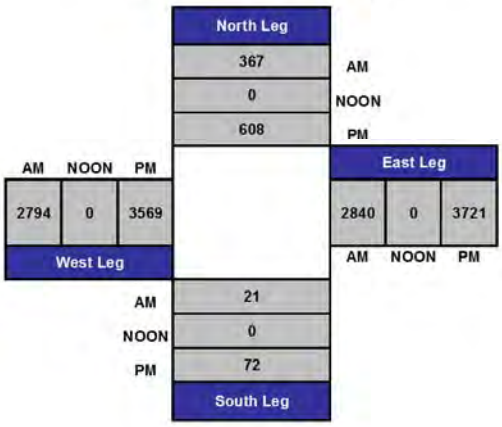
AM Peak Hour	800 AM
NOON Peak Hour	
PM Peak Hour	445 PM

Count Periods	Start	End
AM	7:00 AM	9:00 AM
NOON		
PM	4:00 PM	6:00 PM

Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_022 **Day:** SATURDAY

City: City of Malibu **Date:** 07/14/2012

NOON

NS/EW Streets:	Cross Creek Rd			Cross Creek Rd			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
11:00 AM	2	3	5	35	0	27	37	318	4	7	370	40	848
11:15 AM	3	0	5	31	0	24	30	316	3	4	360	43	819
11:30 AM	0	1	13	44	2	24	36	312	8	8	371	52	871
11:45 AM	4	1	5	53	1	27	42	342	5	7	324	35	846
12:00 PM	3	1	8	59	1	28	33	329	13	2	397	50	924
12:15 PM	7	2	13	40	1	26	35	354	8	7	399	59	951
12:30 PM	5	3	11	58	5	29	44	369	6	1	391	57	979
12:45 PM	1	0	14	52	0	26	32	387	6	14	438	43	1013
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	25	11	74	372	10	211	289	2727	53	50	3050	379	7251
APPROACH %'s :	22.73%	10.00%	67.27%	62.73%	1.69%	35.58%	9.42%	88.86%	1.73%	1.44%	87.67%	10.89%	
PEAK HR START TIME :	1200 PM												TOTAL
PEAK HR VOL :	16	6	46	209	7	109	144	1439	33	24	1625	209	3867
PEAK HR FACTOR :		0.773			0.883			0.951			0.938		0.954

CONTROL : Signalized

ITM Peak Hour Summary

Prepared by:

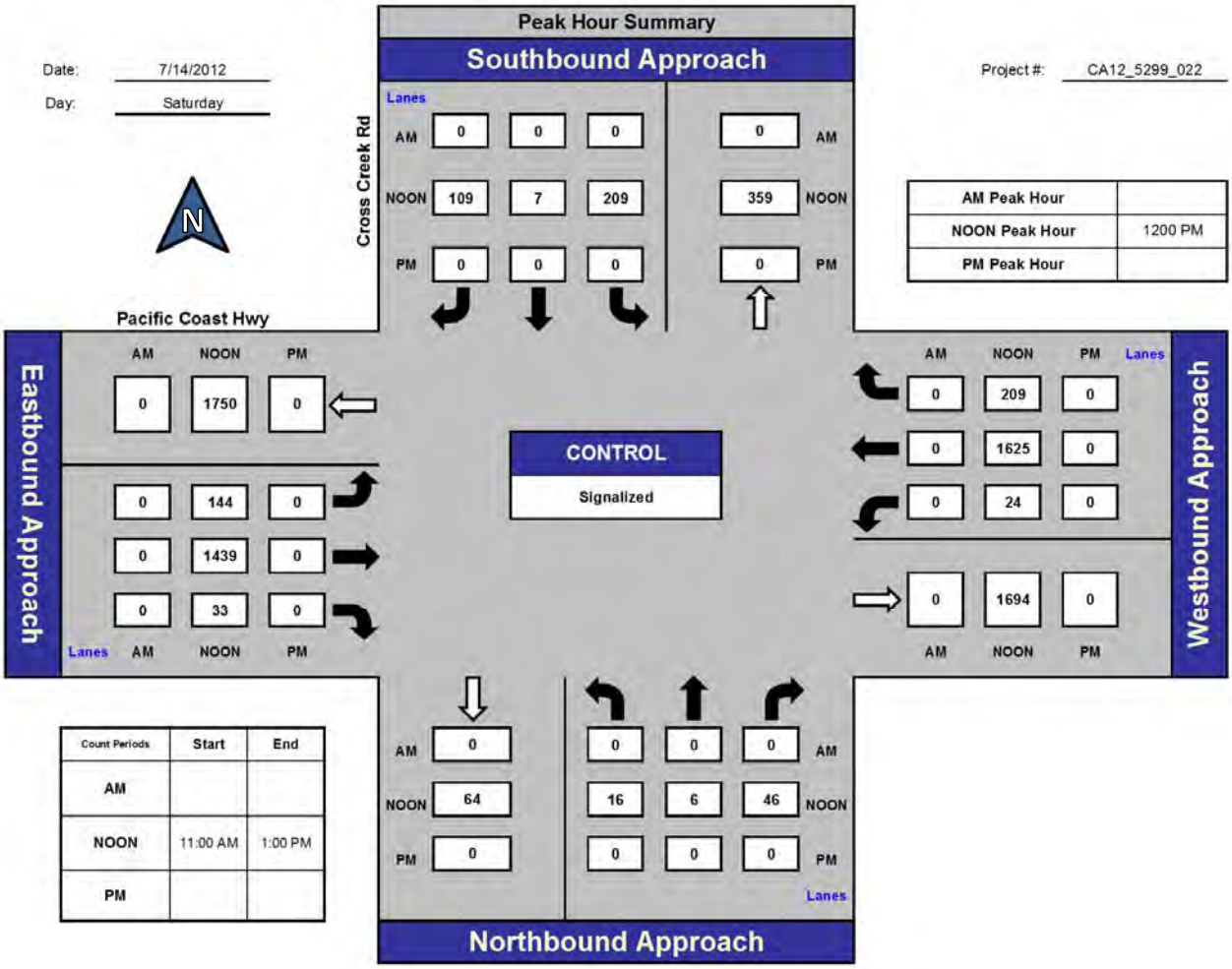
National Data & Surveying Services

Cross Creek Rd and Pacific Coast Hwy , City of Malibu

Date: 7/14/2012

Day: Saturday

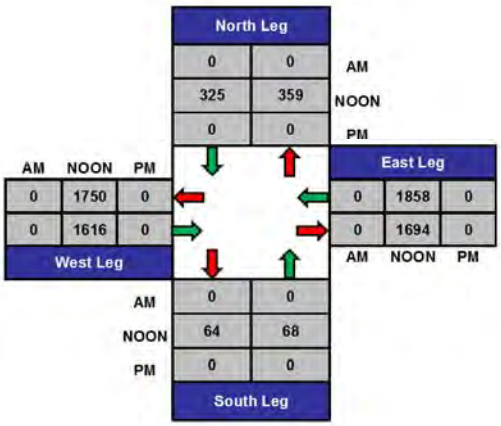
Project #: CA12_5299_022



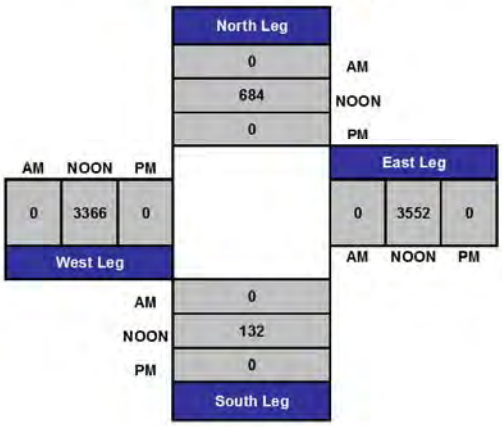
AM Peak Hour	
NOON Peak Hour	1200 PM
PM Peak Hour	

Count Periods	Start	End
AM		
NOON	11:00 AM	1:00 PM
PM		

Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_030 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

AM

NS/EW Streets:	Las Flores Canyon Rd.			Las Flores Canyon Rd.			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
7:00 AM	0	0	1	16	0	3	2	372	0	0	206	8	608
7:15 AM	1	0	0	9	0	7	5	362	0	0	259	8	651
7:30 AM	1	0	0	13	0	4	6	380	0	2	257	8	671
7:45 AM	1	0	0	15	0	12	4	407	0	0	323	7	769
8:00 AM	0	0	0	6	0	9	7	375	0	0	286	6	689
8:15 AM	0	0	0	6	1	7	6	380	0	1	270	7	678
8:30 AM	0	0	0	13	0	7	6	373	0	2	318	7	726
8:45 AM	3	1	2	5	0	12	4	364	3	2	307	7	710
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	6	1	3	83	1	61	40	3013	3	7	2226	58	5502
APPROACH %'s :	60.00%	10.00%	30.00%	57.24%	0.69%	42.07%	1.31%	98.59%	0.10%	0.31%	97.16%	2.53%	
PEAK HR START TIME :	745 AM												TOTAL
PEAK HR VOL :	1	0	0	40	1	35	23	1535	0	3	1197	27	2862
PEAK HR FACTOR :		0.250			0.704			0.948			0.930		0.930

CONTROL : Signalized

Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_030 **Day:** THURSDAY

City: City of Malibu **Date:** 7/12/2012

PM

NS/EW Streets:	Las Flores Canyon Rd.			Las Flores Canyon Rd.			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
4:00 PM	1	0	2	9	0	9	10	466	2	3	396	7	905
4:15 PM	3	1	6	10	0	9	7	397	6	3	399	5	846
4:30 PM	4	0	4	7	1	10	6	438	5	1	511	12	999
4:45 PM	0	0	4	5	1	9	9	399	3	5	420	10	865
5:00 PM	2	0	7	9	0	8	14	402	2	8	452	8	912
5:15 PM	4	1	0	9	0	7	12	460	7	4	404	9	917
5:30 PM	4	1	4	1	0	13	9	474	8	4	416	10	944
5:45 PM	1	0	2	8	0	8	12	393	6	2	370	15	817
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	19	3	29	58	2	73	79	3429	39	30	3368	76	7205
APPROACH %'s :	37.25%	5.88%	56.86%	43.61%	1.50%	54.89%	2.23%	96.67%	1.10%	0.86%	96.95%	2.19%	
PEAK HR START TIME :	430 PM												TOTAL
PEAK HR VOL :	10	1	15	30	2	34	41	1699	17	18	1787	39	3693
PEAK HR FACTOR :		0.722			0.917			0.917			0.880		0.924

CONTROL : Signalized

ITM Peak Hour Summary

Prepared by:

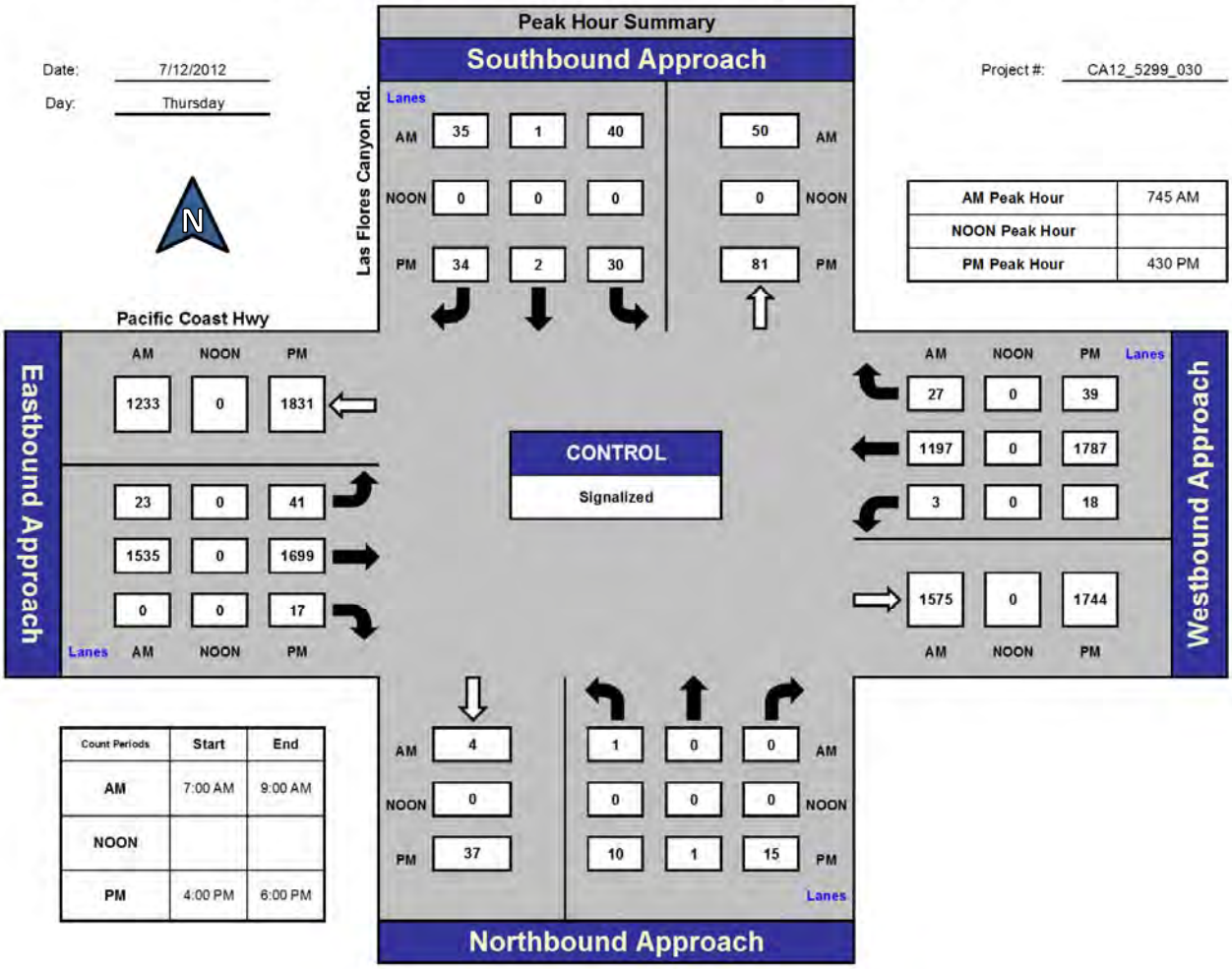
National Data & Surveying Services

Las Flores Canyon Rd. and Pacific Coast Hwy , City of Malibu

Date: 7/12/2012

Day: Thursday

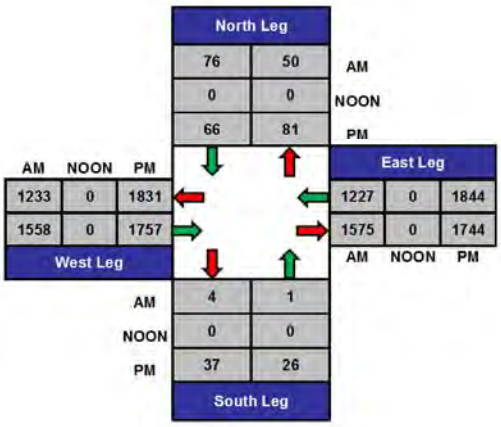
Project #: CA12_5299_030



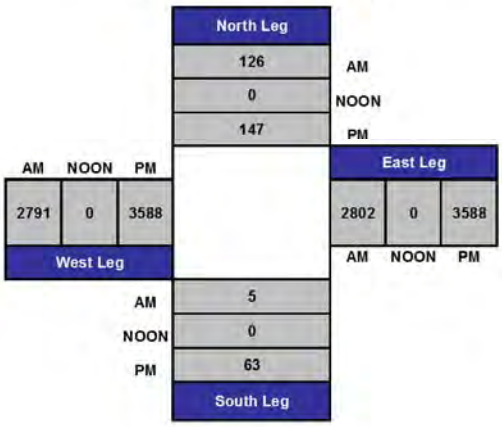
AM Peak Hour	745 AM
NOON Peak Hour	
PM Peak Hour	430 PM

Count Periods	Start	End
AM	7:00 AM	9:00 AM
NOON		
PM	4:00 PM	6:00 PM

Total Ins & Outs



Total Volume Per Leg



Intersection Turning Movement

Prepared by:

National Data & Surveying Services

Project ID: CA12_5299_030 **Day:** SATURDAY

City: City of Malibu **Date:** 07/14/2012

NOON

NS/EW Streets:	Las Flores Canyon Rd.			Las Flores Canyon Rd.			Pacific Coast Hwy			Pacific Coast Hwy			
	NORTHBOUND			SOUTHBOUND			EASTBOUND			WESTBOUND			
LANES:	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
11:00 AM	2	0	3	7	12	3	10	305	15	3	434	9	803
11:15 AM	1	0	2	14	0	10	6	294	5	7	406	9	754
11:30 AM	2	0	2	6	1	15	6	338	7	4	402	6	789
11:45 AM	2	0	2	6	0	16	8	321	8	15	419	4	801
12:00 PM	1	0	1	12	2	11	7	373	10	5	451	15	888
12:15 PM	1	0	3	7	0	13	9	341	10	9	422	5	820
12:30 PM	9	1	5	9	0	7	7	325	12	11	434	9	829
12:45 PM	5	0	8	6	0	10	5	385	12	19	426	9	885
	NL	NT	NR	SL	ST	SR	EL	ET	ER	WL	WT	WR	TOTAL
TOTAL VOLUMES :	23	1	26	67	15	85	58	2682	79	73	3394	66	6569
APPROACH %'s :	46.00%	2.00%	52.00%	40.12%	8.98%	50.90%	2.06%	95.14%	2.80%	2.07%	96.07%	1.87%	
PEAK HR START TIME :	1200 PM												TOTAL
PEAK HR VOL :	16	1	17	34	2	41	28	1424	44	44	1733	38	3422
PEAK HR FACTOR :		0.567			0.770			0.930			0.963		0.963

CONTROL : Signalized

ITM Peak Hour Summary

Prepared by:

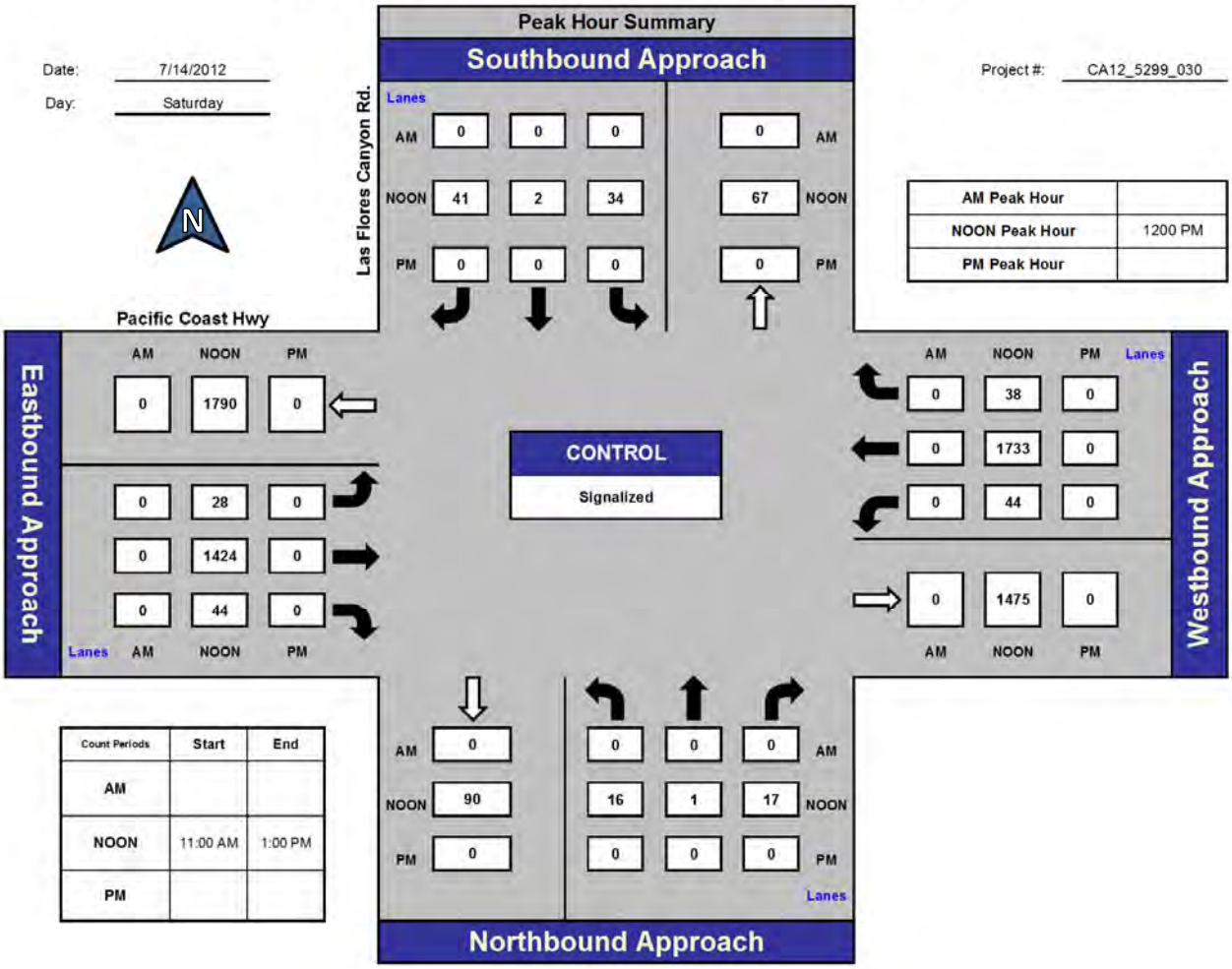
National Data & Surveying Services

Las Flores Canyon Rd. and Pacific Coast Hwy , City of Malibu

Date: 7/14/2012

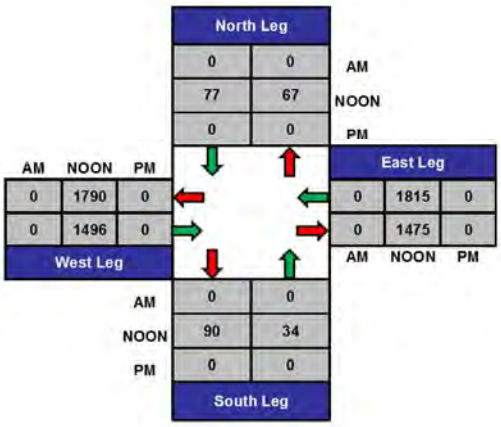
Day: Saturday

Project #: CA12_5299_030

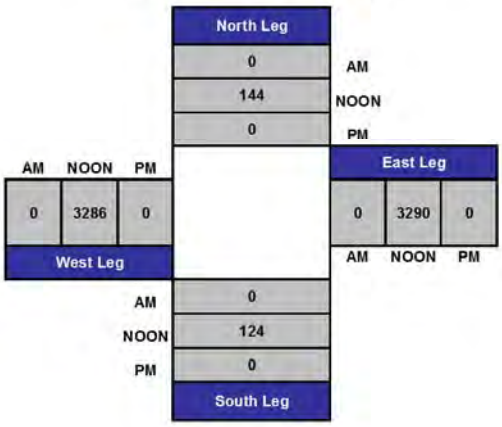


AM Peak Hour	
NOON Peak Hour	1200 PM
PM Peak Hour	

Total Ins & Outs



Total Volume Per Leg



APPENDIX C:
RELATED PROJECT TRIP GENERATION

APPENDIX C
RELATED PROJECT TRIP GENERATION

Project Name	ID	Address	Description	Size	TRIP GENERATION									
					Daily		AM		PM		Saturday DY		Saturday Pk	
					In	Out	In	Out	In	Out	In	Out	In	Out
Trancas Town	1	6155 Trancas Canyon Rd	32 townhomes	32	93	93	2	12	11	6	91	90	8	7
HOWS/Trancas Country Market	2	30745 PCH	25.728 ksf commercial	25.728	552	553	16	10	47	49	643	643	65	61
Malibu Sycamore Village	3	23575 Civic Center Way	37.698 ksf retail; 12.302 ksf office; 10 ksf restaurant	81	1,157	1,157	76	48	99	100	1,323	1,323	132	118
Rancho Malibu Hotel	4	4000 Malibu Canyon Rd	146 room hotel; 100 members fitness; 19.849 ksf hotel retail; 20.928 ksf hotel spa	146	1,029	1,029	68	38	74	82	1,584	1,584	110	112
La Paz Shopping Center	5	23465 Civic Center Way	112.058 ksf retail/office; 20 ksf institutional		2,082	2,082	114	49	171	219	2,602	2,601	256	235
Whole Foods Shopping Center	6	23401 Civic Center Way	34.425 ksf retail; 2.5 ksf high turnover restaurant; 1.5 ksf fast food restaurant		1,145	1,145	61	40	77	77	1,264	1,264	116	110
Santa Monica College	7	23555 Civic Center Way	25 ksf school facility	200	120	120	20	4	15	9	42	42	6	4
Pepperdine Campus Life Project	8	24255 PCH	394.137 ksf net development		(372)	(372)	(55)	(12)	(6)	(46)	-	-	-	-
Pierview	9	22716 PCH	7.1 ksf restaurant	7.1	319	320	5	1	36	17	335	335	45	32
Windsail	10	22706 PCH	5.904 ksf restaurant	5.904	266	265	4	1	30	14	279	278	38	26
Hajian	11	24903 PCH	9.685 ksf office	9.685	53	54	13	2	2	12	11	12	2	2
New office/retail	12	22959 PCH	2.63 ksf office 4.517 ksf retail	2.63	111	112	7	2	9	12	116	116	12	11
New office	13	22729 PCH	2.499 ksf office	2.499	14	14	3	1	1	3	3	3	1	-
Carbon Condos	14	22065 PCH	New Condominiums		23	23	1	3	3	1	23	22	2	2
Single Family Homes	15	18805, 07, 09 PCH	3 single family homes		15	14	1	2	2	1	15	15	1	2
Single Family Homes	16	22301, 03, 05, 09 PCH	4 single family homes		19	19	1	2	3	1	20	20	2	2
Single Family Homes	17	21997 and 22003 PCH	2 single family homes		10	9	1	1	1	1	10	10	1	1
Serra Retreat	18	3314 Serra Rd	3 lot subdivision		15	14	1	2	2	1	15	15	1	2
Single Family Homes	19	20624 and 20630 PCH	2 single family homes		10	9	1	1	1	1	10	10	1	1
Seaboard	20	21100 Seaboard	4 lot LLA and 1 single family		5	5	1	-	-	1	5	5	1	-
Sea Star Estates	21	6270, 6304, 6312, 6282, and 6398 Sea Star Dr	5 single family homes		24	24	1	3	3	2	25	25	3	2
Malibu High School	22	30215 Morning View Dr	Sport field lighting		*	*	*	*	*	*	*	*	*	*
28811 PCH Subdivision	23	28811 PCH	3 lot subdivision		15	14	1	2	2	1	15	15	1	2
LA County Fire Station No. 71	24	28722 PCH	Fire station reconstruction		*	*	*	*	*	*	*	*	*	*
Galahad Subdivision	25	6061 Galahad Rd	5 lot subdivision with 4 buildable lots		19	19	1	2	3	1	20	20	2	2
Zuma Mesa	26	6271 and 6277 Zuma Mesa Dr	2 single family homes		10	9	1	1	1	1	10	10	1	1
Sea Level	27	31864 and 31866 Sea Level Dr	LLA and 2 single family homes		10	9	1	1	1	1	10	10	1	1
Single Family Homes	28	5905 and 5909 Latigo Canyon Rd	LLA and 2 single family homes		10	9	1	1	1	1	10	10	1	1
Single Family Homes	29	27535 PCH	Subdivision of one lot to 2 single family homes		10	9	1	1	1	1	10	10	1	1
Puerco Canyon Rd Extension	30	3500 Puerco Canyon Rd	Road extension		*	*	*	*	*	*	*	*	*	*
Crummer Site Subdivision	31	24120 PCH	5 single family homes and baseball field		84	84	1	3	33	32	485	483	49	48
Towing Subdivision	32	23915 PCH	7 lot subdivision (4 residential)		19	19	1	2	3	1	20	20	2	2

Notes:

* = Project is an infrastructure project that is not anticipated to generate trips.

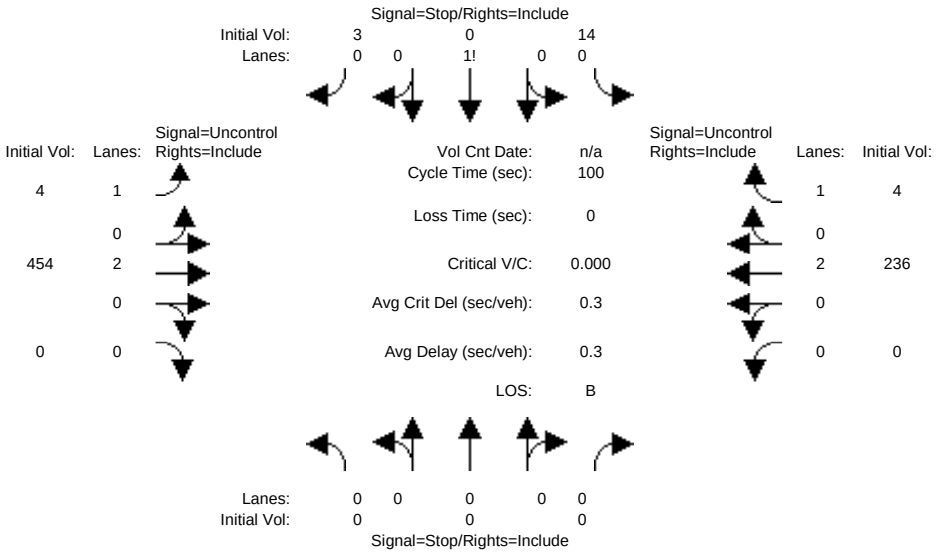
- = Negligible trip generation

APPENDIX D
LEVEL OF SERVICE WORKSHEETS

EXISTING

Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
EXAM

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	14	0	3	4	454	0	0	236	4
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	14	0	3	4	454	0	0	236	4
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	14	0	3	4	454	0	0	236	4
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	14	0	3	4	454	0	0	236	4
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	14	0	3	4	454	0	0	236	4
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	471	698	118	240	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	527	367	918	1339	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	525	366	918	1339	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.03	0.00	0.00	0.00	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	7.7	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	568	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.1	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	11.5	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	B	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			11.5			xxxxxx			xxxxxx		
ApproachLOS:	*			B			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0 0	0 0	0	0 0	1! 0	0	1 0	2 0	0	0 0	2 0	1
Initial Vol:	0	0	0	14	0	3	4	454	0	0	236	4
ApproachDel:	xxxxxx			11.5			xxxxxx			xxxxxx		

Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=17]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=715]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0 0	0 0	0	0 0	1! 0	0	1 0	2 0	0	0 0	2 0	1
Initial Vol:	0	0	0	14	0	3	4	454	0	0	236	4

Major Street Volume: 698
Minor Approach Volume: 17
Minor Approach Volume Threshold: 409

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

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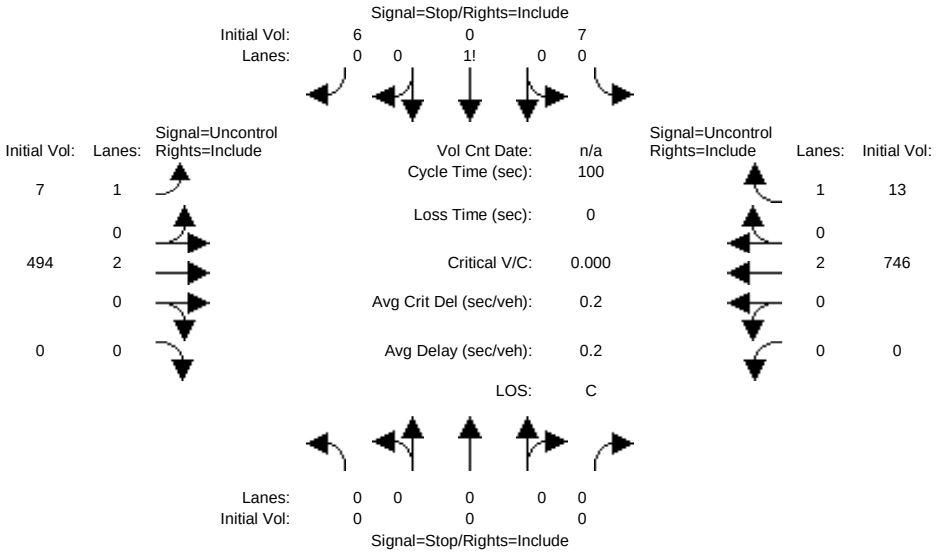
Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
EXPM

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	7	0	6	7	494	0	0	746	13
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	7	0	6	7	494	0	0	746	13
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	7	0	6	7	494	0	0	746	13
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	7	0	6	7	494	0	0	746	13
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	7	0	6	7	494	0	0	746	13
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	1007	1254	373	759	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	241	173	630	862	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	239	172	630	862	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.03	0.00	0.01	0.01	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	9.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	335	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.1	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	16.2	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	C	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			16.2			xxxxxx			xxxxxx		
ApproachLOS:	*			C			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0     7    0     6     7  494     0     0  746    13
ApproachDel:    xxxxxx             16.2           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=13]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1273]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                 Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0     7    0     6     7  494     0     0  746    13
------------|---------------||---------------||---------------||---------------|
Major Street Volume:             1260
Minor Approach Volume:           13
Minor Approach Volume Threshold: 205
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
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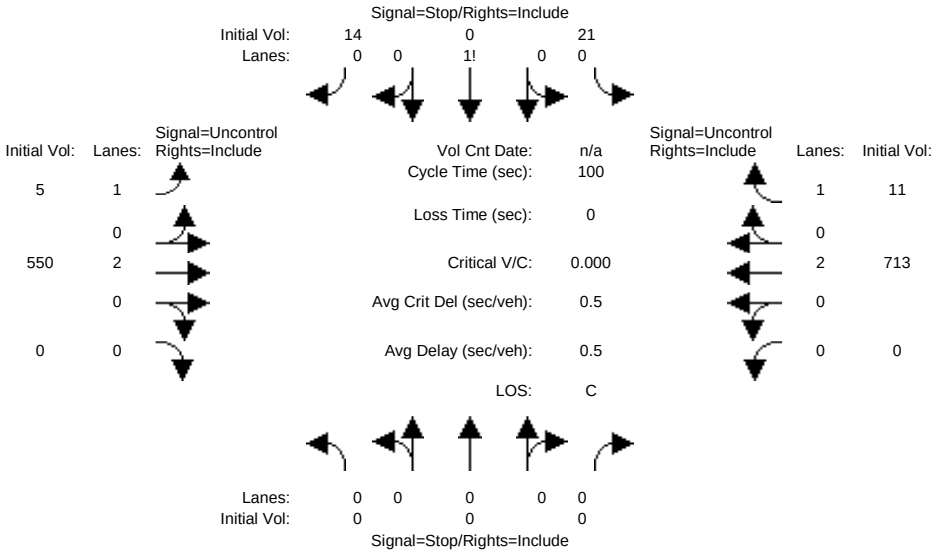
Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
EXSAT

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	21	0	14	5	550	0	0	713	11
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	21	0	14	5	550	0	0	713	11
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	21	0	14	5	550	0	0	713	11
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	21	0	14	5	550	0	0	713	11
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	21	0	14	5	550	0	0	713	11
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	998	1273	357	724	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	244	169	646	888	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	243	168	646	888	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.09	0.00	0.02	0.01	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	9.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	324	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.4	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	17.5	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	C	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			17.5			xxxxxx			xxxxxx		
ApproachLOS:	*			C			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    21    0    14     5  550     0     0  713    11
ApproachDel:    xxxxxx             17.5           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.2]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=35]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1314]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    21    0    14     5  550     0     0  713    11
------------|---------------||---------------||---------------||---------------|
Major Street Volume:             1279
Minor Approach Volume:           35
Minor Approach Volume Threshold: 200
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
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jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
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Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 2) TRANCAS CYN RD & PCH
Description: EXISTING CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	17	0	0.000	N-S(1):	0.090 *
	TH	1.00	7	1,600	0.088	N-S(2):	0.089
	LT	0.00	116	1,600	0.073 *	E-W(1):	0.179 *
Westbound	RT	0.00	77	0	0.000	E-W(2):	0.134
	TH	2.00	271	3,200	0.109		
	LT	1.00	30	1,600	0.019 *	V/C:	0.269
Northbound	RT	0.00	17	0	0.000	Lost Time:	0.050
	TH	1.00	8	1,600	0.017 *	ITS:	0.000
	LT	0.00	2	1,600	0.001		
Eastbound	RT	0.00	3	0	0.000	ICU:	0.319
	TH	2.00	510	3,200	0.160 *		
	LT	1.00	40	1,600	0.025	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	35	0	0.000	N-S(1):	0.120 *
	TH	1.00	3	1,600	0.103	N-S(2):	0.106
	LT	0.00	127	1,600	0.079 *	E-W(1):	0.203
Westbound	RT	0.00	111	0	0.000	E-W(2):	0.310 *
	TH	2.00	804	3,200	0.286 *		
	LT	1.00	44	1,600	0.028	V/C:	0.430
Northbound	RT	0.00	52	0	0.000	Lost Time:	0.050
	TH	1.00	9	1,600	0.041 *	ITS:	0.000
	LT	0.00	5	1,600	0.003		
Eastbound	RT	0.00	9	0	0.000	ICU:	0.480
	TH	2.00	551	3,200	0.175		
	LT	1.00	39	1,600	0.024 *	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 3) KANAN DUME RD & PCH
Description: EXISTING CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	SBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	250	1,600	0.069 *	N-S(1):	0.069 *
	TH	0.00	0	0	0.000	N-S(2):	0.069 *
	LT	2.00	199	2,880	0.069 *	E-W(1):	0.210
Westbound	RT	1.00	106	1,600	0.066	E-W(2):	0.275 *
	TH	2.00	601	3,200	0.188 *		
	LT	0.00	0	0	0.000	V/C:	0.344
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000 *	ITS:	0.000
	LT	0.00	0	0	0.000 *		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.394
	TH	2.00	672	3,200	0.210		
	LT	1.00	139	1,600	0.087 *	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	194	1,600	0.000	N-S(1):	0.054 *
	TH	0.00	0	0	0.000	N-S(2):	0.000
	LT	2.00	155	2,880	0.054 *	E-W(1):	0.304
Westbound	RT	1.00	247	1,600	0.154	E-W(2):	0.529 *
	TH	2.00	1,006	3,200	0.314 *		
	LT	0.00	0	0	0.000	V/C:	0.583
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000 *	ITS:	0.000
	LT	0.00	0	0	0.000		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.633
	TH	2.00	972	3,200	0.304		
	LT	1.00	344	1,600	0.215 *	LOS:	B

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 4) ZUMIREZ RD & PCH
Description: EXISTING CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	9	0	0.000	N-S(1):	0.030
	TH	1.00	3	1,600	0.010 *	N-S(2):	0.036 *
	LT	0.00	4	1,600	0.003	E-W(1):	0.320 *
Westbound	RT	0.00	6	0	0.000	E-W(2):	0.211
	TH	2.00	652	3,200	0.206		
	LT	1.00	107	1,600	0.067 *	V/C:	0.356
Northbound	RT	1.00	82	1,600	0.018	Lost Time:	0.050
	TH	1.00	2	1,600	0.027	ITS:	0.000
	LT	0.00	41	1,600	0.026 *		
Eastbound	RT	1.00	35	1,600	0.009	ICU:	0.406
	TH	2.00	811	3,200	0.253 *		
	LT	1.00	8	1,600	0.005	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	10	0	0.000	N-S(1):	0.048 *
	TH	1.00	0	1,600	0.009	N-S(2):	0.036
	LT	0.00	4	1,600	0.003 *	E-W(1):	0.380
Westbound	RT	0.00	7	0	0.000	E-W(2):	0.386 *
	TH	2.00	1,221	3,200	0.384 *		
	LT	1.00	59	1,600	0.037	V/C:	0.434
Northbound	RT	1.00	102	1,600	0.045 *	Lost Time:	0.050
	TH	1.00	3	1,600	0.029	ITS:	0.000
	LT	0.00	43	1,600	0.027		
Eastbound	RT	1.00	23	1,600	0.001	ICU:	0.484
	TH	2.00	1,097	3,200	0.343		
	LT	1.00	3	1,600	0.002 *	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 5) MALIBU CYN RD & CIVIC CTR WAY
Description: EXISTING CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	Y
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:	NBR, SBR, EBR, WBR		

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	199	1,600	0.000	N-S(1):	0.075
	TH	2.00	1,171	3,200	0.366 *	N-S(2):	0.382 *
	LT	1.00	19	1,600	0.012	E-W(1):	0.071 *
Westbound	RT	1.00	208	1,600	0.000	E-W(2):	0.000
	TH	1.00	92	1,600	0.058 *		
	LT	1.00	16	1,600	0.010	V/C:	0.453
Northbound	RT	1.00	23	1,600	0.000	Lost Time:	0.050
	TH	2.00	200	3,200	0.063	ITS:	0.000
	LT	1.00	25	1,600	0.016 *		
Eastbound	RT	1.00	9	1,600	0.000	ICU:	0.503
	TH	0.76	14	1,211	0.012		
	LT	1.24	23	1,790	0.013 *	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	44	1,600	0.000	N-S(1):	0.283 *
	TH	2.00	464	3,200	0.145	N-S(2):	0.159
	LT	1.00	186	1,600	0.116 *	E-W(1):	0.139 *
Westbound	RT	1.00	609	1,600	0.000	E-W(2):	0.000
	TH	1.00	35	1,600	0.022 *		
	LT	1.00	17	1,600	0.011	V/C:	0.422
Northbound	RT	1.00	27	1,600	0.000	Lost Time:	0.050
	TH	2.00	534	3,200	0.167 *	ITS:	0.000
	LT	1.00	22	1,600	0.014		
Eastbound	RT	1.00	37	1,600	0.000	ICU:	0.472
	TH	0.61	103	978	0.105		
	LT	1.39	234	2,000	0.117 *	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 6) MALIBU CYN RD & PCH
Description: EXISTING CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	216	1,600	0.112	N-S(1):	0.342 *
	TH	0.03	15	49	0.303	N-S(2):	0.000
	LT	1.97	956	2,836	0.337 *	E-W(1):	0.282 *
Westbound	RT	1.00	123	1,600	0.000	E-W(2):	0.250
	TH	2.00	651	3,200	0.203		
	LT	1.00	4	1,600	0.003 *	V/C:	0.624
Northbound	RT	0.00	7	0	0.000	Lost Time:	0.050
	TH	2.00	7	3,200	0.005 *	ITS:	0.000
	LT	0.00	3	1,600	0.002		
Eastbound	RT	0.00	8	0	0.000	ICU:	0.674
	TH	2.00	884	3,200	0.279 *		
	LT	2.00	135	2,880	0.047	LOS:	B

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	183	1,600	0.059	N-S(1):	0.127 *
	TH	0.08	14	134	0.104	N-S(2):	0.000
	LT	1.92	320	2,759	0.116 *	E-W(1):	0.368
Westbound	RT	1.00	260	1,600	0.047	E-W(2):	0.494 *
	TH	2.00	1,229	3,200	0.384 *		
	LT	1.00	15	1,600	0.009	V/C:	0.621
Northbound	RT	0.00	17	1,600	0.011 *	Lost Time:	0.050
	TH	2.00	4	1,600	0.008	ITS:	0.000
	LT	0.00	9	1,600	0.006		
Eastbound	RT	0.00	21	0	0.000	ICU:	0.671
	TH	2.00	1,128	3,200	0.359		
	LT	2.00	318	2,880	0.110 *	LOS:	B

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 7) WEBB WY & PCH
Description: EXISTING CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	32	1,600	0.000	N-S(1):	0.068 *
	TH	0.90	40	1,438	0.028	N-S(2):	0.000
	LT	1.10	49	1,586	0.031 *	E-W(1):	0.399 *
Westbound	RT	1.00	231	1,600	0.113	E-W(2):	0.291
	TH	2.00	689	3,200	0.215		
	LT	1.00	119	1,600	0.074 *	V/C:	0.467
Northbound	RT	0.00	11	0	0.000	Lost Time:	0.050
	TH	1.00	48	1,600	0.037 *	ITS:	0.000
	LT	1.00	53	1,600	0.033		
Eastbound	RT	1.00	68	1,600	0.026	ICU:	0.517
	TH	3.00	1,559	4,800	0.325 *		
	LT	1.00	121	1,600	0.076	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	69	1,600	0.026	N-S(1):	0.197 *
	TH	0.51	76	813	0.093	N-S(2):	0.000
	LT	1.49	223	2,148	0.104 *	E-W(1):	0.393
Westbound	RT	1.00	380	1,600	0.134	E-W(2):	0.421 *
	TH	2.00	1,235	3,200	0.386 *		
	LT	1.00	204	1,600	0.128	V/C:	0.618
Northbound	RT	0.00	29	0	0.000	Lost Time:	0.050
	TH	1.00	72	1,600	0.063	ITS:	0.000
	LT	1.00	148	1,600	0.093 *		
Eastbound	RT	1.00	54	1,600	0.000	ICU:	0.668
	TH	3.00	1,272	4,800	0.265		
	LT	1.00	56	1,600	0.035 *	LOS:	B

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 8) CROSS CREEK RD & PCH
Description: EXISTING CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	63	1,600	0.011	N-S(1):	0.031 *
	TH	0.00	0	0	0.000	N-S(2):	0.000
	LT	2.00	80	2,880	0.028 *	E-W(1):	0.513 *
Westbound	RT	0.00	131	0	0.000	E-W(2):	0.412
	TH	2.00	1,001	3,200	0.354		
	LT	1.00	3	1,600	0.002 *	V/C:	0.544
Northbound	RT	1.00	2	1,600	0.000	Lost Time:	0.050
	TH	1.00	1	1,600	0.003	ITS:	0.000
	LT	0.00	4	1,600	0.003 *		
Eastbound	RT	0.00	11	0	0.000	ICU:	0.594
	TH	2.00	1,623	3,200	0.511 *		
	LT	1.00	92	1,600	0.058	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	132	1,600	0.053	N-S(1):	0.079 *
	TH	0.01	1	17	0.059	N-S(2):	0.000
	LT	1.99	187	2,865	0.065 *	E-W(1):	0.515
Westbound	RT	0.00	186	0	0.000	E-W(2):	0.652 *
	TH	2.00	1,711	3,200	0.593 *		
	LT	1.00	15	1,600	0.009	V/C:	0.731
Northbound	RT	1.00	19	1,600	0.007	Lost Time:	0.050
	TH	1.00	8	1,600	0.014 *	ITS:	0.000
	LT	0.00	14	1,600	0.009		
Eastbound	RT	0.00	15	0	0.000	ICU:	0.781
	TH	2.00	1,603	3,200	0.506		
	LT	1.00	94	1,600	0.059 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 9) LAS FLORES CYN RD & PCH
Description: EXISTING CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	35	0	0.000		N-S(1):	0.026
	TH	1.00	1	1,600	0.048	*	N-S(2):	0.049 *
	LT	0.00	40	1,600	0.025		E-W(1):	0.482 *
Westbound	RT	1.00	27	1,600	0.004		E-W(2):	0.388
	TH	2.00	1,197	3,200	0.374			
	LT	1.00	3	1,600	0.002	*	V/C:	0.531
Northbound	RT	0.00	0	0	0.000		Lost Time:	0.050
	TH	1.00	0	1,600	0.001		ITS:	0.000
	LT	0.00	1	1,600	0.001	*		
Eastbound	RT	0.00	0	0	0.000		ICU:	0.581
	TH	2.00	1,535	3,200	0.480	*		
	LT	1.00	23	1,600	0.014		LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	34	0	0.000		N-S(1):	0.035
	TH	1.00	2	1,600	0.041	*	N-S(2):	0.047 *
	LT	0.00	30	1,600	0.019		E-W(1):	0.547
Westbound	RT	1.00	39	1,600	0.015		E-W(2):	0.584 *
	TH	2.00	1,787	3,200	0.558	*		
	LT	1.00	18	1,600	0.011		V/C:	0.631
Northbound	RT	0.00	15	0	0.000		Lost Time:	0.050
	TH	1.00	1	1,600	0.016		ITS:	0.000
	LT	0.00	10	1,600	0.006	*		
Eastbound	RT	0.00	17	0	0.000		ICU:	0.681
	TH	2.00	1,699	3,200	0.536			
	LT	1.00	41	1,600	0.026	*	LOS:	B

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 2) TRANCAS CYN RD & PCH
Description: EXISTING CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	31	0	0.000	
	TH	1.00	15	1,600	0.103	
	LT	0.00	119	1,600	0.074	*
Westbound	RT	0.00	111	0	0.000	
	TH	2.00	796	3,200	0.283	*
	LT	1.00	59	1,600	0.037	
Northbound	RT	0.00	56	0	0.000	
	TH	1.00	3	1,600	0.038	*
	LT	0.00	2	1,600	0.001	
Eastbound	RT	0.00	8	0	0.000	
	TH	2.00	612	3,200	0.194	
	LT	1.00	37	1,600	0.023	*

ICU ANALYSIS

N-S(1):	0.112	*
N-S(2):	0.104	
E-W(1):	0.231	
E-W(2):	0.306	*
V/C:	0.418	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.468	
LOS:	A	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 3) KANAN DUME RD & PCH
Description: EXISTING CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	SBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	586	1,600	0.178 *	N-S(1):	0.099
	TH	0.00	0	0	0.000	N-S(2):	0.178 *
	LT	2.00	284	2,880	0.099	E-W(1):	0.321
Westbound	RT	1.00	172	1,600	0.108	E-W(2):	0.571 *
	TH	2.00	1,221	3,200	0.382 *		
	LT	0.00	0	0	0.000	V/C:	0.749
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000	ITS:	0.000
	LT	0.00	0	0	0.000 *		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.799
	TH	2.00	1,028	3,200	0.321		
	LT	1.00	302	1,600	0.189 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 4) ZUMIREZ RD & PCH
Description: EXISTING CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	7	0	0.000	
	TH	1.00	1	1,600	0.007	*
	LT	0.00	3	1,600	0.002	
Westbound	RT	0.00	9	0	0.000	
	TH	2.00	1,319	3,200	0.415	*
	LT	1.00	58	1,600	0.036	
Northbound	RT	1.00	67	1,600	0.024	
	TH	1.00	0	1,600	0.022	
	LT	0.00	35	1,600	0.022	*
Eastbound	RT	1.00	41	1,600	0.015	
	TH	2.00	1,221	3,200	0.382	
	LT	1.00	9	1,600	0.006	*

ICU ANALYSIS		
N-S(1):	0.026	
N-S(2):	0.029	*
E-W(1):	0.418	
E-W(2):	0.421	*
V/C:	0.450	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.500	
LOS:	A	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 5) MALIBU CYN RD & CIVIC CTR WAY
Description: EXISTING CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	Y
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:	NBR, SBR, EBR, WBR		

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	1.00	28	1,600	0.000	
	TH	2.00	766	3,200	0.239	*
	LT	1.00	233	1,600	0.146	
Westbound	RT	1.00	179	1,600	0.000	
	TH	1.00	28	1,600	0.018	*
	LT	1.00	21	1,600	0.013	
Northbound	RT	1.00	22	1,600	0.000	
	TH	2.00	296	3,200	0.093	
	LT	1.00	29	1,600	0.018	*
Eastbound	RT	1.00	26	1,600	0.000	
	TH	1.00	32	1,600	0.020	*
	LT	1.00	29	1,600	0.018	

ICU ANALYSIS		
N-S(1):	0.239	
N-S(2):	0.257	*
E-W(1):	0.038	*
E-W(2):	0.000	
V/C:	0.295	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.345	
LOS:	A	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 6) MALIBU CYN RD & PCH
Description: EXISTING CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	449	1,600	0.247 *	N-S(1):	0.281 *
	TH	0.18	28	291	0.096	N-S(2):	0.000
	LT	1.82	280	2,618	0.107	E-W(1):	0.432
Westbound	RT	1.00	142	1,600	0.000	E-W(2):	0.476 *
	TH	2.00	1,310	3,200	0.409 *		
	LT	1.00	43	1,600	0.027	V/C:	0.757
Northbound	RT	0.00	55	1,600	0.034 *	Lost Time:	0.050
	TH	2.00	16	1,600	0.026	ITS:	0.000
	LT	0.00	26	1,600	0.016		
Eastbound	RT	0.00	40	0	0.000	ICU:	0.807
	TH	2.00	1,256	3,200	0.405		
	LT	2.00	193	2,880	0.067 *	LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 7) WEBB WY & PCH
Description: EXISTING CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	1.00	57	1,600	0.004	
	TH	0.93	101	1,489	0.068	
	LT	1.07	116	1,540	0.075 *	
Westbound	RT	1.00	115	1,600	0.000	
	TH	2.00	1,299	3,200	0.406 *	
	LT	1.00	253	1,600	0.158	
Northbound	RT	0.00	30	0	0.000	
	TH	1.00	71	1,600	0.063	
	LT	1.00	127	1,600	0.079 *	
Eastbound	RT	1.00	65	1,600	0.001	
	TH	3.00	1,323	4,800	0.276	
	LT	1.00	102	1,600	0.064 *	

ICU ANALYSIS	
N-S(1):	0.154 *
N-S(2):	0.000
E-W(1):	0.434
E-W(2):	0.470 *
V/C:	0.624
Lost Time:	0.050
ITS:	0.000
ICU:	0.674
LOS:	B

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 8) CROSS CREEK RD & PCH
Description: EXISTING CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	1.00	109	1,600	0.023	
	TH	0.06	7	104	0.067	
	LT	1.94	209	2,787	0.075	*
Westbound	RT	0.00	209	0	0.000	
	TH	2.00	1,625	3,200	0.573	*
	LT	1.00	24	1,600	0.015	
Northbound	RT	1.00	46	1,600	0.021	*
	TH	1.00	6	1,600	0.014	
	LT	0.00	16	1,600	0.010	
Eastbound	RT	0.00	33	0	0.000	
	TH	2.00	1,439	3,200	0.460	
	LT	1.00	144	1,600	0.090	*

ICU ANALYSIS	
N-S(1):	0.096 *
N-S(2):	0.000
E-W(1):	0.475
E-W(2):	0.663 *
V/C:	0.759
Lost Time:	0.050
ITS:	0.000
ICU:	0.809
LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 9) LAS FLORES CYN RD & PCH
Description: EXISTING CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	41	0	0.000	
	TH	1.00	2	1,600	0.048	*
	LT	0.00	34	1,600	0.021	
Westbound	RT	1.00	38	1,600	0.013	
	TH	2.00	1,733	3,200	0.542	*
	LT	1.00	44	1,600	0.028	
Northbound	RT	0.00	17	0	0.000	
	TH	1.00	1	1,600	0.021	
	LT	0.00	16	1,600	0.010	*
Eastbound	RT	0.00	44	0	0.000	
	TH	2.00	1,424	3,200	0.459	
	LT	1.00	28	1,600	0.018	*

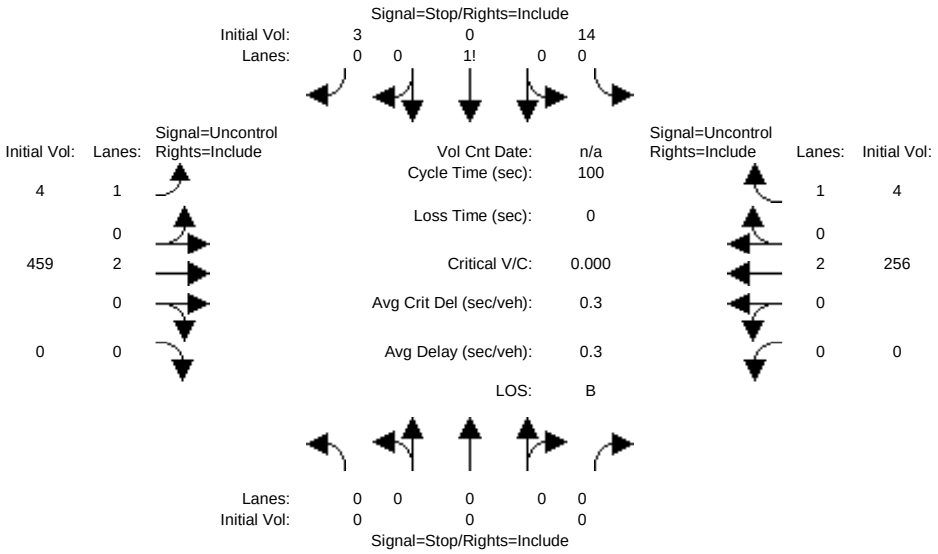
ICU ANALYSIS		
N-S(1):	0.042	
N-S(2):	0.058	*
E-W(1):	0.487	
E-W(2):	0.560	*
V/C:	0.618	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.668	
LOS:	B	

* - Denotes critical movement

EXISTING PLUS PROJECT

Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
EPAM

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	14	0	3	4	459	0	0	256	4
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	14	0	3	4	459	0	0	256	4
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	14	0	3	4	459	0	0	256	4
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	14	0	3	4	459	0	0	256	4
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	14	0	3	4	459	0	0	256	4
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	494	723	128	260	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	510	355	905	1316	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	509	354	905	1316	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.03	0.00	0.00	0.00	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	7.7	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	551	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.1	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	11.7	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	B	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			11.7			xxxxxx			xxxxxx		
ApproachLOS:	*			B			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0 0	0 0	0	0 0	1! 0	0	1 0	2 0	0	0 0	2 0	1
Initial Vol:	0	0	0	14	0	3	4	459	0	0	256	4
ApproachDel:	xxxxxx			11.7			xxxxxx			xxxxxx		

Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=17]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=740]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0 0	0 0	0	0 0	1! 0	0	1 0	2 0	0	0 0	2 0	1
Initial Vol:	0	0	0	14	0	3	4	459	0	0	256	4

Major Street Volume: 723
Minor Approach Volume: 17
Minor Approach Volume Threshold: 397

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

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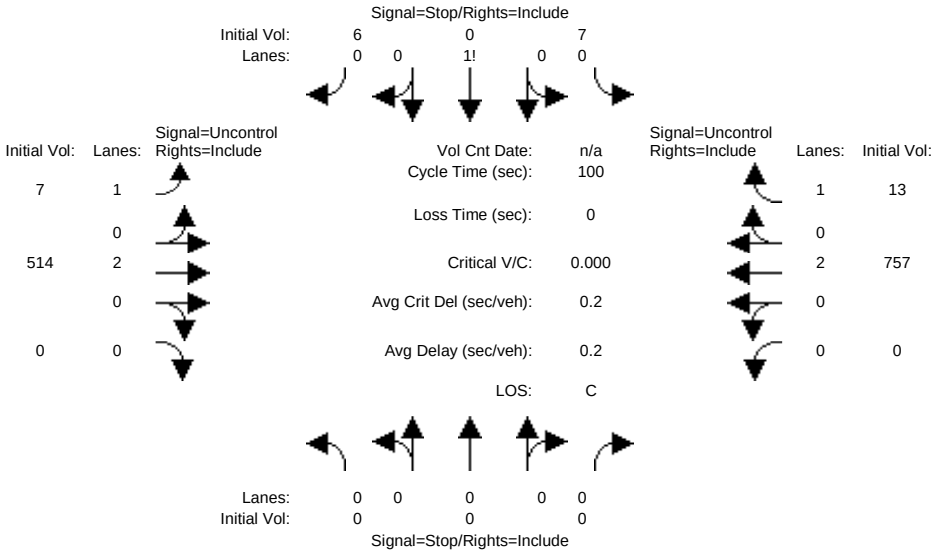
Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
EPPM

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	7	0	6	7	514	0	0	757	13
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	7	0	6	7	514	0	0	757	13
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	7	0	6	7	514	0	0	757	13
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	7	0	6	7	514	0	0	757	13
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	7	0	6	7	514	0	0	757	13
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	1028	1285	379	770	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	233	166	625	854	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	232	165	625	854	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.03	0.00	0.01	0.01	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	9.3	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	327	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.1	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	16.5	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	C	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			16.5			xxxxxx			xxxxxx		
ApproachLOS:	*			C			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0     7    0     6     7  514     0     0  757    13
ApproachDel:    xxxxxx             16.5           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=13]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1304]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0     7    0     6     7  514     0     0  757    13
------------|---------------||---------------||---------------||---------------|
Major Street Volume:             1291
Minor Approach Volume:           13
Minor Approach Volume Threshold: 197
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

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jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
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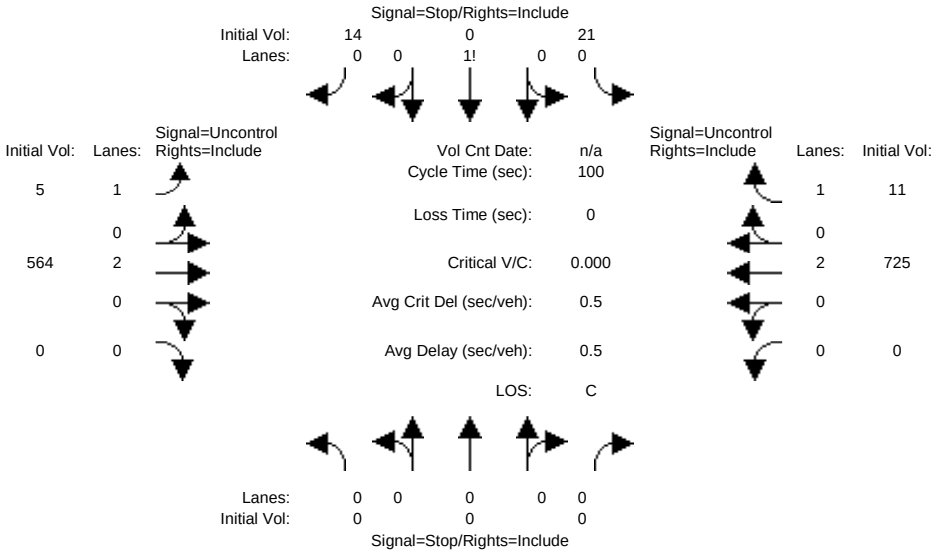
Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
EPSAT

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	21	0	14	5	564	0	0	725	11
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	21	0	14	5	564	0	0	725	11
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	21	0	14	5	564	0	0	725	11
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	21	0	14	5	564	0	0	725	11
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	21	0	14	5	564	0	0	725	11
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	1017	1299	363	736	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	237	163	640	879	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	236	162	640	879	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.09	0.00	0.02	0.01	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	9.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT - LTR		RT	LT - LTR		RT	LT - LTR		RT	LT - LTR		RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	316	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.4	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	17.8	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	C	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			17.8			xxxxxx			xxxxxx		
ApproachLOS:	*			C			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0 0 0	0 0		0 0	1! 0	0	1 0	2 0	0	0 0	2 0	1
Initial Vol:	0	0	0	21	0	14	5	564	0	0	725	11
ApproachDel:	xxxxxx			17.8			xxxxxx			xxxxxx		

Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.2]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=35]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1340]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
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Peak Hour Volume Signal Warrant Report [Urban]

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0 0 0	0 0		0 0	1! 0	0	1 0	2 0	0	0 0	2 0	1
Initial Vol:	0	0	0	21	0	14	5	564	0	0	725	11

Major Street Volume: 1305
Minor Approach Volume: 35
Minor Approach Volume Threshold: 193

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 2) TRANCAS CYN RD & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	17	0	0.000	N-S(1):	0.090 *
	TH	1.00	7	1,600	0.088	N-S(2):	0.089
	LT	0.00	116	1,600	0.073 *	E-W(1):	0.181 *
Westbound	RT	0.00	77	0	0.000	E-W(2):	0.140
	TH	2.00	291	3,200	0.115		
	LT	1.00	30	1,600	0.019 *	V/C:	0.271
Northbound	RT	0.00	17	0	0.000	Lost Time:	0.050
	TH	1.00	8	1,600	0.017 *	ITS:	0.000
	LT	0.00	2	1,600	0.001		
Eastbound	RT	0.00	3	0	0.000	ICU:	0.321
	TH	2.00	515	3,200	0.162 *		
	LT	1.00	40	1,600	0.025	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	35	0	0.000	N-S(1):	0.120 *
	TH	1.00	3	1,600	0.103	N-S(2):	0.106
	LT	0.00	127	1,600	0.079 *	E-W(1):	0.209
Westbound	RT	0.00	111	0	0.000	E-W(2):	0.313 *
	TH	2.00	815	3,200	0.289 *		
	LT	1.00	44	1,600	0.028	V/C:	0.433
Northbound	RT	0.00	52	0	0.000	Lost Time:	0.050
	TH	1.00	9	1,600	0.041 *	ITS:	0.000
	LT	0.00	5	1,600	0.003		
Eastbound	RT	0.00	9	0	0.000	ICU:	0.483
	TH	2.00	571	3,200	0.181		
	LT	1.00	39	1,600	0.024 *	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 3) KANAN DUME RD & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	SBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	250	1,600	0.069 *	N-S(1):	0.069 *
	TH	0.00	0	0	0.000	N-S(2):	0.069 *
	LT	2.00	200	2,880	0.069 *	E-W(1):	0.212
Westbound	RT	1.00	110	1,600	0.069	E-W(2):	0.281 *
	TH	2.00	621	3,200	0.194 *		
	LT	0.00	0	0	0.000	V/C:	0.350
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000 *	ITS:	0.000
	LT	0.00	0	0	0.000 *		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.400
	TH	2.00	677	3,200	0.212		
	LT	1.00	139	1,600	0.087 *	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	194	1,600	0.000	N-S(1):	0.055 *
	TH	0.00	0	0	0.000	N-S(2):	0.000
	LT	2.00	159	2,880	0.055 *	E-W(1):	0.310
Westbound	RT	1.00	249	1,600	0.156	E-W(2):	0.533 *
	TH	2.00	1,017	3,200	0.318 *		
	LT	0.00	0	0	0.000	V/C:	0.588
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000 *	ITS:	0.000
	LT	0.00	0	0	0.000		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.638
	TH	2.00	992	3,200	0.310		
	LT	1.00	344	1,600	0.215 *	LOS:	B

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 4) ZUMIREZ RD & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	9	0	0.000		N-S(1):	0.030
	TH	1.00	3	1,600	0.010	*	N-S(2):	0.036 *
	LT	0.00	4	1,600	0.003		E-W(1):	0.322 *
Westbound	RT	0.00	6	0	0.000		E-W(2):	0.218
	TH	2.00	677	3,200	0.213			
	LT	1.00	107	1,600	0.067	*	V/C:	0.358
Northbound	RT	1.00	82	1,600	0.018		Lost Time:	0.050
	TH	1.00	2	1,600	0.027		ITS:	0.000
	LT	0.00	41	1,600	0.026	*		
Eastbound	RT	1.00	35	1,600	0.009		ICU:	0.408
	TH	2.00	817	3,200	0.255	*		
	LT	1.00	8	1,600	0.005		LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	10	0	0.000		N-S(1):	0.048 *
	TH	1.00	0	1,600	0.009		N-S(2):	0.036
	LT	0.00	4	1,600	0.003	*	E-W(1):	0.387
Westbound	RT	0.00	7	0	0.000		E-W(2):	0.390 *
	TH	2.00	1,234	3,200	0.388	*		
	LT	1.00	59	1,600	0.037		V/C:	0.438
Northbound	RT	1.00	102	1,600	0.045	*	Lost Time:	0.050
	TH	1.00	3	1,600	0.029		ITS:	0.000
	LT	0.00	43	1,600	0.027			
Eastbound	RT	1.00	23	1,600	0.001		ICU:	0.488
	TH	2.00	1,121	3,200	0.350			
	LT	1.00	3	1,600	0.002	*	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 5) MALIBU CYN RD & CIVIC CTR WAY
Description: EXISTING + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	Y
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:	NBR, SBR, EBR, WBR		

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	199	1,600	0.000	N-S(1):	0.075
	TH	2.00	1,172	3,200	0.366 *	N-S(2):	0.382 *
	LT	1.00	19	1,600	0.012	E-W(1):	0.071 *
Westbound	RT	1.00	209	1,600	0.000	E-W(2):	0.000
	TH	1.00	92	1,600	0.058 *		
	LT	1.00	18	1,600	0.011	V/C:	0.453
Northbound	RT	1.00	24	1,600	0.000	Lost Time:	0.050
	TH	2.00	203	3,200	0.063	ITS:	0.000
	LT	1.00	25	1,600	0.016 *		
Eastbound	RT	1.00	9	1,600	0.000	ICU:	0.503
	TH	0.76	14	1,211	0.012		
	LT	1.24	23	1,790	0.013 *	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	44	1,600	0.000	N-S(1):	0.285 *
	TH	2.00	467	3,200	0.146	N-S(2):	0.160
	LT	1.00	187	1,600	0.117 *	E-W(1):	0.139 *
Westbound	RT	1.00	610	1,600	0.000	E-W(2):	0.000
	TH	1.00	35	1,600	0.022 *		
	LT	1.00	18	1,600	0.011	V/C:	0.424
Northbound	RT	1.00	29	1,600	0.000	Lost Time:	0.050
	TH	2.00	536	3,200	0.168 *	ITS:	0.000
	LT	1.00	22	1,600	0.014		
Eastbound	RT	1.00	37	1,600	0.000	ICU:	0.474
	TH	0.61	103	978	0.105		
	LT	1.39	234	2,000	0.117 *	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 6) MALIBU CYN RD & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	219	1,600	0.113	N-S(1):	0.342 *
	TH	0.03	15	49	0.303	N-S(2):	0.000
	LT	1.97	956	2,836	0.337 *	E-W(1):	0.295 *
Westbound	RT	1.00	123	1,600	0.000	E-W(2):	0.256
	TH	2.00	665	3,200	0.208		
	LT	1.00	4	1,600	0.003 *	V/C:	0.637
Northbound	RT	0.00	7	0	0.000	Lost Time:	0.050
	TH	2.00	7	3,200	0.005 *	ITS:	0.000
	LT	0.00	3	1,600	0.002		
Eastbound	RT	0.00	8	0	0.000	ICU:	0.687
	TH	2.00	926	3,200	0.292 *		
	LT	2.00	139	2,880	0.048	LOS:	B

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	187	1,600	0.061	N-S(1):	0.127 *
	TH	0.08	14	134	0.104	N-S(2):	0.000
	LT	1.92	320	2,759	0.116 *	E-W(1):	0.376
Westbound	RT	1.00	260	1,600	0.047	E-W(2):	0.509 *
	TH	2.00	1,271	3,200	0.397 *		
	LT	1.00	15	1,600	0.009	V/C:	0.636
Northbound	RT	0.00	17	1,600	0.011 *	Lost Time:	0.050
	TH	2.00	4	1,600	0.008	ITS:	0.000
	LT	0.00	9	1,600	0.006		
Eastbound	RT	0.00	21	0	0.000	ICU:	0.686
	TH	2.00	1,154	3,200	0.367		
	LT	2.00	322	2,880	0.112 *	LOS:	B

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 7) WEBB WY & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	35	1,600	0.000	N-S(1):	0.068 *
	TH	0.90	40	1,438	0.028	N-S(2):	0.000
	LT	1.10	49	1,586	0.031 *	E-W(1):	0.407 *
Westbound	RT	1.00	231	1,600	0.113	E-W(2):	0.294
	TH	2.00	699	3,200	0.218		
	LT	1.00	119	1,600	0.074 *	V/C:	0.475
Northbound	RT	0.00	11	0	0.000	Lost Time:	0.050
	TH	1.00	48	1,600	0.037 *	ITS:	0.000
	LT	1.00	53	1,600	0.033		
Eastbound	RT	1.00	68	1,600	0.026	ICU:	0.525
	TH	3.00	1,600	4,800	0.333 *		
	LT	1.00	122	1,600	0.076	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	71	1,600	0.026	N-S(1):	0.197 *
	TH	0.51	76	813	0.093	N-S(2):	0.000
	LT	1.49	223	2,148	0.104 *	E-W(1):	0.398
Westbound	RT	1.00	380	1,600	0.134	E-W(2):	0.435 *
	TH	2.00	1,275	3,200	0.398 *		
	LT	1.00	204	1,600	0.128	V/C:	0.632
Northbound	RT	0.00	29	0	0.000	Lost Time:	0.050
	TH	1.00	72	1,600	0.063	ITS:	0.000
	LT	1.00	148	1,600	0.093 *		
Eastbound	RT	1.00	54	1,600	0.000	ICU:	0.682
	TH	3.00	1,294	4,800	0.270		
	LT	1.00	59	1,600	0.037 *	LOS:	B

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 8) CROSS CREEK RD & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	63	1,600	0.011	N-S(1):	0.036 *
	TH	0.00	0	0	0.000	N-S(2):	0.000
	LT	2.00	95	2,880	0.033 *	E-W(1):	0.525 *
Westbound	RT	0.00	135	0	0.000	E-W(2):	0.416
	TH	2.00	1,011	3,200	0.358		
	LT	1.00	3	1,600	0.002 *	V/C:	0.561
Northbound	RT	1.00	2	1,600	0.000	Lost Time:	0.050
	TH	1.00	1	1,600	0.003	ITS:	0.000
	LT	0.00	4	1,600	0.003 *		
Eastbound	RT	0.00	11	0	0.000	ICU:	0.611
	TH	2.00	1,664	3,200	0.523 *		
	LT	1.00	92	1,600	0.058	LOS:	B

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	132	1,600	0.053	N-S(1):	0.082 *
	TH	0.01	1	16	0.061	N-S(2):	0.000
	LT	1.99	195	2,865	0.068 *	E-W(1):	0.522
Westbound	RT	0.00	201	0	0.000	E-W(2):	0.669 *
	TH	2.00	1,751	3,200	0.610 *		
	LT	1.00	15	1,600	0.009	V/C:	0.751
Northbound	RT	1.00	19	1,600	0.007	Lost Time:	0.050
	TH	1.00	8	1,600	0.014 *	ITS:	0.000
	LT	0.00	14	1,600	0.009		
Eastbound	RT	0.00	15	0	0.000	ICU:	0.801
	TH	2.00	1,625	3,200	0.513		
	LT	1.00	94	1,600	0.059 *	LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 9) LAS FLORES CYN RD & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	35	0	0.000		N-S(1):	0.026
	TH	1.00	1	1,600	0.048	*	N-S(2):	0.049 *
	LT	0.00	40	1,600	0.025		E-W(1):	0.499 *
Westbound	RT	1.00	27	1,600	0.004		E-W(2):	0.392
	TH	2.00	1,211	3,200	0.378			
	LT	1.00	3	1,600	0.002	*	V/C:	0.548
Northbound	RT	0.00	0	0	0.000		Lost Time:	0.050
	TH	1.00	0	1,600	0.001		ITS:	0.000
	LT	0.00	1	1,600	0.001	*		
Eastbound	RT	0.00	0	0	0.000		ICU:	0.598
	TH	2.00	1,591	3,200	0.497	*		
	LT	1.00	23	1,600	0.014		LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	34	0	0.000		N-S(1):	0.035
	TH	1.00	2	1,600	0.041	*	N-S(2):	0.047 *
	LT	0.00	30	1,600	0.019		E-W(1):	0.557
Westbound	RT	1.00	39	1,600	0.015		E-W(2):	0.602 *
	TH	2.00	1,842	3,200	0.576	*		
	LT	1.00	18	1,600	0.011		V/C:	0.649
Northbound	RT	0.00	15	0	0.000		Lost Time:	0.050
	TH	1.00	1	1,600	0.016		ITS:	0.000
	LT	0.00	10	1,600	0.006	*		
Eastbound	RT	0.00	17	0	0.000		ICU:	0.699
	TH	2.00	1,729	3,200	0.546			
	LT	1.00	41	1,600	0.026	*	LOS:	B

* - Denotes critical movement

Project Title: **MALIBU HOUSING ELEMENT (SM11-2458)**
Intersection: **2) TRANCAS CYN RD & PCH**
Description: **EXISTING + PROJECT CONDITIONS**

Date/Time: **SAT MID-DAY PEAK HOUR**

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	31	0	0.000	
	TH	1.00	15	1,600	0.103	
	LT	0.00	119	1,600	0.074 *	
Westbound	RT	0.00	111	0	0.000	
	TH	2.00	808	3,200	0.287 *	
	LT	1.00	59	1,600	0.037	
Northbound	RT	0.00	56	0	0.000	
	TH	1.00	3	1,600	0.038 *	
	LT	0.00	2	1,600	0.001	
Eastbound	RT	0.00	8	0	0.000	
	TH	2.00	626	3,200	0.198	
	LT	1.00	37	1,600	0.023 *	

ICU ANALYSIS

N-S(1):	0.112 *
N-S(2):	0.104
E-W(1):	0.235
E-W(2):	0.310 *
V/C:	0.422
Lost Time:	0.050
ITS:	0.000
ICU:	0.472
LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 3) KANAN DUME RD & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	SBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	1.00	586	1,600	0.178 *	
	TH	0.00	0	0	0.000	
	LT	2.00	287	2,880	0.100	
Westbound	RT	1.00	175	1,600	0.109	
	TH	2.00	1,233	3,200	0.385 *	
	LT	0.00	0	0	0.000	
Northbound	RT	0.00	0	0	0.000	
	TH	0.00	0	0	0.000	
	LT	0.00	0	0	0.000 *	
Eastbound	RT	0.00	0	0	0.000	
	TH	2.00	1,042	3,200	0.326	
	LT	1.00	302	1,600	0.189 *	

ICU ANALYSIS

N-S(1):	0.100
N-S(2):	0.178 *
E-W(1):	0.326
E-W(2):	0.574 *
V/C:	0.752
Lost Time:	0.050
ITS:	0.000
ICU:	0.802
LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 4) ZUMIREZ RD & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	7	0	0.000	
	TH	1.00	1	1,600	0.007	*
	LT	0.00	3	1,600	0.002	
Westbound	RT	0.00	9	0	0.000	
	TH	2.00	1,334	3,200	0.420	*
	LT	1.00	58	1,600	0.036	
Northbound	RT	1.00	67	1,600	0.024	
	TH	1.00	0	1,600	0.022	
	LT	0.00	35	1,600	0.022	*
Eastbound	RT	1.00	41	1,600	0.015	
	TH	2.00	1,238	3,200	0.387	
	LT	1.00	9	1,600	0.006	*

ICU ANALYSIS		
N-S(1):	0.026	
N-S(2):	0.029	*
E-W(1):	0.423	
E-W(2):	0.426	*
V/C:	0.455	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.505	
LOS:	A	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 5) MALIBU CYN RD & CIVIC CTR WAY
Description: EXISTING + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	Y
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:	NBR, SBR, EBR, WBR		

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	1.00	28	1,600	0.000	
	TH	2.00	768	3,200	0.240	*
	LT	1.00	234	1,600	0.146	
Westbound	RT	1.00	180	1,600	0.000	
	TH	1.00	28	1,600	0.018	*
	LT	1.00	22	1,600	0.014	
Northbound	RT	1.00	24	1,600	0.000	
	TH	2.00	298	3,200	0.093	
	LT	1.00	29	1,600	0.018	*
Eastbound	RT	1.00	26	1,600	0.000	
	TH	1.00	32	1,600	0.020	*
	LT	1.00	29	1,600	0.018	

ICU ANALYSIS		
N-S(1):	0.239	
N-S(2):	0.258	*
E-W(1):	0.038	*
E-W(2):	0.000	
V/C:	0.296	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.346	
LOS:	A	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 6) MALIBU CYN RD & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	453	1,600	0.249 *	N-S(1):	0.283 *
	TH	0.18	28	291	0.096	N-S(2):	0.000
	LT	1.82	280	2,618	0.107	E-W(1):	0.440
Westbound	RT	1.00	142	1,600	0.000	E-W(2):	0.487 *
	TH	2.00	1,340	3,200	0.419 *		
	LT	1.00	43	1,600	0.027	V/C:	0.770
Northbound	RT	0.00	55	1,600	0.034 *	Lost Time:	0.050
	TH	2.00	16	1,600	0.026	ITS:	0.000
	LT	0.00	26	1,600	0.016		
Eastbound	RT	0.00	40	0	0.000	ICU:	0.820
	TH	2.00	1,282	3,200	0.413		
	LT	2.00	196	2,880	0.068 *	LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 7) WEBB WY & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	59	1,600	0.004	N-S(1):	0.154 *
	TH	0.93	101	1,489	0.068	N-S(2):	0.000
	LT	1.07	116	1,540	0.075 *	E-W(1):	0.439
Westbound	RT	1.00	115	1,600	0.000	E-W(2):	0.480 *
	TH	2.00	1,327	3,200	0.415 *		
	LT	1.00	253	1,600	0.158	V/C:	0.634
Northbound	RT	0.00	30	0	0.000	Lost Time:	0.050
	TH	1.00	71	1,600	0.063	ITS:	0.000
	LT	1.00	127	1,600	0.079 *		
Eastbound	RT	1.00	65	1,600	0.001	ICU:	0.684
	TH	3.00	1,347	4,800	0.281		
	LT	1.00	104	1,600	0.065 *	LOS:	B

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 8) CROSS CREEK RD & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	1.00	109	1,600	0.023	
	TH	0.06	7	100	0.070	
	LT	1.94	218	2,790	0.078	*
Westbound	RT	0.00	219	0	0.000	
	TH	2.00	1,653	3,200	0.585	*
	LT	1.00	24	1,600	0.015	
Northbound	RT	1.00	46	1,600	0.021	*
	TH	1.00	6	1,600	0.014	
	LT	0.00	16	1,600	0.010	
Eastbound	RT	0.00	33	0	0.000	
	TH	2.00	1,463	3,200	0.468	
	LT	1.00	144	1,600	0.090	*

ICU ANALYSIS		
N-S(1):	0.099	*
N-S(2):	0.000	
E-W(1):	0.483	
E-W(2):	0.675	*
V/C:	0.774	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.824	
LOS:	D	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 9) LAS FLORES CYN RD & PCH
Description: EXISTING + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	41	0	0.000	
	TH	1.00	2	1,600	0.048	*
	LT	0.00	34	1,600	0.021	
Westbound	RT	1.00	38	1,600	0.013	
	TH	2.00	1,771	3,200	0.553	*
	LT	1.00	44	1,600	0.028	
Northbound	RT	0.00	17	0	0.000	
	TH	1.00	1	1,600	0.021	
	LT	0.00	16	1,600	0.010	*
Eastbound	RT	0.00	44	0	0.000	
	TH	2.00	1,457	3,200	0.469	
	LT	1.00	28	1,600	0.018	*

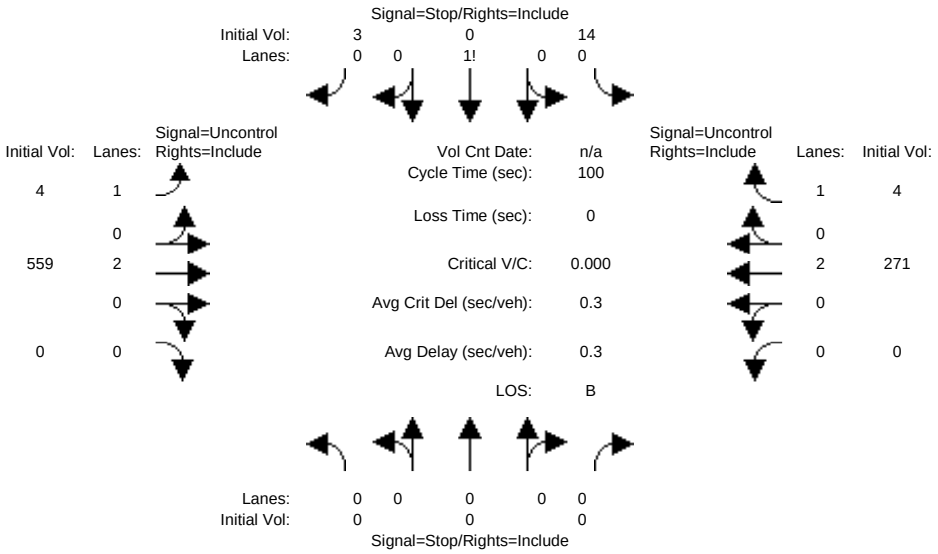
ICU ANALYSIS		
N-S(1):	0.042	
N-S(2):	0.058	*
E-W(1):	0.497	
E-W(2):	0.571	*
V/C:	0.629	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.679	
LOS:	B	

* - Denotes critical movement

OPENING YEAR (2014)

Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
OBAM

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	14	0	3	4	559	0	0	271	4
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	14	0	3	4	559	0	0	271	4
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	14	0	3	4	559	0	0	271	4
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	14	0	3	4	559	0	0	271	4
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	14	0	3	4	559	0	0	271	4
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	559	838	136	275	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	464	305	895	1300	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	463	304	895	1300	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.03	0.00	0.00	0.00	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	7.8	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	506	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.1	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	12.4	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	B	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			12.4			xxxxxx			xxxxxx		
ApproachLOS:	*			B			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    14    0     3     4  559     0     0  271     4
ApproachDel:    xxxxxx             12.4           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=17]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=855]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    14    0     3     4  559     0     0  271     4
------------|---------------||---------------||---------------||---------------|
Major Street Volume:              838
Minor Approach Volume:            17
Minor Approach Volume Threshold: 346
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
```

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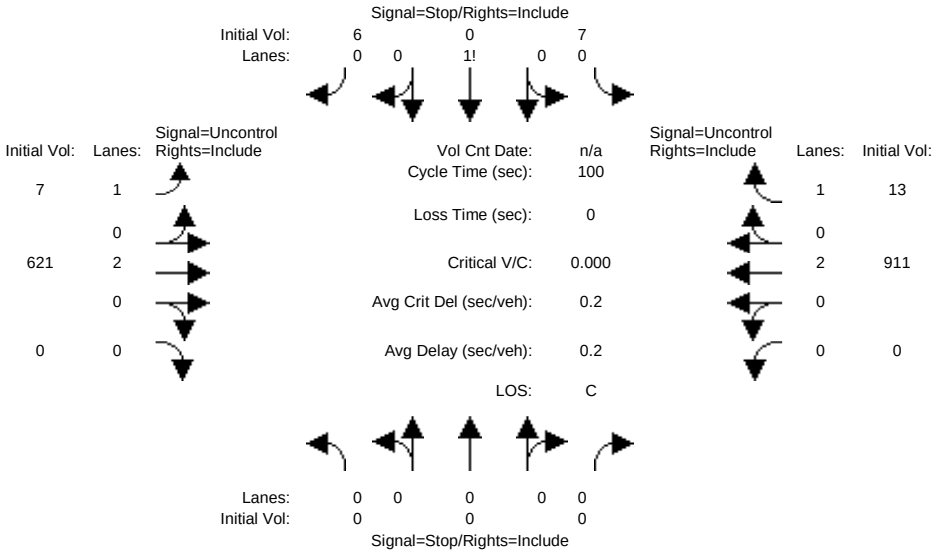
Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
OBPM

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	7	0	6	7	621	0	0	911	13
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	7	0	6	7	621	0	0	911	13
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	7	0	6	7	621	0	0	911	13
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	7	0	6	7	621	0	0	911	13
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	7	0	6	7	621	0	0	911	13
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	1236	1546	456	924	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	171	116	557	748	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	170	114	557	748	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.04	0.00	0.01	0.01	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	9.9	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	250	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.2	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	20.2	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	C	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			20.2			xxxxxx			xxxxxx		
ApproachLOS:	*			C			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0     7    0     6     7  621     0     0  911    13
ApproachDel:    xxxxxx             20.2           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=13]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1565]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0     7    0     6     7  621     0     0  911    13
------------|---------------||---------------||---------------||---------------|
Major Street Volume:             1552
Minor Approach Volume:           13
Minor Approach Volume Threshold: 133
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
```

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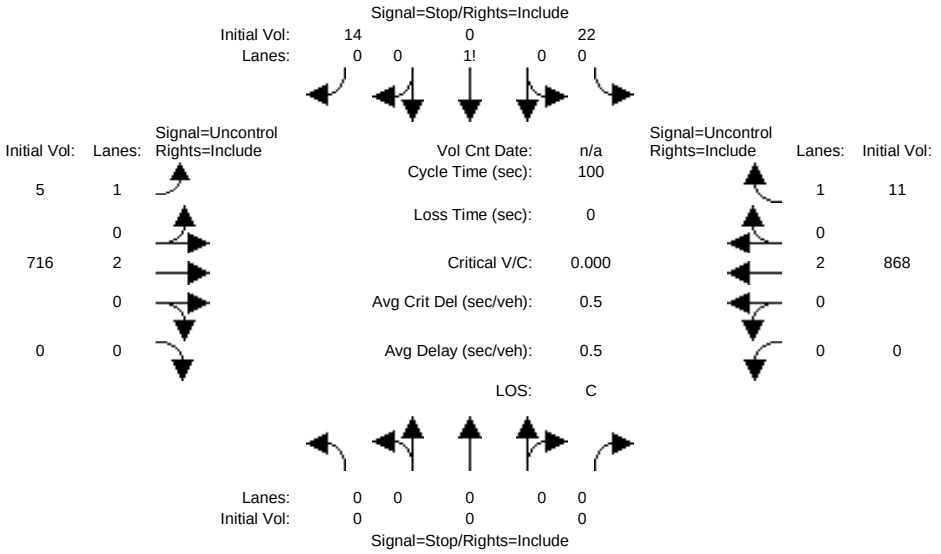
Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
OBSAT

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	22	0	14	5	716	0	0	868	11
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	22	0	14	5	716	0	0	868	11
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	22	0	14	5	716	0	0	868	11
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	22	0	14	5	716	0	0	868	11
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	22	0	14	5	716	0	0	868	11
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	1236	1594	434	879	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	171	108	576	777	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	170	107	576	777	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.13	0.00	0.02	0.01	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	9.7	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	235	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.5	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	23.1	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	C	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			23.1			xxxxxx			xxxxxx		
ApproachLOS:	*			C			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0 0	0 0	0	0 0	1! 0	0	1 0	2 0	0	0 0	2 0	1
Initial Vol:	0	0	0	22	0	14	5	716	0	0	868	11
ApproachDel:	xxxxxx			23.1			xxxxxx			xxxxxx		

Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.2]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=36]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1636]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0 0	0 0	0	0 0	1! 0	0	1 0	2 0	0	0 0	2 0	1
Initial Vol:	0	0	0	22	0	14	5	716	0	0	868	11

Major Street Volume: 1600
Minor Approach Volume: 36
Minor Approach Volume Threshold: 123

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

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Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 2) TRANCAS CYN RD & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	25	0	0.000		N-S(1):	0.102
	TH	1.00	7	1,600	0.104	*	N-S(2):	0.105 *
	LT	0.00	134	1,600	0.084		E-W(1):	0.211 *
Westbound	RT	0.00	90	0	0.000		E-W(2):	0.151
	TH	2.00	301	3,200	0.122			
	LT	1.00	31	1,600	0.019	*	V/C:	0.316
Northbound	RT	0.00	18	0	0.000		Lost Time:	0.050
	TH	1.00	8	1,600	0.018		ITS:	0.000
	LT	0.00	2	1,600	0.001	*		
Eastbound	RT	0.00	3	0	0.000		ICU:	0.366
	TH	2.00	611	3,200	0.192	*		
	LT	1.00	47	1,600	0.029		LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	53	0	0.000		N-S(1):	0.146 *
	TH	1.00	3	1,600	0.138		N-S(2):	0.141
	LT	0.00	165	1,600	0.103	*	E-W(1):	0.238
Westbound	RT	0.00	149	0	0.000		E-W(2):	0.380 *
	TH	2.00	953	3,200	0.344	*		
	LT	1.00	45	1,600	0.028		V/C:	0.526
Northbound	RT	0.00	54	0	0.000		Lost Time:	0.050
	TH	1.00	9	1,600	0.043	*	ITS:	0.000
	LT	0.00	5	1,600	0.003			
Eastbound	RT	0.00	9	0	0.000		ICU:	0.576
	TH	2.00	662	3,200	0.210			
	LT	1.00	58	1,600	0.036	*	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 3) KANAN DUME RD & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	SBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	261	1,600	0.073	N-S(1):	0.075 *
	TH	0.00	0	0	0.000	N-S(2):	0.073
	LT	2.00	217	2,880	0.075 *	E-W(1):	0.247
Westbound	RT	1.00	117	1,600	0.073	E-W(2):	0.294 *
	TH	2.00	649	3,200	0.203 *		
	LT	0.00	0	0	0.000	V/C:	0.369
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000 *	ITS:	0.000
	LT	0.00	0	0	0.000		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.419
	TH	2.00	790	3,200	0.247		
	LT	1.00	145	1,600	0.091 *	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	202	1,600	0.000	N-S(1):	0.059 *
	TH	0.00	0	0	0.000	N-S(2):	0.000
	LT	2.00	171	2,880	0.059 *	E-W(1):	0.352
Westbound	RT	1.00	268	1,600	0.168	E-W(2):	0.596 *
	TH	2.00	1,194	3,200	0.373 *		
	LT	0.00	0	0	0.000	V/C:	0.655
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000 *	ITS:	0.000
	LT	0.00	0	0	0.000		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.705
	TH	2.00	1,127	3,200	0.352		
	LT	1.00	357	1,600	0.223 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 4) ZUMIREZ RD & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	9	0	0.000		N-S(1):	0.031
	TH	1.00	3	1,600	0.010	*	N-S(2):	0.036 *
	LT	0.00	4	1,600	0.003		E-W(1):	0.364 *
Westbound	RT	0.00	6	0	0.000		E-W(2):	0.229
	TH	2.00	710	3,200	0.224			
	LT	1.00	110	1,600	0.069	*	V/C:	0.400
Northbound	RT	1.00	84	1,600	0.018		Lost Time:	0.050
	TH	1.00	2	1,600	0.028		ITS:	0.000
	LT	0.00	42	1,600	0.026	*		
Eastbound	RT	1.00	36	1,600	0.009		ICU:	0.450
	TH	2.00	945	3,200	0.295	*		
	LT	1.00	8	1,600	0.005		LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	10	0	0.000		N-S(1):	0.050 *
	TH	1.00	0	1,600	0.009		N-S(2):	0.037
	LT	0.00	4	1,600	0.003	*	E-W(1):	0.433
Westbound	RT	0.00	7	0	0.000		E-W(2):	0.451 *
	TH	2.00	1,430	3,200	0.449	*		
	LT	1.00	61	1,600	0.038		V/C:	0.501
Northbound	RT	1.00	105	1,600	0.047	*	Lost Time:	0.050
	TH	1.00	3	1,600	0.029		ITS:	0.000
	LT	0.00	44	1,600	0.028			
Eastbound	RT	1.00	24	1,600	0.001		ICU:	0.551
	TH	2.00	1,265	3,200	0.395			
	LT	1.00	3	1,600	0.002	*	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 5) MALIBU CYN RD & CIVIC CTR WAY
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	Y
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:	NBR, SBR, EBR, WBR		

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	186	1,600	0.000	N-S(1):	0.082
	TH	2.00	1,251	3,200	0.391 *	N-S(2):	0.403 *
	LT	1.00	22	1,600	0.014	E-W(1):	0.062 *
Westbound	RT	1.00	225	1,600	0.000	E-W(2):	0.000
	TH	1.00	78	1,600	0.049 *		
	LT	1.00	19	1,600	0.012	V/C:	0.465
Northbound	RT	1.00	53	1,600	0.000	Lost Time:	0.050
	TH	2.00	217	3,200	0.068	ITS:	0.000
	LT	1.00	19	1,600	0.012 *		
Eastbound	RT	1.00	9	1,600	0.000	ICU:	0.515
	TH	0.72	13	1,156	0.011		
	LT	1.28	23	1,840	0.013 *	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	41	1,600	0.000	N-S(1):	0.317 *
	TH	2.00	501	3,200	0.157	N-S(2):	0.171
	LT	1.00	221	1,600	0.138 *	E-W(1):	0.133 *
Westbound	RT	1.00	670	1,600	0.000	E-W(2):	0.000
	TH	1.00	32	1,600	0.020 *		
	LT	1.00	22	1,600	0.014	V/C:	0.450
Northbound	RT	1.00	90	1,600	0.000	Lost Time:	0.050
	TH	2.00	574	3,200	0.179 *	ITS:	0.000
	LT	1.00	22	1,600	0.014		
Eastbound	RT	1.00	33	1,600	0.000	ICU:	0.500
	TH	0.59	96	942	0.102		
	LT	1.41	230	2,032	0.113 *	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 6) MALIBU CYN RD & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	223	1,600	0.112	N-S(1):	0.360 *
	TH	0.03	15	47	0.319	N-S(2):	0.000
	LT	1.97	1,006	2,838	0.355 *	E-W(1):	0.322 *
Westbound	RT	1.00	165	1,600	0.000	E-W(2):	0.273
	TH	2.00	701	3,200	0.219		
	LT	1.00	4	1,600	0.003 *	V/C:	0.682
Northbound	RT	0.00	7	0	0.000	Lost Time:	0.050
	TH	2.00	7	3,200	0.005 *	ITS:	0.000
	LT	0.00	3	1,600	0.002		
Eastbound	RT	0.00	8	0	0.000	ICU:	0.732
	TH	2.00	1,012	3,200	0.319 *		
	LT	2.00	155	2,880	0.054	LOS:	C

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	189	1,600	0.058	N-S(1):	0.130 *
	TH	0.08	14	130	0.108	N-S(2):	0.000
	LT	1.92	330	2,763	0.119 *	E-W(1):	0.418
Westbound	RT	1.00	329	1,600	0.086	E-W(2):	0.565 *
	TH	2.00	1,424	3,200	0.445 *		
	LT	1.00	15	1,600	0.009	V/C:	0.695
Northbound	RT	0.00	18	1,600	0.011 *	Lost Time:	0.050
	TH	2.00	4	1,600	0.008	ITS:	0.000
	LT	0.00	9	1,600	0.006		
Eastbound	RT	0.00	22	0	0.000	ICU:	0.745
	TH	2.00	1,287	3,200	0.409		
	LT	2.00	346	2,880	0.120 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 7) WEBB WY & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	56	1,600	0.000	N-S(1):	0.076 *
	TH	0.77	42	1,233	0.034	N-S(2):	0.000
	LT	1.23	67	1,770	0.038 *	E-W(1):	0.423 *
Westbound	RT	1.00	262	1,600	0.126	E-W(2):	0.361
	TH	2.00	726	3,200	0.227		
	LT	1.00	123	1,600	0.077 *	V/C:	0.499
Northbound	RT	0.00	11	0	0.000	Lost Time:	0.050
	TH	1.00	50	1,600	0.038 *	ITS:	0.000
	LT	1.00	56	1,600	0.035		
Eastbound	RT	1.00	70	1,600	0.026	ICU:	0.549
	TH	3.00	1,660	4,800	0.346 *		
	LT	1.00	214	1,600	0.134	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	161	1,600	0.065	N-S(1):	0.215 *
	TH	0.47	81	753	0.108	N-S(2):	0.000
	LT	1.53	263	2,202	0.119 *	E-W(1):	0.423
Westbound	RT	1.00	390	1,600	0.124	E-W(2):	0.511 *
	TH	2.00	1,409	3,200	0.440 *		
	LT	1.00	210	1,600	0.131	V/C:	0.726
Northbound	RT	0.00	30	0	0.000	Lost Time:	0.050
	TH	1.00	76	1,600	0.066	ITS:	0.000
	LT	1.00	153	1,600	0.096 *		
Eastbound	RT	1.00	56	1,600	0.000	ICU:	0.776
	TH	3.00	1,402	4,800	0.292		
	LT	1.00	113	1,600	0.071 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 8) CROSS CREEK RD & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	71	1,600	0.007	N-S(1):	0.044 *
	TH	0.00	0	0	0.000	N-S(2):	0.000
	LT	2.00	119	2,880	0.041 *	E-W(1):	0.540 *
Westbound	RT	0.00	222	0	0.000	E-W(2):	0.477
	TH	2.00	1,062	3,200	0.401		
	LT	1.00	3	1,600	0.002 *	V/C:	0.584
Northbound	RT	1.00	2	1,600	0.000	Lost Time:	0.050
	TH	1.00	1	1,600	0.003	ITS:	0.000
	LT	0.00	4	1,600	0.003 *		
Eastbound	RT	0.00	11	0	0.000	ICU:	0.634
	TH	2.00	1,712	3,200	0.538 *		
	LT	1.00	121	1,600	0.076	LOS:	B

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	169	1,600	0.069	N-S(1):	0.124 *
	TH	0.01	1	10	0.099	N-S(2):	0.000
	LT	1.99	317	2,871	0.110 *	E-W(1):	0.558
Westbound	RT	0.00	283	0	0.000	E-W(2):	0.742 *
	TH	2.00	1,857	3,200	0.669 *		
	LT	1.00	15	1,600	0.009	V/C:	0.866
Northbound	RT	1.00	20	1,600	0.008	Lost Time:	0.050
	TH	1.00	8	1,600	0.014 *	ITS:	0.000
	LT	0.00	14	1,600	0.009		
Eastbound	RT	0.00	15	0	0.000	ICU:	0.916
	TH	2.00	1,743	3,200	0.549		
	LT	1.00	117	1,600	0.073 *	LOS:	E

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 9) LAS FLORES CYN RD & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	38	0	0.000	N-S(1):	0.027
	TH	1.00	1	1,600	0.050 *	N-S(2):	0.051 *
	LT	0.00	41	1,600	0.026	E-W(1):	0.523 *
Westbound	RT	1.00	28	1,600	0.005	E-W(2):	0.433
	TH	2.00	1,334	3,200	0.417		
	LT	1.00	3	1,600	0.002 *	V/C:	0.574
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	1.00	0	1,600	0.001	ITS:	0.000
	LT	0.00	1	1,600	0.001 *		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.624
	TH	2.00	1,668	3,200	0.521 *		
	LT	1.00	25	1,600	0.016	LOS:	B

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	38	0	0.000	N-S(1):	0.035
	TH	1.00	2	1,600	0.044 *	N-S(2):	0.050 *
	LT	0.00	31	1,600	0.019	E-W(1):	0.633
Westbound	RT	1.00	40	1,600	0.015	E-W(2):	0.650 *
	TH	2.00	1,991	3,200	0.622 *		
	LT	1.00	19	1,600	0.012	V/C:	0.700
Northbound	RT	0.00	15	0	0.000	Lost Time:	0.050
	TH	1.00	1	1,600	0.016	ITS:	0.000
	LT	0.00	10	1,600	0.006 *		
Eastbound	RT	0.00	18	0	0.000	ICU:	0.750
	TH	2.00	1,968	3,200	0.621		
	LT	1.00	45	1,600	0.028 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 2) TRANCAS CYN RD & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	53	0	0.000	
	TH	1.00	15	1,600	0.145	*
	LT	0.00	164	1,600	0.103	
Westbound	RT	0.00	158	0	0.000	
	TH	2.00	932	3,200	0.341	*
	LT	1.00	61	1,600	0.038	
Northbound	RT	0.00	58	0	0.000	
	TH	1.00	3	1,600	0.039	
	LT	0.00	2	1,600	0.001	*
Eastbound	RT	0.00	8	0	0.000	
	TH	2.00	756	3,200	0.239	
	LT	1.00	60	1,600	0.038	*

ICU ANALYSIS		
N-S(1):	0.142	
N-S(2):	0.146	*
E-W(1):	0.277	
E-W(2):	0.379	*
V/C:	0.525	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.575	
LOS:	A	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 3) KANAN DUME RD & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	SBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	607	1,600	0.183 *	N-S(1):	0.111
	TH	0.00	0	0	0.000	N-S(2):	0.183 *
	LT	2.00	320	2,880	0.111	E-W(1):	0.383
Westbound	RT	1.00	203	1,600	0.127	E-W(2):	0.637 *
	TH	2.00	1,412	3,200	0.441 *		
	LT	0.00	0	0	0.000	V/C:	0.820
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000	ITS:	0.000
	LT	0.00	0	0	0.000 *		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.870
	TH	2.00	1,224	3,200	0.383		
	LT	1.00	314	1,600	0.196 *	LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 4) ZUMIREZ RD & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	7	0	0.000	
	TH	1.00	1	1,600	0.019	*
	LT	0.00	23	1,600	0.014	
Westbound	RT	0.00	27	0	0.000	
	TH	2.00	1,509	3,200	0.480	*
	LT	1.00	60	1,600	0.038	
Northbound	RT	1.00	69	1,600	0.024	
	TH	1.00	0	1,600	0.023	
	LT	0.00	36	1,600	0.023	*
Eastbound	RT	1.00	42	1,600	0.015	
	TH	2.00	1,418	3,200	0.443	
	LT	1.00	9	1,600	0.006	*

ICU ANALYSIS		
N-S(1):	0.038	
N-S(2):	0.042	*
E-W(1):	0.481	
E-W(2):	0.486	*
V/C:	0.528	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.578	
LOS:	A	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 5) MALIBU CYN RD & CIVIC CTR WAY
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	Y
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:	NBR, SBR, EBR, WBR		

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	29	1,600	0.000	N-S(1):	0.291 *
	TH	2.00	822	3,200	0.257	N-S(2):	0.276
	LT	1.00	298	1,600	0.186 *	E-W(1):	0.039 *
Westbound	RT	1.00	239	1,600	0.000	E-W(2):	0.000
	TH	1.00	29	1,600	0.018		
	LT	1.00	28	1,600	0.018 *	V/C:	0.330
Northbound	RT	1.00	107	1,600	0.000	Lost Time:	0.050
	TH	2.00	336	3,200	0.105 *	ITS:	0.000
	LT	1.00	30	1,600	0.019		
Eastbound	RT	1.00	27	1,600	0.000	ICU:	0.380
	TH	1.00	33	1,600	0.021 *		
	LT	1.00	30	1,600	0.019	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 6) MALIBU CYN RD & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	463	1,600	0.250 *	N-S(1):	0.286 *
	TH	0.18	29	288	0.101	N-S(2):	0.000
	LT	1.82	293	2,621	0.112	E-W(1):	0.511
Westbound	RT	1.00	202	1,600	0.014	E-W(2):	0.570 *
	TH	2.00	1,574	3,200	0.492 *		
	LT	1.00	44	1,600	0.028	V/C:	0.856
Northbound	RT	0.00	57	1,600	0.036 *	Lost Time:	0.050
	TH	2.00	16	1,600	0.027	ITS:	0.000
	LT	0.00	27	1,600	0.017		
Eastbound	RT	0.00	41	0	0.000	ICU:	0.906
	TH	2.00	1,506	3,200	0.483		
	LT	2.00	225	2,880	0.078 *	LOS:	E

* - Denotes critical movement

Project Title: **MALIBU HOUSING ELEMENT (SM11-2458)**
Intersection: **7) WEBB WY & PCH**
Description: **OPENING YEAR (2014) BASE CONDITIONS**

Date/Time: **SAT MID-DAY PEAK HOUR**

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	1.00	174	1,600	0.036	
	TH	0.78	109	1,250	0.087	
	LT	1.22	170	1,755	0.097	*
Westbound	RT	1.00	118	1,600	0.000	
	TH	2.00	1,507	3,200	0.471	*
	LT	1.00	261	1,600	0.163	
Northbound	RT	0.00	31	0	0.000	
	TH	1.00	77	1,600	0.068	
	LT	1.00	132	1,600	0.083	*
Eastbound	RT	1.00	67	1,600	0.001	
	TH	3.00	1,484	4,800	0.309	
	LT	1.00	232	1,600	0.145	*

ICU ANALYSIS	
N-S(1):	0.180 *
N-S(2):	0.000
E-W(1):	0.472
E-W(2):	0.616 *
V/C:	0.796
Lost Time:	0.050
ITS:	0.000
ICU:	0.846
LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 8) CROSS CREEK RD & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	133	1,600	0.030	N-S(1):	0.161 *
	TH	0.04	7	56	0.125	N-S(2):	0.000
	LT	1.96	392	2,829	0.139 *	E-W(1):	0.530
Westbound	RT	0.00	388	0	0.000	E-W(2):	0.792 *
	TH	2.00	1,806	3,200	0.686 *		
	LT	1.00	25	1,600	0.016	V/C:	0.953
Northbound	RT	1.00	47	1,600	0.022 *	Lost Time:	0.050
	TH	1.00	6	1,600	0.014	ITS:	0.000
	LT	0.00	16	1,600	0.010		
Eastbound	RT	0.00	34	0	0.000	ICU:	1.003
	TH	2.00	1,610	3,200	0.514		
	LT	1.00	170	1,600	0.106 *	LOS:	F

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 9) LAS FLORES CYN RD & PCH
Description: OPENING YEAR (2014) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	53	0	0.000	
	TH	1.00	2	1,600	0.056	*
	LT	0.00	35	1,600	0.022	
Westbound	RT	1.00	39	1,600	0.013	
	TH	2.00	2,011	3,200	0.628	*
	LT	1.00	45	1,600	0.028	
Northbound	RT	0.00	18	0	0.000	
	TH	1.00	1	1,600	0.022	
	LT	0.00	16	1,600	0.010	*
Eastbound	RT	0.00	45	0	0.000	
	TH	2.00	1,679	3,200	0.539	
	LT	1.00	39	1,600	0.024	*

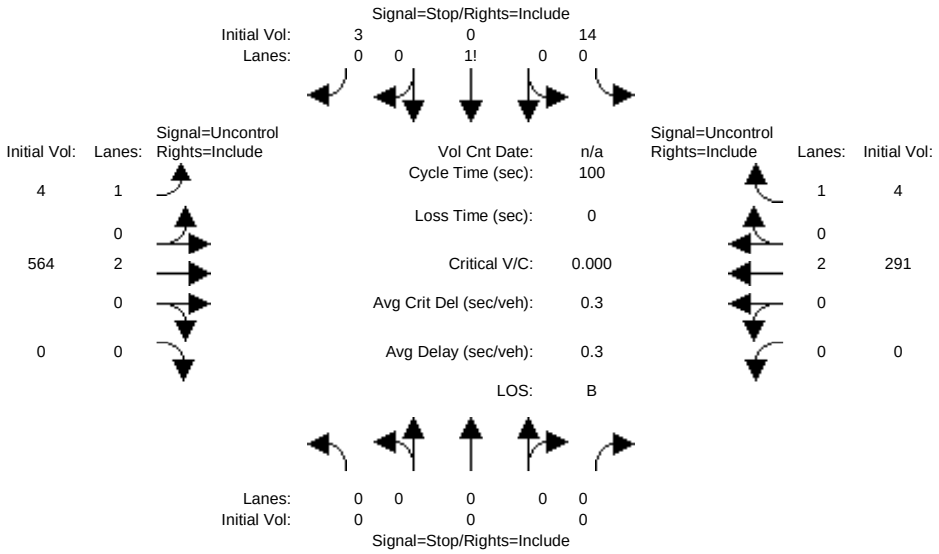
ICU ANALYSIS		
N-S(1):	0.044	
N-S(2):	0.066	*
E-W(1):	0.567	
E-W(2):	0.652	*
V/C:	0.718	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.768	
LOS:	C	

* - Denotes critical movement

OPENING YEAR (2014) PLUS PROJECT

Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
OPAM

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	14	0	3	4	564	0	0	291	4
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	14	0	3	4	564	0	0	291	4
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	14	0	3	4	564	0	0	291	4
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	14	0	3	4	564	0	0	291	4
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	14	0	3	4	564	0	0	291	4
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	581	863	146	295	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	449	295	882	1278	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	448	294	882	1278	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.03	0.00	0.00	0.00	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	7.8	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	491	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.1	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	12.6	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	B	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			12.6			xxxxxx			xxxxxx		
ApproachLOS:	*			B			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    14    0     3     4  564     0     0  291     4
ApproachDel:    xxxxxx             12.6           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=17]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=880]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    14    0     3     4  564     0     0  291     4
------------|---------------||---------------||---------------||---------------|
Major Street Volume:              863
Minor Approach Volume:            17
Minor Approach Volume Threshold: 336
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
```

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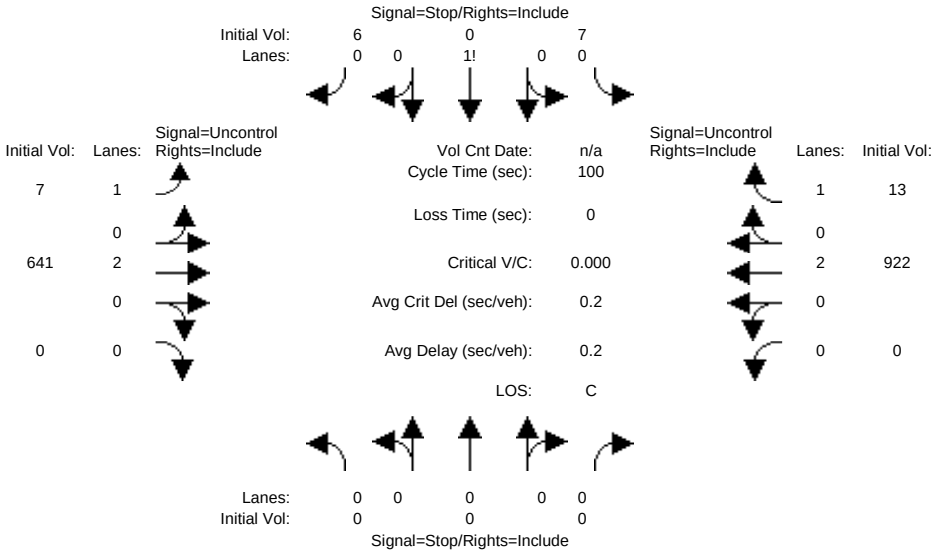
Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
OPPM

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	7	0	6	7	641	0	0	922	13
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	7	0	6	7	641	0	0	922	13
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	7	0	6	7	641	0	0	922	13
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	7	0	6	7	641	0	0	922	13
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	7	0	6	7	641	0	0	922	13
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	1257	1577	461	935	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	166	111	553	741	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	165	110	553	741	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.04	0.00	0.01	0.01	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	9.9	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	244	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.2	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	20.6	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	C	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			20.6			xxxxxx			xxxxxx		
ApproachLOS:	*			C			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0     7    0     6     7  641     0     0  922    13
ApproachDel:    xxxxxx             20.6           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=13]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1596]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0     7    0     6     7  641     0     0  922    13
------------|---------------||---------------||---------------||---------------|
Major Street Volume:             1583
Minor Approach Volume:           13
Minor Approach Volume Threshold: 127
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
```

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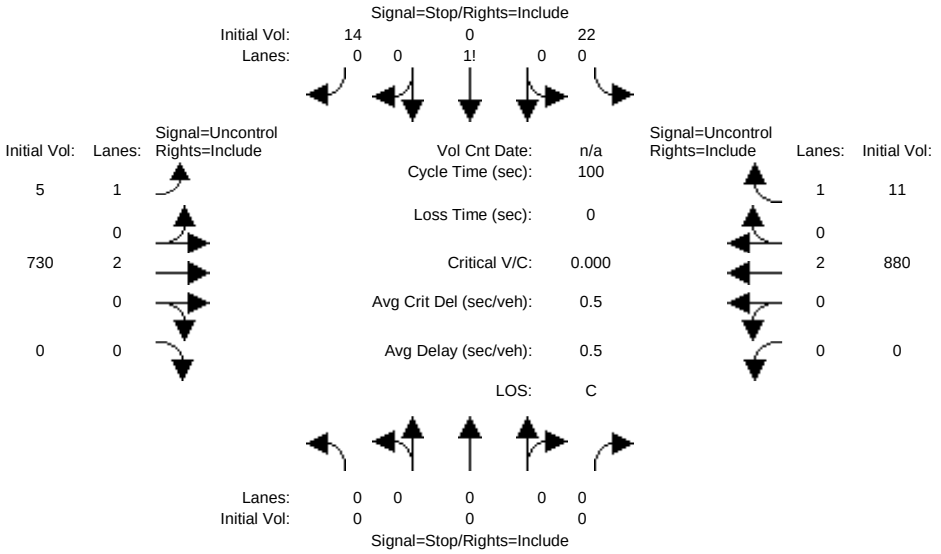
Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
OPSAT

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	22	0	14	5	730	0	0	880	11
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	22	0	14	5	730	0	0	880	11
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	22	0	14	5	730	0	0	880	11
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	22	0	14	5	730	0	0	880	11
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	22	0	14	5	730	0	0	880	11
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	1255	1620	440	891	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	166	104	570	769	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	166	103	570	769	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.13	0.00	0.02	0.01	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	9.7	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	229	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.5	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	23.7	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	C	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			23.7			xxxxxx			xxxxxx		
ApproachLOS:	*			C			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    22    0    14     5  730     0     0  880    11
ApproachDel:    xxxxxx             23.7           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.2]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=36]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1662]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    22    0    14     5  730     0     0  880    11
------------|---------------||---------------||---------------||---------------|
Major Street Volume:              1626
Minor Approach Volume:            36
Minor Approach Volume Threshold: 117
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
```

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Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 2) TRANCAS CYN RD & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	25	0	0.000	N-S(1):	0.102
	TH	1.00	7	1,600	0.104 *	N-S(2):	0.105 *
	LT	0.00	134	1,600	0.084	E-W(1):	0.212 *
Westbound	RT	0.00	90	0	0.000	E-W(2):	0.157
	TH	2.00	321	3,200	0.128		
	LT	1.00	31	1,600	0.019 *	V/C:	0.317
Northbound	RT	0.00	18	0	0.000	Lost Time:	0.050
	TH	1.00	8	1,600	0.018	ITS:	0.000
	LT	0.00	2	1,600	0.001 *		
Eastbound	RT	0.00	3	0	0.000	ICU:	0.367
	TH	2.00	616	3,200	0.193 *		
	LT	1.00	47	1,600	0.029	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	53	0	0.000	N-S(1):	0.146 *
	TH	1.00	3	1,600	0.138	N-S(2):	0.141
	LT	0.00	165	1,600	0.103 *	E-W(1):	0.244
Westbound	RT	0.00	149	0	0.000	E-W(2):	0.384 *
	TH	2.00	964	3,200	0.348 *		
	LT	1.00	45	1,600	0.028	V/C:	0.530
Northbound	RT	0.00	54	0	0.000	Lost Time:	0.050
	TH	1.00	9	1,600	0.043 *	ITS:	0.000
	LT	0.00	5	1,600	0.003		
Eastbound	RT	0.00	9	0	0.000	ICU:	0.580
	TH	2.00	682	3,200	0.216		
	LT	1.00	58	1,600	0.036 *	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 3) KANAN DUME RD & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	SBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	261	1,600	0.073	N-S(1):	0.076 *
	TH	0.00	0	0	0.000	N-S(2):	0.073
	LT	2.00	218	2,880	0.076 *	E-W(1):	0.248
Westbound	RT	1.00	121	1,600	0.076	E-W(2):	0.300 *
	TH	2.00	669	3,200	0.209 *		
	LT	0.00	0	0	0.000	V/C:	0.376
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000 *	ITS:	0.000
	LT	0.00	0	0	0.000		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.426
	TH	2.00	795	3,200	0.248		
	LT	1.00	145	1,600	0.091 *	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	202	1,600	0.000	N-S(1):	0.061 *
	TH	0.00	0	0	0.000	N-S(2):	0.000
	LT	2.00	175	2,880	0.061 *	E-W(1):	0.358
Westbound	RT	1.00	270	1,600	0.169	E-W(2):	0.600 *
	TH	2.00	1,205	3,200	0.377 *		
	LT	0.00	0	0	0.000	V/C:	0.661
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000 *	ITS:	0.000
	LT	0.00	0	0	0.000		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.711
	TH	2.00	1,147	3,200	0.358		
	LT	1.00	357	1,600	0.223 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 4) ZUMIREZ RD & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	9	0	0.000	N-S(1):	0.031
	TH	1.00	3	1,600	0.010 *	N-S(2):	0.036 *
	LT	0.00	4	1,600	0.003	E-W(1):	0.366 *
Westbound	RT	0.00	6	0	0.000	E-W(2):	0.237
	TH	2.00	735	3,200	0.232		
	LT	1.00	110	1,600	0.069 *	V/C:	0.402
Northbound	RT	1.00	84	1,600	0.018	Lost Time:	0.050
	TH	1.00	2	1,600	0.028	ITS:	0.000
	LT	0.00	42	1,600	0.026 *		
Eastbound	RT	1.00	36	1,600	0.009	ICU:	0.452
	TH	2.00	951	3,200	0.297 *		
	LT	1.00	8	1,600	0.005	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	10	0	0.000	N-S(1):	0.050 *
	TH	1.00	0	1,600	0.009	N-S(2):	0.037
	LT	0.00	4	1,600	0.003 *	E-W(1):	0.441
Westbound	RT	0.00	7	0	0.000	E-W(2):	0.455 *
	TH	2.00	1,443	3,200	0.453 *		
	LT	1.00	61	1,600	0.038	V/C:	0.505
Northbound	RT	1.00	105	1,600	0.047 *	Lost Time:	0.050
	TH	1.00	3	1,600	0.029	ITS:	0.000
	LT	0.00	44	1,600	0.028		
Eastbound	RT	1.00	24	1,600	0.001	ICU:	0.555
	TH	2.00	1,289	3,200	0.403		
	LT	1.00	3	1,600	0.002 *	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 5) MALIBU CYN RD & CIVIC CTR WAY
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	Y
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:	NBR, SBR, EBR, WBR		

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	186	1,600	0.000	N-S(1):	0.083
	TH	2.00	1,252	3,200	0.391 *	N-S(2):	0.403 *
	LT	1.00	22	1,600	0.014	E-W(1):	0.062 *
Westbound	RT	1.00	226	1,600	0.000	E-W(2):	0.000
	TH	1.00	78	1,600	0.049 *		
	LT	1.00	21	1,600	0.013	V/C:	0.465
Northbound	RT	1.00	54	1,600	0.000	Lost Time:	0.050
	TH	2.00	220	3,200	0.069	ITS:	0.000
	LT	1.00	19	1,600	0.012 *		
Eastbound	RT	1.00	9	1,600	0.000	ICU:	0.515
	TH	0.72	13	1,156	0.011		
	LT	1.28	23	1,840	0.013 *	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	41	1,600	0.000	N-S(1):	0.319 *
	TH	2.00	504	3,200	0.158	N-S(2):	0.172
	LT	1.00	222	1,600	0.139 *	E-W(1):	0.133 *
Westbound	RT	1.00	671	1,600	0.000	E-W(2):	0.000
	TH	1.00	32	1,600	0.020 *		
	LT	1.00	23	1,600	0.014	V/C:	0.452
Northbound	RT	1.00	92	1,600	0.000	Lost Time:	0.050
	TH	2.00	576	3,200	0.180 *	ITS:	0.000
	LT	1.00	22	1,600	0.014		
Eastbound	RT	1.00	33	1,600	0.000	ICU:	0.502
	TH	0.59	96	942	0.102		
	LT	1.41	230	2,032	0.113 *	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 6) MALIBU CYN RD & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	226	1,600	0.114	N-S(1):	0.360 *
	TH	0.03	15	47	0.319	N-S(2):	0.000
	LT	1.97	1,006	2,838	0.355 *	E-W(1):	0.335 *
Westbound	RT	1.00	165	1,600	0.000	E-W(2):	0.278
	TH	2.00	715	3,200	0.223		
	LT	1.00	4	1,600	0.003 *	V/C:	0.695
Northbound	RT	0.00	7	0	0.000	Lost Time:	0.050
	TH	2.00	7	3,200	0.005 *	ITS:	0.000
	LT	0.00	3	1,600	0.002		
Eastbound	RT	0.00	8	0	0.000	ICU:	0.745
	TH	2.00	1,054	3,200	0.332 *		
	LT	2.00	159	2,880	0.055	LOS:	C

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	193	1,600	0.060	N-S(1):	0.130 *
	TH	0.08	14	130	0.108	N-S(2):	0.000
	LT	1.92	330	2,763	0.119 *	E-W(1):	0.426
Westbound	RT	1.00	329	1,600	0.086	E-W(2):	0.580 *
	TH	2.00	1,466	3,200	0.458 *		
	LT	1.00	15	1,600	0.009	V/C:	0.710
Northbound	RT	0.00	18	1,600	0.011 *	Lost Time:	0.050
	TH	2.00	4	1,600	0.008	ITS:	0.000
	LT	0.00	9	1,600	0.006		
Eastbound	RT	0.00	22	0	0.000	ICU:	0.760
	TH	2.00	1,313	3,200	0.417		
	LT	2.00	350	2,880	0.122 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 7) WEBB WY & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	59	1,600	0.000	N-S(1):	0.076 *
	TH	0.77	42	1,233	0.034	N-S(2):	0.000
	LT	1.23	67	1,770	0.038 *	E-W(1):	0.431 *
Westbound	RT	1.00	262	1,600	0.126	E-W(2):	0.364
	TH	2.00	736	3,200	0.230		
	LT	1.00	123	1,600	0.077 *	V/C:	0.507
Northbound	RT	0.00	11	0	0.000	Lost Time:	0.050
	TH	1.00	50	1,600	0.038 *	ITS:	0.000
	LT	1.00	56	1,600	0.035		
Eastbound	RT	1.00	70	1,600	0.026	ICU:	0.557
	TH	3.00	1,701	4,800	0.354 *		
	LT	1.00	215	1,600	0.134	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	163	1,600	0.066	N-S(1):	0.215 *
	TH	0.47	81	753	0.108	N-S(2):	0.000
	LT	1.53	263	2,202	0.119 *	E-W(1):	0.428
Westbound	RT	1.00	390	1,600	0.124	E-W(2):	0.526 *
	TH	2.00	1,449	3,200	0.453 *		
	LT	1.00	210	1,600	0.131	V/C:	0.741
Northbound	RT	0.00	30	0	0.000	Lost Time:	0.050
	TH	1.00	76	1,600	0.066	ITS:	0.000
	LT	1.00	153	1,600	0.096 *		
Eastbound	RT	1.00	56	1,600	0.000	ICU:	0.791
	TH	3.00	1,424	4,800	0.297		
	LT	1.00	116	1,600	0.073 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 8) CROSS CREEK RD & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	71	1,600	0.007	N-S(1):	0.050 *
	TH	0.00	0	0	0.000	N-S(2):	0.000
	LT	2.00	134	2,880	0.047 *	E-W(1):	0.553 *
Westbound	RT	0.00	226	0	0.000	E-W(2):	0.482
	TH	2.00	1,072	3,200	0.406		
	LT	1.00	3	1,600	0.002 *	V/C:	0.603
Northbound	RT	1.00	2	1,600	0.000	Lost Time:	0.050
	TH	1.00	1	1,600	0.003	ITS:	0.000
	LT	0.00	4	1,600	0.003 *		
Eastbound	RT	0.00	11	0	0.000	ICU:	0.653
	TH	2.00	1,753	3,200	0.551 *		
	LT	1.00	121	1,600	0.076	LOS:	B

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	169	1,600	0.069	N-S(1):	0.127 *
	TH	0.01	1	10	0.102	N-S(2):	0.000
	LT	1.99	325	2,871	0.113 *	E-W(1):	0.565
Westbound	RT	0.00	298	0	0.000	E-W(2):	0.759 *
	TH	2.00	1,897	3,200	0.686 *		
	LT	1.00	15	1,600	0.009	V/C:	0.886
Northbound	RT	1.00	20	1,600	0.008	Lost Time:	0.050
	TH	1.00	8	1,600	0.014 *	ITS:	0.000
	LT	0.00	14	1,600	0.009		
Eastbound	RT	0.00	15	0	0.000	ICU:	0.936
	TH	2.00	1,765	3,200	0.556		
	LT	1.00	117	1,600	0.073 *	LOS:	E

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 9) LAS FLORES CYN RD & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	38	0	0.000		N-S(1):	0.027
	TH	1.00	1	1,600	0.050	*	N-S(2):	0.051 *
	LT	0.00	41	1,600	0.026		E-W(1):	0.541 *
Westbound	RT	1.00	28	1,600	0.005		E-W(2):	0.437
	TH	2.00	1,348	3,200	0.421			
	LT	1.00	3	1,600	0.002	*	V/C:	0.592
Northbound	RT	0.00	0	0	0.000		Lost Time:	0.050
	TH	1.00	0	1,600	0.001		ITS:	0.000
	LT	0.00	1	1,600	0.001	*		
Eastbound	RT	0.00	0	0	0.000		ICU:	0.642
	TH	2.00	1,724	3,200	0.539	*		
	LT	1.00	25	1,600	0.016		LOS:	B

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	38	0	0.000		N-S(1):	0.035
	TH	1.00	2	1,600	0.044	*	N-S(2):	0.050 *
	LT	0.00	31	1,600	0.019		E-W(1):	0.642
Westbound	RT	1.00	40	1,600	0.015		E-W(2):	0.667 *
	TH	2.00	2,046	3,200	0.639	*		
	LT	1.00	19	1,600	0.012		V/C:	0.717
Northbound	RT	0.00	15	0	0.000		Lost Time:	0.050
	TH	1.00	1	1,600	0.016		ITS:	0.000
	LT	0.00	10	1,600	0.006	*		
Eastbound	RT	0.00	18	0	0.000		ICU:	0.767
	TH	2.00	1,998	3,200	0.630			
	LT	1.00	45	1,600	0.028	*	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 2) TRANCAS CYN RD & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	53	0	0.000	
	TH	1.00	15	1,600	0.145	*
	LT	0.00	164	1,600	0.103	
Westbound	RT	0.00	158	0	0.000	
	TH	2.00	944	3,200	0.344	*
	LT	1.00	61	1,600	0.038	
Northbound	RT	0.00	58	0	0.000	
	TH	1.00	3	1,600	0.039	
	LT	0.00	2	1,600	0.001	*
Eastbound	RT	0.00	8	0	0.000	
	TH	2.00	770	3,200	0.243	
	LT	1.00	60	1,600	0.038	*

ICU ANALYSIS

N-S(1):	0.142	
N-S(2):	0.146	*
E-W(1):	0.281	
E-W(2):	0.382	*
V/C:	0.528	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.578	
LOS:	A	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 3) KANAN DUME RD & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	SBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	607	1,600	0.183 *	N-S(1):	0.112
	TH	0.00	0	0	0.000	N-S(2):	0.183 *
	LT	2.00	323	2,880	0.112	E-W(1):	0.387
Westbound	RT	1.00	206	1,600	0.129	E-W(2):	0.641 *
	TH	2.00	1,424	3,200	0.445 *		
	LT	0.00	0	0	0.000	V/C:	0.824
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000	ITS:	0.000
	LT	0.00	0	0	0.000 *		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.874
	TH	2.00	1,238	3,200	0.387		
	LT	1.00	314	1,600	0.196 *	LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 4) ZUMIREZ RD & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	7	0	0.000	
	TH	1.00	1	1,600	0.019	*
	LT	0.00	23	1,600	0.014	
Westbound	RT	0.00	27	0	0.000	
	TH	2.00	1,524	3,200	0.485	*
	LT	1.00	60	1,600	0.038	
Northbound	RT	1.00	69	1,600	0.024	
	TH	1.00	0	1,600	0.023	
	LT	0.00	36	1,600	0.023	*
Eastbound	RT	1.00	42	1,600	0.015	
	TH	2.00	1,435	3,200	0.448	
	LT	1.00	9	1,600	0.006	*

ICU ANALYSIS		
N-S(1):	0.038	
N-S(2):	0.042	*
E-W(1):	0.486	
E-W(2):	0.491	*
V/C:	0.533	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.583	
LOS:	A	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 5) MALIBU CYN RD & CIVIC CTR WAY
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	Y
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:	NBR, SBR, EBR, WBR		

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	29	1,600	0.000	N-S(1):	0.293 *
	TH	2.00	824	3,200	0.258	N-S(2):	0.277
	LT	1.00	299	1,600	0.187 *	E-W(1):	0.039 *
Westbound	RT	1.00	240	1,600	0.000	E-W(2):	0.000
	TH	1.00	29	1,600	0.018		
	LT	1.00	29	1,600	0.018 *	V/C:	0.332
Northbound	RT	1.00	109	1,600	0.000	Lost Time:	0.050
	TH	2.00	338	3,200	0.106 *	ITS:	0.000
	LT	1.00	30	1,600	0.019		
Eastbound	RT	1.00	27	1,600	0.000	ICU:	0.382
	TH	1.00	33	1,600	0.021 *		
	LT	1.00	30	1,600	0.019	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 6) MALIBU CYN RD & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	467	1,600	0.252 *	N-S(1):	0.288 *
	TH	0.18	29	288	0.101	N-S(2):	0.000
	LT	1.82	293	2,621	0.112	E-W(1):	0.520
Westbound	RT	1.00	202	1,600	0.014	E-W(2):	0.580 *
	TH	2.00	1,604	3,200	0.501 *		
	LT	1.00	44	1,600	0.028	V/C:	0.868
Northbound	RT	0.00	57	1,600	0.036 *	Lost Time:	0.050
	TH	2.00	16	1,600	0.027	ITS:	0.000
	LT	0.00	27	1,600	0.017		
Eastbound	RT	0.00	41	0	0.000	ICU:	0.918
	TH	2.00	1,532	3,200	0.492		
	LT	2.00	228	2,880	0.079 *	LOS:	E

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 7) WEBB WY & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	176	1,600	0.037	N-S(1):	0.180 *
	TH	0.78	109	1,250	0.087	N-S(2):	0.000
	LT	1.22	170	1,755	0.097 *	E-W(1):	0.477
Westbound	RT	1.00	118	1,600	0.000	E-W(2):	0.626 *
	TH	2.00	1,535	3,200	0.480 *		
	LT	1.00	261	1,600	0.163	V/C:	0.806
Northbound	RT	0.00	31	0	0.000	Lost Time:	0.050
	TH	1.00	77	1,600	0.068	ITS:	0.000
	LT	1.00	132	1,600	0.083 *		
Eastbound	RT	1.00	67	1,600	0.001	ICU:	0.856
	TH	3.00	1,508	4,800	0.314		
	LT	1.00	234	1,600	0.146 *	LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 8) CROSS CREEK RD & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	133	1,600	0.030	N-S(1):	0.164 *
	TH	0.03	7	55	0.128	N-S(2):	0.000
	LT	1.97	401	2,831	0.142 *	E-W(1):	0.537
Westbound	RT	0.00	398	0	0.000	E-W(2):	0.804 *
	TH	2.00	1,834	3,200	0.698 *		
	LT	1.00	25	1,600	0.016	V/C:	0.968
Northbound	RT	1.00	47	1,600	0.022 *	Lost Time:	0.050
	TH	1.00	6	1,600	0.014	ITS:	0.000
	LT	0.00	16	1,600	0.010		
Eastbound	RT	0.00	34	0	0.000	ICU:	1.018
	TH	2.00	1,634	3,200	0.521		
	LT	1.00	170	1,600	0.106 *	LOS:	F

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 9) LAS FLORES CYN RD & PCH
Description: OPENING YEAR (2014) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	53	0	0.000	
	TH	1.00	2	1,600	0.056	*
	LT	0.00	35	1,600	0.022	
Westbound	RT	1.00	39	1,600	0.013	
	TH	2.00	2,049	3,200	0.640	*
	LT	1.00	45	1,600	0.028	
Northbound	RT	0.00	18	0	0.000	
	TH	1.00	1	1,600	0.022	
	LT	0.00	16	1,600	0.010	*
Eastbound	RT	0.00	45	0	0.000	
	TH	2.00	1,712	3,200	0.549	
	LT	1.00	39	1,600	0.024	*

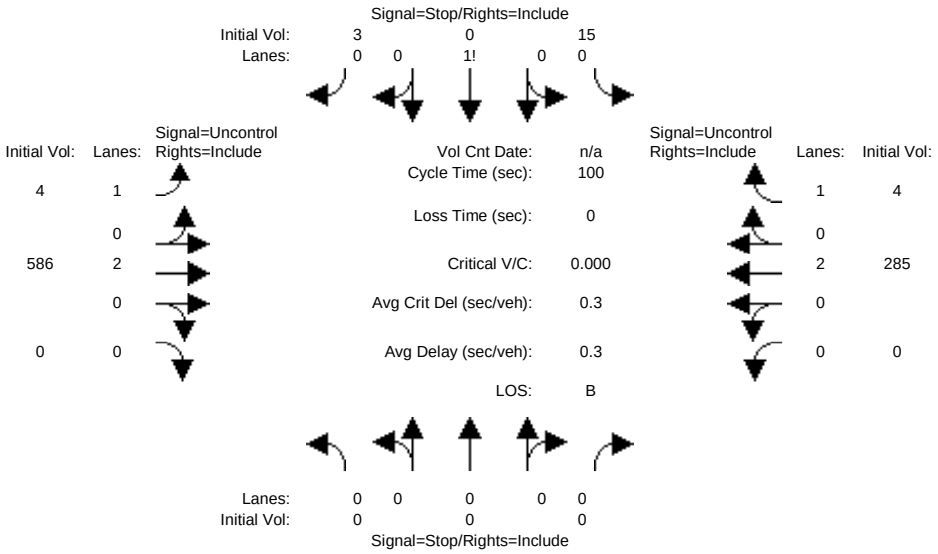
ICU ANALYSIS		
N-S(1):	0.044	
N-S(2):	0.066	*
E-W(1):	0.577	
E-W(2):	0.664	*
V/C:	0.730	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.780	
LOS:	C	

* - Denotes critical movement

CUMULATIVE YEAR (2030)

Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
CBAM

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	15	0	3	4	586	0	0	285	4
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	15	0	3	4	586	0	0	285	4
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	15	0	3	4	586	0	0	285	4
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	15	0	3	4	586	0	0	285	4
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	15	0	3	4	586	0	0	285	4
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	586	879	143	289	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	446	288	886	1284	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	445	287	886	1284	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.03	0.00	0.00	0.00	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	7.8	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	485	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.1	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	12.7	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	B	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			12.7			xxxxxx			xxxxxx		
ApproachLOS:	*			B			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    15    0     3     4  586     0     0  285     4
ApproachDel:    xxxxxx             12.7           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=18]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=897]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    15    0     3     4  586     0     0  285     4
------------|---------------||---------------||---------------||---------------|
Major Street Volume:              879
Minor Approach Volume:            18
Minor Approach Volume Threshold: 329
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
```

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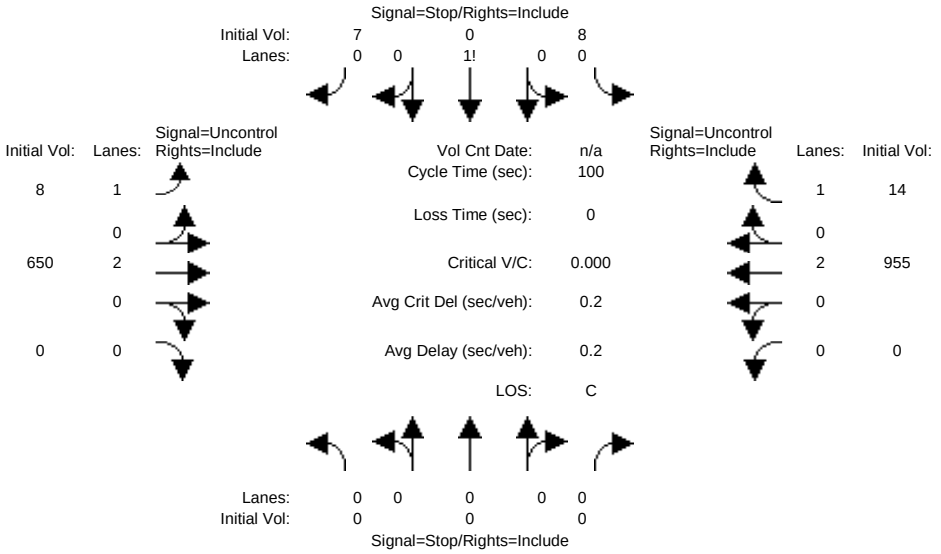
Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
CBPM

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	8	0	7	8	650	0	0	955	14
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	8	0	7	8	650	0	0	955	14
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	8	0	7	8	650	0	0	955	14
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	8	0	7	8	650	0	0	955	14
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	8	0	7	8	650	0	0	955	14
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	1296	1621	478	969	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	156	104	539	719	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	155	103	539	719	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.05	0.00	0.01	0.01	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	10.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	B	*	*	*	*	*
Movement:	LT - LTR - RT			LT - LTR - RT			LT - LTR - RT			LT - LTR - RT		
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	232	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.2	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	21.6	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	C	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			21.6			xxxxxx			xxxxxx		
ApproachLOS:	*			C			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0     8    0     7     8  650     0     0  955    14
ApproachDel:    xxxxxx             21.6           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=15]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1642]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0     8    0     7     8  650     0     0  955    14
------------|---------------||---------------||---------------||---------------|
Major Street Volume:             1627
Minor Approach Volume:           15
Minor Approach Volume Threshold: 117
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
```

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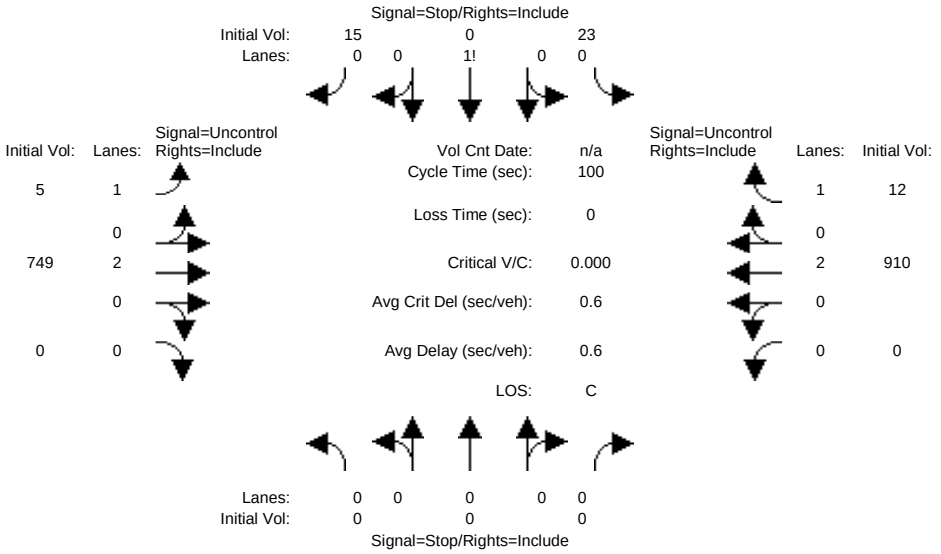
Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
CBSAT

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	23	0	15	5	749	0	0	910	12
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	23	0	15	5	749	0	0	910	12
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	23	0	15	5	749	0	0	910	12
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	23	0	15	5	749	0	0	910	12
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	23	0	15	5	749	0	0	910	12
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	1295	1669	455	922	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	157	97	558	749	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	156	97	558	749	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.15	0.00	0.03	0.01	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	9.8	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	218	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.6	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	25.0	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	C	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			25.0			xxxxxx			xxxxxx		
ApproachLOS:	*			C			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    23    0    15     5  749     0     0  910    12
ApproachDel:    xxxxxx             25.0           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.3]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=38]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1714]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                 Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    23    0    15     5  749     0     0  910    12
------------|---------------||---------------||---------------||---------------|
Major Street Volume:             1676
Minor Approach Volume:           38
Minor Approach Volume Threshold: 107
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
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TRAFFIC SIGNAL WARRANTS
FOUR HOUR VEHICULAR VOLUME (MUTCD Warrant 2, Caltrans Warrant 9)
PEAK HOUR VEHICULAR VOLUME (MUTCD Warrant 3, Caltrans Warrant 11)

Major Street: Pacific Coast Highway
Minor Street: Decker Rd
Scenario: Cumulative Base
Urban/Rural: U (U=urban, R=rural [a])

PEAK HOUR VOLUME (MUTCD Warrant 3, Caltrans Warrant 11)

Number of Lanes on Each Approach			
Major Street:	2		
Minor Street:	1		
Vehicles Per Hour (Peak Hour)			
Major Street (Approach 1):	922	Major Street Left Turn (see note [b]):	5
Major Street (Approach 2):	754	Minor Street (Higher Volume App.):	38
Major Street Total (Both Approaches):	1,676	Minor Street Total:	43
Minimum Volume on Major Street to Satisfy Warrant (see note [d]):	510	Minimum Volume on Minor Street to Satisfy Warrant (see note [d]):	120

PEAK HOUR VOLUME WARRANT SATISFIED? **NO**

Notes:

a. May be used when the major-street speed exceeds 40 mph or in an isolated community with a population of less than 10,000.

b. Heavier left-turn movement from the major street may be included with minor street volume if a separate signal phase is proposed for left-turn movements.

c. From: USDOT, FHWA, "Manual on Uniform Traffic Control Devices," 2001, Figure 4C-1.

d. From: USDOT, FHWA, "Manual on Uniform Traffic Control Devices," 2001, Figure 4C-3.

Adopted from: U.S. Department of Transportation, Federal Highway Administration, "Manual on Uniform Traffic Control Devices, Millennium Edition," 2001; and Caltrans, "Traffic Manual," 2002.

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 2) TRANCAS CYN RD & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	26	0	0.000	N-S(1):	0.107
	TH	1.00	8	1,600	0.109 *	N-S(2):	0.110 *
	LT	0.00	140	1,600	0.088	E-W(1):	0.223 *
Westbound	RT	0.00	95	0	0.000	E-W(2):	0.160
	TH	2.00	317	3,200	0.129		
	LT	1.00	33	1,600	0.021 *	V/C:	0.333
Northbound	RT	0.00	19	0	0.000	Lost Time:	0.050
	TH	1.00	9	1,600	0.019	ITS:	0.000
	LT	0.00	2	1,600	0.001 *		
Eastbound	RT	0.00	3	0	0.000	ICU:	0.383
	TH	2.00	642	3,200	0.202 *		
	LT	1.00	50	1,600	0.031	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	55	0	0.000	N-S(1):	0.153 *
	TH	1.00	3	1,600	0.144	N-S(2):	0.147
	LT	0.00	172	1,600	0.108 *	E-W(1):	0.250
Westbound	RT	0.00	156	0	0.000	E-W(2):	0.400 *
	TH	2.00	1,001	3,200	0.362 *		
	LT	1.00	48	1,600	0.030	V/C:	0.553
Northbound	RT	0.00	57	0	0.000	Lost Time:	0.050
	TH	1.00	10	1,600	0.045 *	ITS:	0.000
	LT	0.00	5	1,600	0.003		
Eastbound	RT	0.00	10	0	0.000	ICU:	0.603
	TH	2.00	695	3,200	0.220		
	LT	1.00	61	1,600	0.038 *	LOS:	B

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 3) KANAN DUME RD & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	SBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	276	1,600	0.076	N-S(1):	0.080 *
	TH	0.00	0	0	0.000	N-S(2):	0.076
	LT	2.00	229	2,880	0.080 *	E-W(1):	0.259
Westbound	RT	1.00	124	1,600	0.078	E-W(2):	0.310 *
	TH	2.00	685	3,200	0.214 *		
	LT	0.00	0	0	0.000	V/C:	0.390
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000 *	ITS:	0.000
	LT	0.00	0	0	0.000		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.440
	TH	2.00	830	3,200	0.259		
	LT	1.00	154	1,600	0.096 *	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	213	1,600	0.000	N-S(1):	0.063 *
	TH	0.00	0	0	0.000	N-S(2):	0.000
	LT	2.00	180	2,880	0.063 *	E-W(1):	0.370
Westbound	RT	1.00	283	1,600	0.177	E-W(2):	0.628 *
	TH	2.00	1,255	3,200	0.392 *		
	LT	0.00	0	0	0.000	V/C:	0.691
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000 *	ITS:	0.000
	LT	0.00	0	0	0.000		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.741
	TH	2.00	1,185	3,200	0.370		
	LT	1.00	378	1,600	0.236 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 4) ZUMIREZ RD & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	10	0	0.000		N-S(1):	0.032
	TH	1.00	3	1,600	0.011	*	N-S(2):	0.039 *
	LT	0.00	4	1,600	0.003		E-W(1):	0.384 *
Westbound	RT	0.00	7	0	0.000		E-W(2):	0.242
	TH	2.00	749	3,200	0.236			
	LT	1.00	117	1,600	0.073	*	V/C:	0.423
Northbound	RT	1.00	89	1,600	0.019		Lost Time:	0.050
	TH	1.00	2	1,600	0.029		ITS:	0.000
	LT	0.00	45	1,600	0.028	*		
Eastbound	RT	1.00	38	1,600	0.010		ICU:	0.473
	TH	2.00	994	3,200	0.311	*		
	LT	1.00	9	1,600	0.006		LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	11	0	0.000		N-S(1):	0.052 *
	TH	1.00	0	1,600	0.009		N-S(2):	0.038
	LT	0.00	4	1,600	0.003	*	E-W(1):	0.456
Westbound	RT	0.00	8	0	0.000		E-W(2):	0.474 *
	TH	2.00	1,503	3,200	0.472	*		
	LT	1.00	64	1,600	0.040		V/C:	0.526
Northbound	RT	1.00	111	1,600	0.049	*	Lost Time:	0.050
	TH	1.00	3	1,600	0.031		ITS:	0.000
	LT	0.00	47	1,600	0.029			
Eastbound	RT	1.00	25	1,600	0.001		ICU:	0.576
	TH	2.00	1,331	3,200	0.416			
	LT	1.00	3	1,600	0.002	*	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 5) MALIBU CYN RD & CIVIC CTR WAY
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	Y
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:	NBR, SBR, EBR, WBR		

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	198	1,600	0.000	N-S(1):	0.086
	TH	2.00	1,321	3,200	0.413 *	N-S(2):	0.426 *
	LT	1.00	23	1,600	0.014	E-W(1):	0.065 *
Westbound	RT	1.00	238	1,600	0.000	E-W(2):	0.000
	TH	1.00	83	1,600	0.052 *		
	LT	1.00	20	1,600	0.013	V/C:	0.491
Northbound	RT	1.00	54	1,600	0.000	Lost Time:	0.050
	TH	2.00	229	3,200	0.072	ITS:	0.000
	LT	1.00	20	1,600	0.013 *		
Eastbound	RT	1.00	10	1,600	0.000	ICU:	0.541
	TH	0.74	14	1,179	0.012		
	LT	1.26	24	1,819	0.013 *	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	44	1,600	0.000	N-S(1):	0.334 *
	TH	2.00	529	3,200	0.165	N-S(2):	0.179
	LT	1.00	232	1,600	0.145 *	E-W(1):	0.141 *
Westbound	RT	1.00	707	1,600	0.000	E-W(2):	0.000
	TH	1.00	34	1,600	0.021 *		
	LT	1.00	23	1,600	0.014	V/C:	0.475
Northbound	RT	1.00	91	1,600	0.000	Lost Time:	0.050
	TH	2.00	606	3,200	0.189 *	ITS:	0.000
	LT	1.00	23	1,600	0.014		
Eastbound	RT	1.00	35	1,600	0.000	ICU:	0.525
	TH	0.59	102	943	0.108		
	LT	1.41	244	2,031	0.120 *	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 6) MALIBU CYN RD & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	1.00	235	1,600	0.119		N-S(1):	0.381 *
	TH	0.03	16	47	0.337		N-S(2):	0.000
	LT	1.97	1,063	2,837	0.375	*	E-W(1):	0.339 *
Westbound	RT	1.00	172	1,600	0.000		E-W(2):	0.288
	TH	2.00	740	3,200	0.231			
	LT	1.00	4	1,600	0.003	*	V/C:	0.720
Northbound	RT	0.00	8	0	0.000		Lost Time:	0.050
	TH	2.00	8	3,200	0.006	*	ITS:	0.000
	LT	0.00	3	1,600	0.002			
Eastbound	RT	0.00	9	0	0.000		ICU:	0.770
	TH	2.00	1,065	3,200	0.336	*		
	LT	2.00	163	2,880	0.057		LOS:	C

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	1.00	199	1,600	0.061		N-S(1):	0.138 *
	TH	0.08	15	132	0.114		N-S(2):	0.000
	LT	1.92	349	2,761	0.126	*	E-W(1):	0.441
Westbound	RT	1.00	344	1,600	0.089		E-W(2):	0.595 *
	TH	2.00	1,498	3,200	0.468	*		
	LT	1.00	16	1,600	0.010		V/C:	0.733
Northbound	RT	0.00	19	1,600	0.012	*	Lost Time:	0.050
	TH	2.00	4	1,600	0.009		ITS:	0.000
	LT	0.00	10	1,600	0.006			
Eastbound	RT	0.00	23	0	0.000		ICU:	0.783
	TH	2.00	1,355	3,200	0.431			
	LT	2.00	365	2,880	0.127	*	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 7) WEBB WY & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	58	1,600	0.000	N-S(1):	0.081 *
	TH	0.78	45	1,252	0.036	N-S(2):	0.000
	LT	1.22	70	1,753	0.040 *	E-W(1):	0.446 *
Westbound	RT	1.00	276	1,600	0.133	E-W(2):	0.378
	TH	2.00	767	3,200	0.240		
	LT	1.00	130	1,600	0.081 *	V/C:	0.527
Northbound	RT	0.00	12	0	0.000	Lost Time:	0.050
	TH	1.00	53	1,600	0.041 *	ITS:	0.000
	LT	1.00	59	1,600	0.037		
Eastbound	RT	1.00	74	1,600	0.028	ICU:	0.577
	TH	3.00	1,753	4,800	0.365 *		
	LT	1.00	221	1,600	0.138	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	165	1,600	0.067	N-S(1):	0.227 *
	TH	0.48	86	760	0.113	N-S(2):	0.000
	LT	1.52	276	2,196	0.126 *	E-W(1):	0.447
Westbound	RT	1.00	413	1,600	0.132	E-W(2):	0.536 *
	TH	2.00	1,483	3,200	0.463 *		
	LT	1.00	222	1,600	0.139	V/C:	0.763
Northbound	RT	0.00	32	0	0.000	Lost Time:	0.050
	TH	1.00	80	1,600	0.070	ITS:	0.000
	LT	1.00	162	1,600	0.101 *		
Eastbound	RT	1.00	59	1,600	0.000	ICU:	0.813
	TH	3.00	1,478	4,800	0.308		
	LT	1.00	116	1,600	0.073 *	LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 8) CROSS CREEK RD & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	75	1,600	0.008	N-S(1):	0.046 *
	TH	0.00	0	0	0.000	N-S(2):	0.000
	LT	2.00	124	2,880	0.043 *	E-W(1):	0.571 *
Westbound	RT	0.00	230	0	0.000	E-W(2):	0.502
	TH	2.00	1,122	3,200	0.423		
	LT	1.00	3	1,600	0.002 *	V/C:	0.617
Northbound	RT	1.00	2	1,600	0.000	Lost Time:	0.050
	TH	1.00	1	1,600	0.003	ITS:	0.000
	LT	0.00	4	1,600	0.003 *		
Eastbound	RT	0.00	12	0	0.000	ICU:	0.667
	TH	2.00	1,809	3,200	0.569 *		
	LT	1.00	126	1,600	0.079	LOS:	B

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	177	1,600	0.073	N-S(1):	0.129 *
	TH	0.01	1	10	0.103	N-S(2):	0.000
	LT	1.99	328	2,871	0.114 *	E-W(1):	0.590
Westbound	RT	0.00	294	0	0.000	E-W(2):	0.780 *
	TH	2.00	1,959	3,200	0.704 *		
	LT	1.00	16	1,600	0.010	V/C:	0.909
Northbound	RT	1.00	21	1,600	0.008	Lost Time:	0.050
	TH	1.00	9	1,600	0.015 *	ITS:	0.000
	LT	0.00	15	1,600	0.009		
Eastbound	RT	0.00	16	0	0.000	ICU:	0.959
	TH	2.00	1,839	3,200	0.580		
	LT	1.00	122	1,600	0.076 *	LOS:	E

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 9) LAS FLORES CYN RD & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	40	0	0.000	N-S(1):	0.029
	TH	1.00	1	1,600	0.053 *	N-S(2):	0.054 *
	LT	0.00	44	1,600	0.028	E-W(1):	0.552 *
Westbound	RT	1.00	29	1,600	0.004	E-W(2):	0.455
	TH	2.00	1,406	3,200	0.439		
	LT	1.00	3	1,600	0.002 *	V/C:	0.606
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	1.00	0	1,600	0.001	ITS:	0.000
	LT	0.00	1	1,600	0.001 *		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.656
	TH	2.00	1,760	3,200	0.550 *		
	LT	1.00	26	1,600	0.016	LOS:	B

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	0.00	40	0	0.000	N-S(1):	0.039
	TH	1.00	2	1,600	0.047 *	N-S(2):	0.054 *
	LT	0.00	33	1,600	0.021	E-W(1):	0.666
Westbound	RT	1.00	43	1,600	0.017	E-W(2):	0.686 *
	TH	2.00	2,098	3,200	0.656 *		
	LT	1.00	20	1,600	0.013	V/C:	0.740
Northbound	RT	0.00	16	0	0.000	Lost Time:	0.050
	TH	1.00	1	1,600	0.018	ITS:	0.000
	LT	0.00	11	1,600	0.007 *		
Eastbound	RT	0.00	19	0	0.000	ICU:	0.790
	TH	2.00	2,070	3,200	0.653		
	LT	1.00	48	1,600	0.030 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 2) TRANCAS CYN RD & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	55	0	0.000	
	TH	1.00	16	1,600	0.151	*
	LT	0.00	171	1,600	0.107	
Westbound	RT	0.00	165	0	0.000	
	TH	2.00	980	3,200	0.358	*
	LT	1.00	64	1,600	0.040	
Northbound	RT	0.00	61	0	0.000	
	TH	1.00	3	1,600	0.041	
	LT	0.00	2	1,600	0.001	*
Eastbound	RT	0.00	9	0	0.000	
	TH	2.00	793	3,200	0.251	
	LT	1.00	62	1,600	0.039	*

ICU ANALYSIS		
N-S(1):	0.148	
N-S(2):	0.152	*
E-W(1):	0.291	
E-W(2):	0.397	*
V/C:	0.549	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.599	
LOS:	A	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 3) KANAN DUME RD & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	SBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	642	1,600	0.194 *	N-S(1):	0.117
	TH	0.00	0	0	0.000	N-S(2):	0.194 *
	LT	2.00	337	2,880	0.117	E-W(1):	0.402
Westbound	RT	1.00	213	1,600	0.133	E-W(2):	0.672 *
	TH	2.00	1,485	3,200	0.464 *		
	LT	0.00	0	0	0.000	V/C:	0.866
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000	ITS:	0.000
	LT	0.00	0	0	0.000 *		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.916
	TH	2.00	1,286	3,200	0.402		
	LT	1.00	332	1,600	0.208 *	LOS:	E

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 4) ZUMIREZ RD & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	8	0	0.000	
	TH	1.00	1	1,600	0.020	*
	LT	0.00	23	1,600	0.014	
Westbound	RT	0.00	28	0	0.000	
	TH	2.00	1,588	3,200	0.505	*
	LT	1.00	63	1,600	0.039	
Northbound	RT	1.00	73	1,600	0.026	
	TH	1.00	0	1,600	0.024	
	LT	0.00	38	1,600	0.024	*
Eastbound	RT	1.00	45	1,600	0.016	
	TH	2.00	1,491	3,200	0.466	
	LT	1.00	10	1,600	0.006	*

ICU ANALYSIS		
N-S(1):	0.040	
N-S(2):	0.044	*
E-W(1):	0.505	
E-W(2):	0.511	*
V/C:	0.555	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.605	
LOS:	B	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 5) MALIBU CYN RD & CIVIC CTR WAY
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	Y
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:	NBR, SBR, EBR, WBR		

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	1.00	31	1,600	0.000	
	TH	2.00	868	3,200	0.271	
	LT	1.00	312	1,600	0.195 *	
Westbound	RT	1.00	250	1,600	0.000	
	TH	1.00	31	1,600	0.019 *	
	LT	1.00	29	1,600	0.018	
Northbound	RT	1.00	108	1,600	0.000	
	TH	2.00	354	3,200	0.111 *	
	LT	1.00	32	1,600	0.020	
Eastbound	RT	1.00	28	1,600	0.000	
	TH	1.00	35	1,600	0.022 *	
	LT	1.00	32	1,600	0.020	

ICU ANALYSIS	
N-S(1):	0.306 *
N-S(2):	0.291
E-W(1):	0.041 *
E-W(2):	0.000
V/C:	0.347
Lost Time:	0.050
ITS:	0.000
ICU:	0.397
LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 6) MALIBU CYN RD & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	489	1,600	0.265 *	N-S(1):	0.303 *
	TH	0.18	31	291	0.107	N-S(2):	0.000
	LT	1.82	310	2,618	0.118	E-W(1):	0.537
Westbound	RT	1.00	211	1,600	0.013	E-W(2):	0.598 *
	TH	2.00	1,652	3,200	0.516 *		
	LT	1.00	47	1,600	0.029	V/C:	0.901
Northbound	RT	0.00	60	1,600	0.038 *	Lost Time:	0.050
	TH	2.00	17	1,600	0.028	ITS:	0.000
	LT	0.00	28	1,600	0.018		
Eastbound	RT	0.00	44	0	0.000	ICU:	0.951
	TH	2.00	1,581	3,200	0.508		
	LT	2.00	236	2,880	0.082 *	LOS:	E

* - Denotes critical movement

Project Title: **MALIBU HOUSING ELEMENT (SM11-2458)**
Intersection: **7) WEBB WY & PCH**
Description: **FUTURE YEAR (2030) BASE CONDITIONS**

Date/Time: **SAT MID-DAY PEAK HOUR**

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	1.00	177	1,600	0.036	
	TH	0.79	115	1,265	0.091	
	LT	1.21	176	1,742	0.101	*
Westbound	RT	1.00	125	1,600	0.000	
	TH	2.00	1,585	3,200	0.495	*
	LT	1.00	276	1,600	0.173	
Northbound	RT	0.00	33	0	0.000	
	TH	1.00	81	1,600	0.071	
	LT	1.00	139	1,600	0.087	*
Eastbound	RT	1.00	71	1,600	0.001	
	TH	3.00	1,563	4,800	0.326	
	LT	1.00	238	1,600	0.149	*

ICU ANALYSIS	
N-S(1):	0.188 *
N-S(2):	0.000
E-W(1):	0.499
E-W(2):	0.644 *
V/C:	0.832
Lost Time:	0.050
ITS:	0.000
ICU:	0.882
LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 8) CROSS CREEK RD & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	140	1,600	0.032	N-S(1):	0.166 *
	TH	0.04	8	62	0.129	N-S(2):	0.000
	LT	1.96	405	2,824	0.143 *	E-W(1):	0.558
Westbound	RT	0.00	401	0	0.000	E-W(2):	0.832 *
	TH	2.00	1,903	3,200	0.720 *		
	LT	1.00	26	1,600	0.016	V/C:	0.998
Northbound	RT	1.00	50	1,600	0.023 *	Lost Time:	0.050
	TH	1.00	7	1,600	0.015	ITS:	0.000
	LT	0.00	17	1,600	0.011		
Eastbound	RT	0.00	36	0	0.000	ICU:	1.048
	TH	2.00	1,697	3,200	0.542		
	LT	1.00	179	1,600	0.112 *	LOS:	F

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 9) LAS FLORES CYN RD & PCH
Description: FUTURE YEAR (2030) BASE CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	56	0	0.000	
	TH	1.00	2	1,600	0.059	*
	LT	0.00	37	1,600	0.023	
Westbound	RT	1.00	41	1,600	0.014	
	TH	2.00	2,115	3,200	0.661	*
	LT	1.00	48	1,600	0.030	
Northbound	RT	0.00	19	0	0.000	
	TH	1.00	1	1,600	0.023	
	LT	0.00	17	1,600	0.011	*
Eastbound	RT	0.00	48	0	0.000	
	TH	2.00	1,764	3,200	0.566	
	LT	1.00	41	1,600	0.026	*

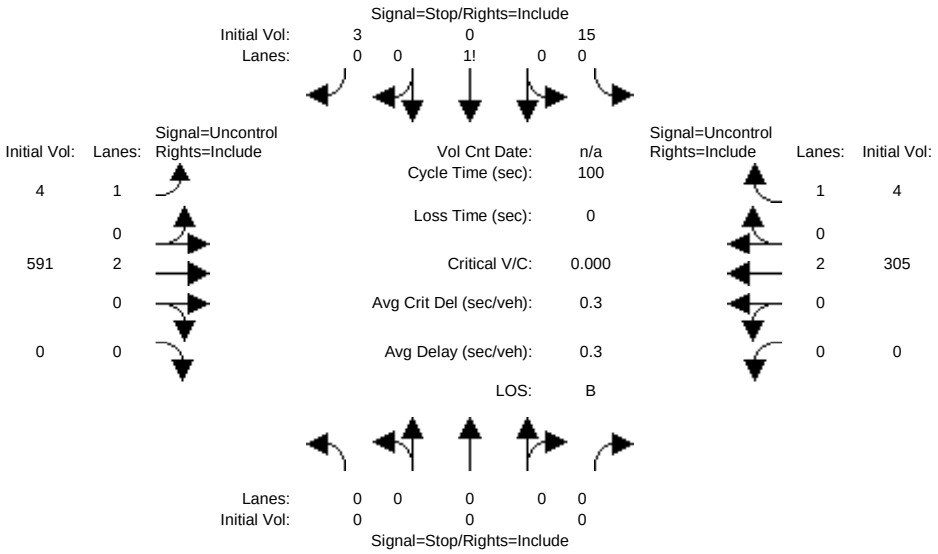
ICU ANALYSIS		
N-S(1):	0.046	
N-S(2):	0.070	*
E-W(1):	0.596	
E-W(2):	0.687	*
V/C:	0.757	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.807	
LOS:	D	

* - Denotes critical movement

CUMULATIVE YEAR (2030) PLUS PROJECT

Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
CPAM

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	15	0	3	4	591	0	0	305	4
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	15	0	3	4	591	0	0	305	4
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	15	0	3	4	591	0	0	305	4
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	15	0	3	4	591	0	0	305	4
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	15	0	3	4	591	0	0	305	4
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	609	904	153	309	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	432	279	873	1263	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	431	278	873	1263	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.03	0.00	0.00	0.00	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	7.9	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	470	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.1	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	13.0	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	B	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			13.0			xxxxxx			xxxxxx		
ApproachLOS:	*			B			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    15    0     3     4  591     0     0  305     4
ApproachDel:    xxxxxx             13.0           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=18]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=922]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    15    0     3     4  591     0     0  305     4
------------|---------------||---------------||---------------||---------------|
Major Street Volume:              904
Minor Approach Volume:            18
Minor Approach Volume Threshold: 320
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
```

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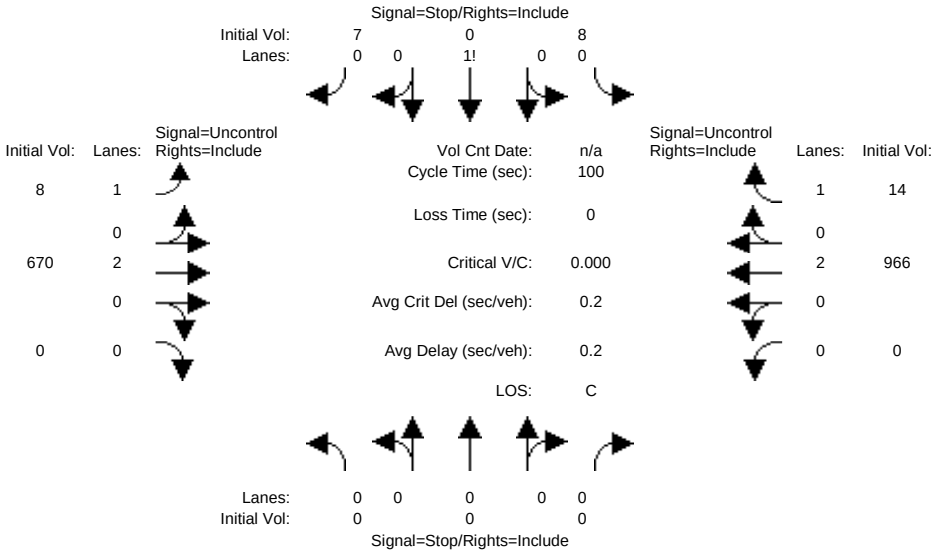
Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
CPPM

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	8	0	7	8	670	0	0	966	14
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	8	0	7	8	670	0	0	966	14
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	8	0	7	8	670	0	0	966	14
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	8	0	7	8	670	0	0	966	14
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	8	0	7	8	670	0	0	966	14
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	1317	1652	483	980	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	152	100	535	712	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	150	98	535	712	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.05	0.00	0.01	0.01	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	10.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	B	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	226	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.2	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	22.0	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	C	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			22.0			xxxxxx			xxxxxx		
ApproachLOS:	*			C			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0     8    0     7     8  670     0     0  966    14
ApproachDel:    xxxxxx             22.0           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=15]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1673]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0     8    0     7     8  670     0     0  966    14
------------|---------------||---------------||---------------||---------------|
Major Street Volume:             1658
Minor Approach Volume:           15
Minor Approach Volume Threshold: 111
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
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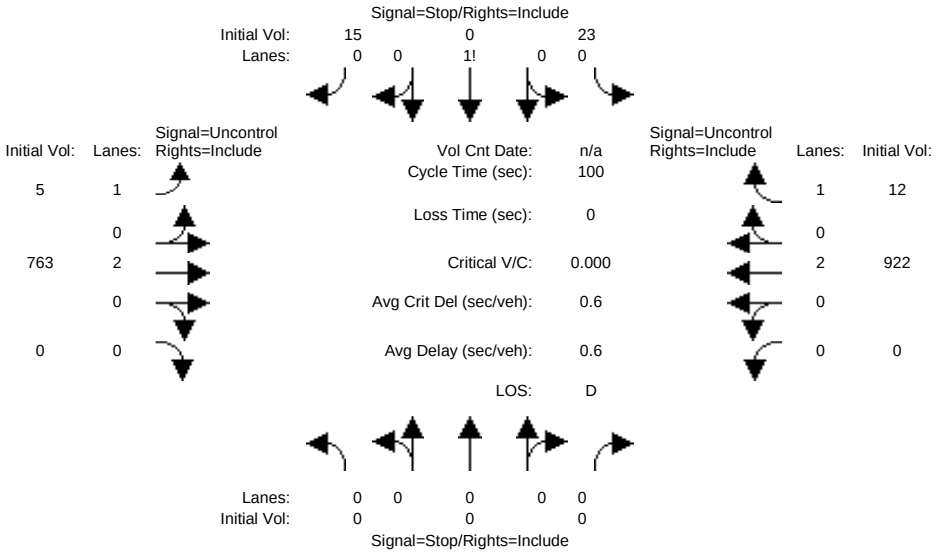
Level Of Service Computation Report
2000 HCM Unsignalized (Future Volume Alternative)
CPSAT

Intersection #1:



Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Volume Module:												
Base Vol:	0	0	0	23	0	15	5	763	0	0	922	12
Growth Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Initial Bse:	0	0	0	23	0	15	5	763	0	0	922	12
Added Vol:	0	0	0	0	0	0	0	0	0	0	0	0
PasserByVol:	0	0	0	0	0	0	0	0	0	0	0	0
Initial Fut:	0	0	0	23	0	15	5	763	0	0	922	12
User Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Adj:	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
PHF Volume:	0	0	0	23	0	15	5	763	0	0	922	12
Reduct Vol:	0	0	0	0	0	0	0	0	0	0	0	0
FinalVolume:	0	0	0	23	0	15	5	763	0	0	922	12
Critical Gap Module:												
Critical Gp:	xxxxx	xxxx	xxxxx	6.8	6.5	6.9	4.1	xxxx	xxxxx	xxxxx	xxxx	xxxxx
FollowUpTim:	xxxxx	xxxx	xxxxx	3.5	4.0	3.3	2.2	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Capacity Module:												
Cnflict Vol:	xxxx	xxxx	xxxxx	1314	1695	461	934	xxxx	xxxxx	xxxx	xxxx	xxxxx
Potent Cap.:	xxxx	xxxx	xxxxx	152	94	553	741	xxxx	xxxxx	xxxx	xxxx	xxxxx
Move Cap.:	xxxx	xxxx	xxxxx	152	93	553	741	xxxx	xxxxx	xxxx	xxxx	xxxxx
Volume/Cap:	xxxx	xxxx	xxxx	0.15	0.00	0.03	0.01	xxxx	xxxx	xxxx	xxxx	xxxx
Level Of Service Module:												
2Way95thQ:	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx	0.0	xxxx	xxxxx	xxxx	xxxx	xxxxx
Control Del:	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx	9.9	xxxx	xxxxx	xxxxx	xxxx	xxxxx
LOS by Move:	*	*	*	*	*	*	A	*	*	*	*	*
Movement:	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT	LT	LTR	RT
Shared Cap.:	xxxx	xxxx	xxxxx	xxxx	212	xxxxx	xxxx	xxxx	xxxxx	xxxx	xxxx	xxxxx
SharedQueue:	xxxxx	xxxx	xxxxx	xxxxx	0.6	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shrd ConDel:	xxxxx	xxxx	xxxxx	xxxxx	25.6	xxxxx	xxxxx	xxxx	xxxxx	xxxxx	xxxx	xxxxx
Shared LOS:	*	*	*	*	D	*	*	*	*	*	*	*
ApproachDel:	xxxxxx			25.6			xxxxxx			xxxxxx		
ApproachLOS:	*			D			*			*		

Note: Queue reported is the number of cars per lane.

Peak Hour Delay Signal Warrant Report

****

Intersection #1

****

Future Volume Alternative: Peak Hour Warrant NOT Met

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```
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    23    0    15     5  763     0     0  922    12
ApproachDel:    xxxxxx             25.6           xxxxxx           xxxxxx
------------|---------------||---------------||---------------||---------------|
Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.3]
   FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=38]
   FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1740]
   SUCCEED - Total volume greater than or equal to 650 for intersection
             with less than four approaches.
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
a rigorous and complete traffic signal warrant analysis by the responsible
jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
                Peak Hour Volume Signal Warrant Report [Urban]
********************************************************************************
Intersection #1
********************************************************************************
Future Volume Alternative: Peak Hour Warrant NOT Met
------------|---------------||---------------||---------------||---------------|
Approach:      North Bound      South Bound       East Bound       West Bound
Movement:     L  -  T  -  R    L  -  T  -  R    L  -  T  -  R    L  -  T  -  R
------------|---------------||---------------||---------------||---------------|
Control:        Stop Sign        Stop Sign       Uncontrolled     Uncontrolled
Lanes:        0  0  0  0  0    0  0  1! 0  0    1  0  2  0  0    0  0  2  0  1
Initial Vol:    0    0     0    23    0    15     5  763     0     0  922    12
------------|---------------||---------------||---------------||---------------|
Major Street Volume:             1702
Minor Approach Volume:           38
Minor Approach Volume Threshold: 102
--------------------------------------------------------------------------------
SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an
"indicator" of the likelihood of an unsignalized intersection warranting
a traffic signal in the future.  Intersections that exceed this warrant
are probably more likely to meet one or more of the other volume based
signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace
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jurisdiction.  Consideration of the other signal warrants, which is beyond
the scope of this software, may yield different results.
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TRAFFIC SIGNAL WARRANTS
FOUR HOUR VEHICULAR VOLUME (MUTCD Warrant 2, Caltrans Warrant 9)
PEAK HOUR VEHICULAR VOLUME (MUTCD Warrant 3, Caltrans Warrant 11)

Major Street: Pacific Coast Highway
Minor Street: Decker Rd
Scenario: Cumulative + Project
Urban/Rural: U (U=urban, R=rural [a])

PEAK HOUR VOLUME (MUTCD Warrant 3, Caltrans Warrant 11)

Number of Lanes on Each Approach			
Major Street:	2		
Minor Street:	1		
Vehicles Per Hour (Peak Hour)			
Major Street (Approach 1):	934	Major Street Left Turn (see note [b]):	5
Major Street (Approach 2):	768	Minor Street (Higher Volume App.):	38
Major Street Total (Both Approaches):	1,702	Minor Street Total:	43
Minimum Volume on Major Street to Satisfy Warrant (see note [d]):	510	Minimum Volume on Minor Street to Satisfy Warrant (see note [d]):	110

PEAK HOUR VOLUME WARRANT SATISFIED? **NO**

Notes:

a. May be used when the major-street speed exceeds 40 mph or in an isolated community with a population of less than 10,000.

b. Heavier left-turn movement from the major street may be included with minor street volume if a separate signal phase is proposed for left-turn movements.

c. From: USDOT, FHWA, "Manual on Uniform Traffic Control Devices," 2001, Figure 4C-1.

d. From: USDOT, FHWA, "Manual on Uniform Traffic Control Devices," 2001, Figure 4C-3.

Adopted from: U.S. Department of Transportation, Federal Highway Administration, "Manual on Uniform Traffic Control Devices, Millennium Edition," 2001; and Caltrans, "Traffic Manual," 2002.

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 2) TRANCAS CYN RD & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	26	0	0.000		N-S(1):	0.107
	TH	1.00	8	1,600	0.109	*	N-S(2):	0.110 *
	LT	0.00	140	1,600	0.088		E-W(1):	0.224 *
Westbound	RT	0.00	95	0	0.000		E-W(2):	0.166
	TH	2.00	337	3,200	0.135			
	LT	1.00	33	1,600	0.021	*	V/C:	0.334
Northbound	RT	0.00	19	0	0.000		Lost Time:	0.050
	TH	1.00	9	1,600	0.019		ITS:	0.000
	LT	0.00	2	1,600	0.001	*		
Eastbound	RT	0.00	3	0	0.000		ICU:	0.384
	TH	2.00	647	3,200	0.203	*		
	LT	1.00	50	1,600	0.031		LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	55	0	0.000		N-S(1):	0.153 *
	TH	1.00	3	1,600	0.144		N-S(2):	0.147
	LT	0.00	172	1,600	0.108	*	E-W(1):	0.257
Westbound	RT	0.00	156	0	0.000		E-W(2):	0.403 *
	TH	2.00	1,012	3,200	0.365	*		
	LT	1.00	48	1,600	0.030		V/C:	0.556
Northbound	RT	0.00	57	0	0.000		Lost Time:	0.050
	TH	1.00	10	1,600	0.045	*	ITS:	0.000
	LT	0.00	5	1,600	0.003			
Eastbound	RT	0.00	10	0	0.000		ICU:	0.606
	TH	2.00	715	3,200	0.227			
	LT	1.00	61	1,600	0.038	*	LOS:	B

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 3) KANAN DUME RD & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	SBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	276	1,600	0.076	N-S(1):	0.080 *
	TH	0.00	0	0	0.000	N-S(2):	0.076
	LT	2.00	230	2,880	0.080 *	E-W(1):	0.261
Westbound	RT	1.00	128	1,600	0.080	E-W(2):	0.316 *
	TH	2.00	705	3,200	0.220 *		
	LT	0.00	0	0	0.000	V/C:	0.396
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000 *	ITS:	0.000
	LT	0.00	0	0	0.000		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.446
	TH	2.00	835	3,200	0.261		
	LT	1.00	154	1,600	0.096 *	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	213	1,600	0.000	N-S(1):	0.064 *
	TH	0.00	0	0	0.000	N-S(2):	0.000
	LT	2.00	184	2,880	0.064 *	E-W(1):	0.377
Westbound	RT	1.00	285	1,600	0.178	E-W(2):	0.632 *
	TH	2.00	1,266	3,200	0.396 *		
	LT	0.00	0	0	0.000	V/C:	0.696
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000 *	ITS:	0.000
	LT	0.00	0	0	0.000		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.746
	TH	2.00	1,205	3,200	0.377		
	LT	1.00	378	1,600	0.236 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 4) ZUMIREZ RD & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	10	0	0.000		N-S(1):	0.032
	TH	1.00	3	1,600	0.011	*	N-S(2):	0.039 *
	LT	0.00	4	1,600	0.003		E-W(1):	0.386 *
Westbound	RT	0.00	7	0	0.000		E-W(2):	0.250
	TH	2.00	774	3,200	0.244			
	LT	1.00	117	1,600	0.073	*	V/C:	0.425
Northbound	RT	1.00	89	1,600	0.019		Lost Time:	0.050
	TH	1.00	2	1,600	0.029		ITS:	0.000
	LT	0.00	45	1,600	0.028	*		
Eastbound	RT	1.00	38	1,600	0.010		ICU:	0.475
	TH	2.00	1,000	3,200	0.313	*		
	LT	1.00	9	1,600	0.006		LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	11	0	0.000		N-S(1):	0.052 *
	TH	1.00	0	1,600	0.009		N-S(2):	0.038
	LT	0.00	4	1,600	0.003	*	E-W(1):	0.463
Westbound	RT	0.00	8	0	0.000		E-W(2):	0.478 *
	TH	2.00	1,516	3,200	0.476	*		
	LT	1.00	64	1,600	0.040		V/C:	0.530
Northbound	RT	1.00	111	1,600	0.049	*	Lost Time:	0.050
	TH	1.00	3	1,600	0.031		ITS:	0.000
	LT	0.00	47	1,600	0.029			
Eastbound	RT	1.00	25	1,600	0.001		ICU:	0.580
	TH	2.00	1,355	3,200	0.423			
	LT	1.00	3	1,600	0.002	*	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 5) MALIBU CYN RD & CIVIC CTR WAY
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	Y
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:	NBR, SBR, EBR, WBR		

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	198	1,600	0.000	N-S(1):	0.087
	TH	2.00	1,322	3,200	0.413 *	N-S(2):	0.426 *
	LT	1.00	23	1,600	0.014	E-W(1):	0.065 *
Westbound	RT	1.00	239	1,600	0.000	E-W(2):	0.000
	TH	1.00	83	1,600	0.052 *		
	LT	1.00	22	1,600	0.014	V/C:	0.491
Northbound	RT	1.00	55	1,600	0.000	Lost Time:	0.050
	TH	2.00	232	3,200	0.073	ITS:	0.000
	LT	1.00	20	1,600	0.013 *		
Eastbound	RT	1.00	10	1,600	0.000	ICU:	0.541
	TH	0.74	14	1,179	0.012		
	LT	1.26	24	1,819	0.013 *	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	44	1,600	0.000	N-S(1):	0.336 *
	TH	2.00	532	3,200	0.166	N-S(2):	0.180
	LT	1.00	233	1,600	0.146 *	E-W(1):	0.141 *
Westbound	RT	1.00	708	1,600	0.000	E-W(2):	0.000
	TH	1.00	34	1,600	0.021 *		
	LT	1.00	24	1,600	0.015	V/C:	0.477
Northbound	RT	1.00	93	1,600	0.000	Lost Time:	0.050
	TH	2.00	608	3,200	0.190 *	ITS:	0.000
	LT	1.00	23	1,600	0.014		
Eastbound	RT	1.00	35	1,600	0.000	ICU:	0.527
	TH	0.59	102	943	0.108		
	LT	1.41	244	2,031	0.120 *	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 6) MALIBU CYN RD & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	238	1,600	0.120	N-S(1):	0.381 *
	TH	0.03	16	47	0.337	N-S(2):	0.000
	LT	1.97	1,063	2,837	0.375 *	E-W(1):	0.352 *
Westbound	RT	1.00	172	1,600	0.000	E-W(2):	0.294
	TH	2.00	754	3,200	0.236		
	LT	1.00	4	1,600	0.003 *	V/C:	0.733
Northbound	RT	0.00	8	0	0.000	Lost Time:	0.050
	TH	2.00	8	3,200	0.006 *	ITS:	0.000
	LT	0.00	3	1,600	0.002		
Eastbound	RT	0.00	9	0	0.000	ICU:	0.783
	TH	2.00	1,107	3,200	0.349 *		
	LT	2.00	167	2,880	0.058	LOS:	C

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	203	1,600	0.063	N-S(1):	0.138 *
	TH	0.08	15	132	0.114	N-S(2):	0.000
	LT	1.92	349	2,761	0.126 *	E-W(1):	0.449
Westbound	RT	1.00	344	1,600	0.089	E-W(2):	0.609 *
	TH	2.00	1,540	3,200	0.481 *		
	LT	1.00	16	1,600	0.010	V/C:	0.747
Northbound	RT	0.00	19	1,600	0.012 *	Lost Time:	0.050
	TH	2.00	4	1,600	0.009	ITS:	0.000
	LT	0.00	10	1,600	0.006		
Eastbound	RT	0.00	23	0	0.000	ICU:	0.797
	TH	2.00	1,381	3,200	0.439		
	LT	2.00	369	2,880	0.128 *	LOS:	C

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 7) WEBB WY & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	61	1,600	0.000	N-S(1):	0.081 *
	TH	0.78	45	1,252	0.036	N-S(2):	0.000
	LT	1.22	70	1,753	0.040 *	E-W(1):	0.455 *
Westbound	RT	1.00	276	1,600	0.133	E-W(2):	0.382
	TH	2.00	777	3,200	0.243		
	LT	1.00	130	1,600	0.081 *	V/C:	0.536
Northbound	RT	0.00	12	0	0.000	Lost Time:	0.050
	TH	1.00	53	1,600	0.041 *	ITS:	0.000
	LT	1.00	59	1,600	0.037		
Eastbound	RT	1.00	74	1,600	0.028	ICU:	0.586
	TH	3.00	1,794	4,800	0.374 *		
	LT	1.00	222	1,600	0.139	LOS:	A

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	167	1,600	0.067	N-S(1):	0.227 *
	TH	0.48	86	760	0.113	N-S(2):	0.000
	LT	1.52	276	2,196	0.126 *	E-W(1):	0.452
Westbound	RT	1.00	413	1,600	0.132	E-W(2):	0.550 *
	TH	2.00	1,523	3,200	0.476 *		
	LT	1.00	222	1,600	0.139	V/C:	0.777
Northbound	RT	0.00	32	0	0.000	Lost Time:	0.050
	TH	1.00	80	1,600	0.070	ITS:	0.000
	LT	1.00	162	1,600	0.101 *		
Eastbound	RT	1.00	59	1,600	0.000	ICU:	0.827
	TH	3.00	1,500	4,800	0.313		
	LT	1.00	119	1,600	0.074 *	LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 8) CROSS CREEK RD & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	75	1,600	0.008	N-S(1):	0.051 *
	TH	0.00	0	0	0.000	N-S(2):	0.000
	LT	2.00	139	2,880	0.048 *	E-W(1):	0.584 *
Westbound	RT	0.00	234	0	0.000	E-W(2):	0.506
	TH	2.00	1,132	3,200	0.427		
	LT	1.00	3	1,600	0.002 *	V/C:	0.635
Northbound	RT	1.00	2	1,600	0.000	Lost Time:	0.050
	TH	1.00	1	1,600	0.003	ITS:	0.000
	LT	0.00	4	1,600	0.003 *		
Eastbound	RT	0.00	12	0	0.000	ICU:	0.685
	TH	2.00	1,850	3,200	0.582 *		
	LT	1.00	126	1,600	0.079	LOS:	B

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	177	1,600	0.073	N-S(1):	0.132 *
	TH	0.01	1	9	0.105	N-S(2):	0.000
	LT	1.99	336	2,871	0.117 *	E-W(1):	0.597
Westbound	RT	0.00	309	0	0.000	E-W(2):	0.797 *
	TH	2.00	1,999	3,200	0.721 *		
	LT	1.00	16	1,600	0.010	V/C:	0.929
Northbound	RT	1.00	21	1,600	0.008	Lost Time:	0.050
	TH	1.00	9	1,600	0.015 *	ITS:	0.000
	LT	0.00	15	1,600	0.009		
Eastbound	RT	0.00	16	0	0.000	ICU:	0.979
	TH	2.00	1,861	3,200	0.587		
	LT	1.00	122	1,600	0.076 *	LOS:	E

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 9) LAS FLORES CYN RD & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: AM PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	40	0	0.000		N-S(1):	0.029
	TH	1.00	1	1,600	0.053	*	N-S(2):	0.054 *
	LT	0.00	44	1,600	0.028		E-W(1):	0.570 *
Westbound	RT	1.00	29	1,600	0.004		E-W(2):	0.460
	TH	2.00	1,420	3,200	0.444			
	LT	1.00	3	1,600	0.002	*	V/C:	0.624
Northbound	RT	0.00	0	0	0.000		Lost Time:	0.050
	TH	1.00	0	1,600	0.001		ITS:	0.000
	LT	0.00	1	1,600	0.001	*		
Eastbound	RT	0.00	0	0	0.000		ICU:	0.674
	TH	2.00	1,816	3,200	0.568	*		
	LT	1.00	26	1,600	0.016		LOS:	B

Date/Time: PM PEAK HOUR

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C		ICU ANALYSIS	
Southbound	RT	0.00	40	0	0.000		N-S(1):	0.039
	TH	1.00	2	1,600	0.047	*	N-S(2):	0.054 *
	LT	0.00	33	1,600	0.021		E-W(1):	0.675
Westbound	RT	1.00	43	1,600	0.017		E-W(2):	0.703 *
	TH	2.00	2,153	3,200	0.673	*		
	LT	1.00	20	1,600	0.013		V/C:	0.757
Northbound	RT	0.00	16	0	0.000		Lost Time:	0.050
	TH	1.00	1	1,600	0.018		ITS:	0.000
	LT	0.00	11	1,600	0.007	*		
Eastbound	RT	0.00	19	0	0.000		ICU:	0.807
	TH	2.00	2,100	3,200	0.662			
	LT	1.00	48	1,600	0.030	*	LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 2) TRANCAS CYN RD & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	55	0	0.000	
	TH	1.00	16	1,600	0.151	*
	LT	0.00	171	1,600	0.107	
Westbound	RT	0.00	165	0	0.000	
	TH	2.00	992	3,200	0.362	*
	LT	1.00	64	1,600	0.040	
Northbound	RT	0.00	61	0	0.000	
	TH	1.00	3	1,600	0.041	
	LT	0.00	2	1,600	0.001	*
Eastbound	RT	0.00	9	0	0.000	
	TH	2.00	807	3,200	0.255	
	LT	1.00	62	1,600	0.039	*

ICU ANALYSIS		
N-S(1):	0.148	
N-S(2):	0.152	*
E-W(1):	0.295	
E-W(2):	0.401	*
V/C:	0.553	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.603	
LOS:	B	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 3) KANAN DUME RD & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	SBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	642	1,600	0.194 *	N-S(1):	0.118
	TH	0.00	0	0	0.000	N-S(2):	0.194 *
	LT	2.00	340	2,880	0.118	E-W(1):	0.406
Westbound	RT	1.00	216	1,600	0.135	E-W(2):	0.676 *
	TH	2.00	1,497	3,200	0.468 *		
	LT	0.00	0	0	0.000	V/C:	0.870
Northbound	RT	0.00	0	0	0.000	Lost Time:	0.050
	TH	0.00	0	0	0.000	ITS:	0.000
	LT	0.00	0	0	0.000 *		
Eastbound	RT	0.00	0	0	0.000	ICU:	0.920
	TH	2.00	1,300	3,200	0.406		
	LT	1.00	332	1,600	0.208 *	LOS:	E

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 4) ZUMIREZ RD & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	8	0	0.000	
	TH	1.00	1	1,600	0.020	*
	LT	0.00	23	1,600	0.014	
Westbound	RT	0.00	28	0	0.000	
	TH	2.00	1,603	3,200	0.510	*
	LT	1.00	63	1,600	0.039	
Northbound	RT	1.00	73	1,600	0.026	
	TH	1.00	0	1,600	0.024	
	LT	0.00	38	1,600	0.024	*
Eastbound	RT	1.00	45	1,600	0.016	
	TH	2.00	1,508	3,200	0.471	
	LT	1.00	10	1,600	0.006	*

ICU ANALYSIS		
N-S(1):	0.040	
N-S(2):	0.044	*
E-W(1):	0.510	
E-W(2):	0.516	*
V/C:	0.560	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.610	
LOS:	B	

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 5) MALIBU CYN RD & CIVIC CTR WAY
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	Y
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:	NBR, SBR, EBR, WBR		

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	31	1,600	0.000	N-S(1):	0.307 *
	TH	2.00	870	3,200	0.272	N-S(2):	0.292
	LT	1.00	313	1,600	0.196 *	E-W(1):	0.041 *
Westbound	RT	1.00	251	1,600	0.000	E-W(2):	0.000
	TH	1.00	31	1,600	0.019		
	LT	1.00	30	1,600	0.019 *	V/C:	0.348
Northbound	RT	1.00	110	1,600	0.000	Lost Time:	0.050
	TH	2.00	356	3,200	0.111 *	ITS:	0.000
	LT	1.00	32	1,600	0.020		
Eastbound	RT	1.00	28	1,600	0.000	ICU:	0.398
	TH	1.00	35	1,600	0.022 *		
	LT	1.00	32	1,600	0.020	LOS:	A

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 6) MALIBU CYN RD & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	493	1,600	0.267 *	N-S(1):	0.305 *
	TH	0.18	31	291	0.107	N-S(2):	0.000
	LT	1.82	310	2,618	0.118	E-W(1):	0.545
Westbound	RT	1.00	211	1,600	0.013	E-W(2):	0.609 *
	TH	2.00	1,682	3,200	0.526 *		
	LT	1.00	47	1,600	0.029	V/C:	0.914
Northbound	RT	0.00	60	1,600	0.038 *	Lost Time:	0.050
	TH	2.00	17	1,600	0.028	ITS:	0.000
	LT	0.00	28	1,600	0.018		
Eastbound	RT	0.00	44	0	0.000	ICU:	0.964
	TH	2.00	1,607	3,200	0.516		
	LT	2.00	239	2,880	0.083 *	LOS:	E

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 7) WEBB WY & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :	WBR		
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	179	1,600	0.037	N-S(1):	0.188 *
	TH	0.79	115	1,265	0.091	N-S(2):	0.000
	LT	1.21	176	1,742	0.101 *	E-W(1):	0.504
Westbound	RT	1.00	125	1,600	0.000	E-W(2):	0.654 *
	TH	2.00	1,613	3,200	0.504 *		
	LT	1.00	276	1,600	0.173	V/C:	0.842
Northbound	RT	0.00	33	0	0.000	Lost Time:	0.050
	TH	1.00	81	1,600	0.071	ITS:	0.000
	LT	1.00	139	1,600	0.087 *		
Eastbound	RT	1.00	71	1,600	0.001	ICU:	0.892
	TH	3.00	1,587	4,800	0.331		
	LT	1.00	240	1,600	0.150 *	LOS:	D

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 8) CROSS CREEK RD & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

Thru Lane:	1600 vph	N-S Split Phase :	Y
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	ICU ANALYSIS	
Southbound	RT	1.00	140	1,600	0.032	N-S(1):	0.170 *
	TH	0.04	8	61	0.132	N-S(2):	0.000
	LT	1.96	414	2,825	0.147 *	E-W(1):	0.565
Westbound	RT	0.00	411	0	0.000	E-W(2):	0.844 *
	TH	2.00	1,931	3,200	0.732 *		
	LT	1.00	26	1,600	0.016	V/C:	1.014
Northbound	RT	1.00	50	1,600	0.023 *	Lost Time:	0.050
	TH	1.00	7	1,600	0.015	ITS:	0.000
	LT	0.00	17	1,600	0.011		
Eastbound	RT	0.00	36	0	0.000	ICU:	1.064
	TH	2.00	1,721	3,200	0.549		
	LT	1.00	179	1,600	0.112 *	LOS:	F

* - Denotes critical movement

Project Title: MALIBU HOUSING ELEMENT (SM11-2458)
Intersection: 9) LAS FLORES CYN RD & PCH
Description: FUTURE YEAR (2030) + PROJECT CONDITIONS

Date/Time: SAT MID-DAY PEAK HOUR

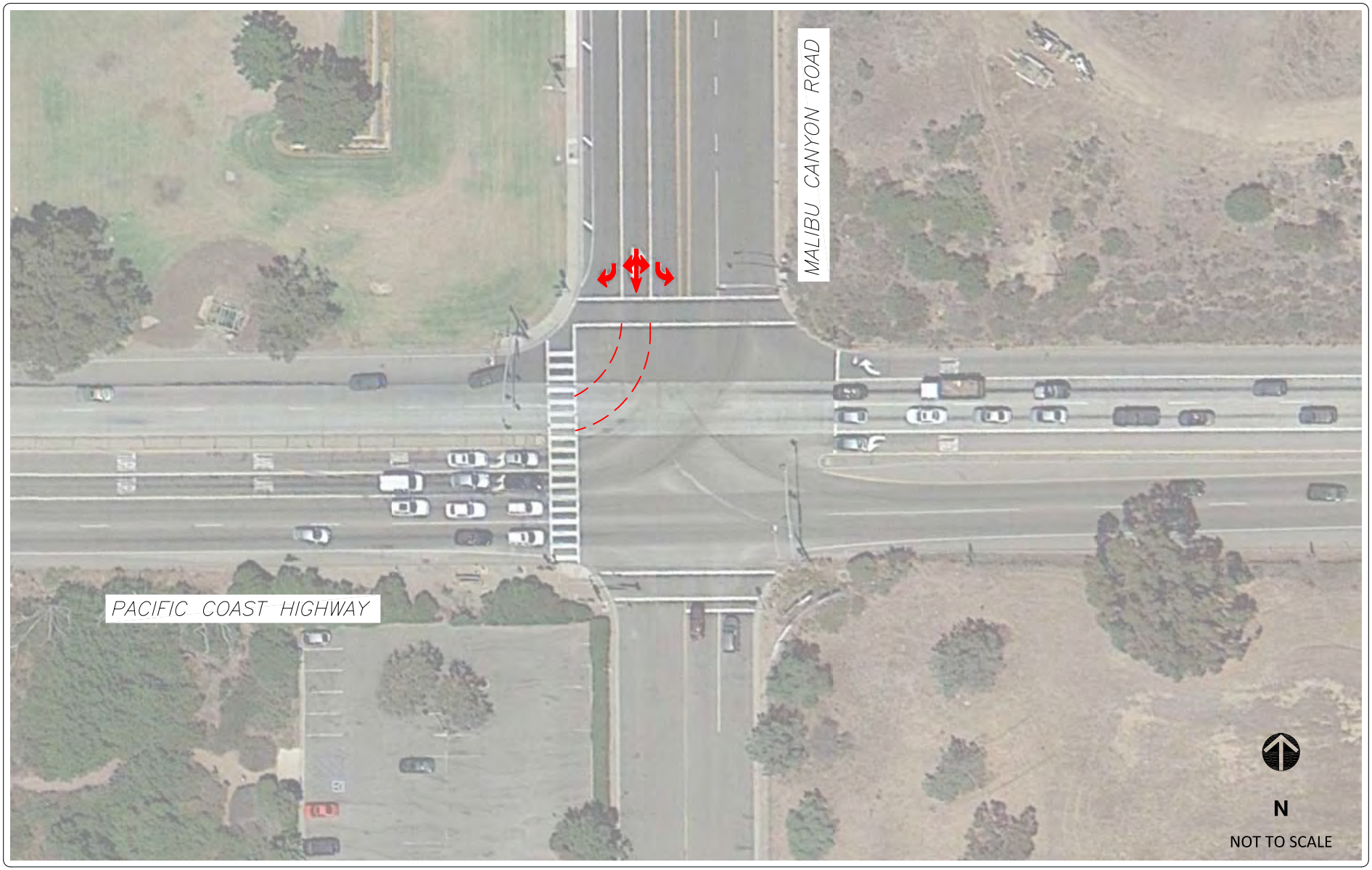
Thru Lane:	1600 vph	N-S Split Phase :	N
Left Lane:	1600 vph	E-W Split Phase :	N
Double Lt Penalty:	10 %	Lost Time (% of cycle) :	5
ITS:	0 %	V/C Round Off (decs.) :	3
OLA Movements :			
FF Movements:			

APPROACH	MVMT	LANES	VOLUME	CAPACITY	V/C	
Southbound	RT	0.00	56	0	0.000	
	TH	1.00	2	1,600	0.059	*
	LT	0.00	37	1,600	0.023	
Westbound	RT	1.00	41	1,600	0.014	
	TH	2.00	2,153	3,200	0.673	*
	LT	1.00	48	1,600	0.030	
Northbound	RT	0.00	19	0	0.000	
	TH	1.00	1	1,600	0.023	
	LT	0.00	17	1,600	0.011	*
Eastbound	RT	0.00	48	0	0.000	
	TH	2.00	1,797	3,200	0.577	
	LT	1.00	41	1,600	0.026	*

ICU ANALYSIS		
N-S(1):	0.046	
N-S(2):	0.070	*
E-W(1):	0.607	
E-W(2):	0.699	*
V/C:	0.769	
Lost Time:	0.050	
ITS:	0.000	
ICU:	0.819	
LOS:	D	

* - Denotes critical movement

APPENDIX E
MITIGATION MEASURES



FEHR & PEERS

POTENTIAL MITIGATION MEASURE
PACIFIC COAST HIGHWAY AND MALIBU CANYON ROAD

FIGURE 1

Jan 31, 2013 ANK
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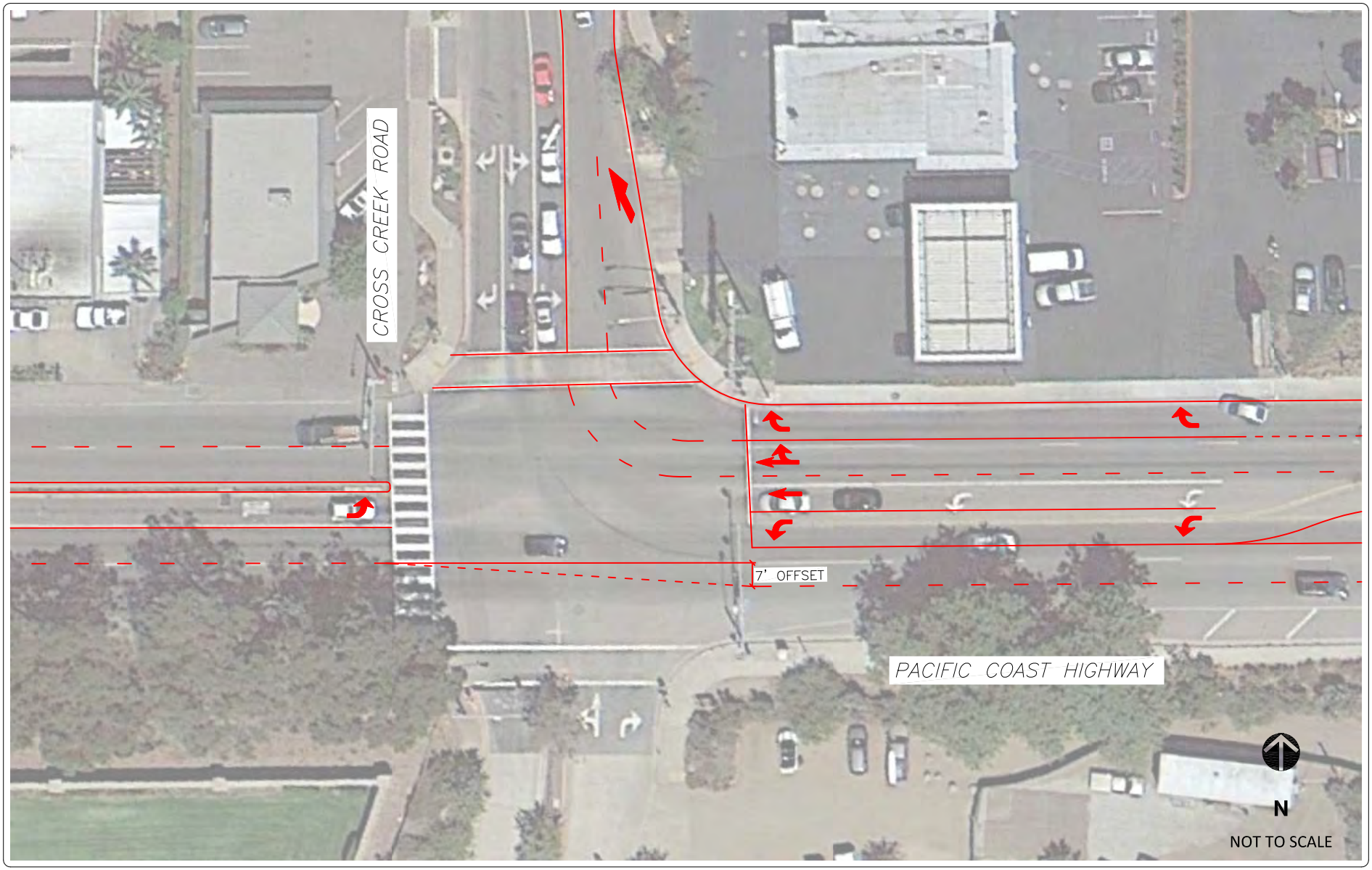

FEHR & PEERS

POTENTIAL MITIGATION MEASURE
PACIFIC COAST HIGHWAY AND CROSS CREEK ROAD

FIGURE 2

Jan 31, 2013 ANK
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