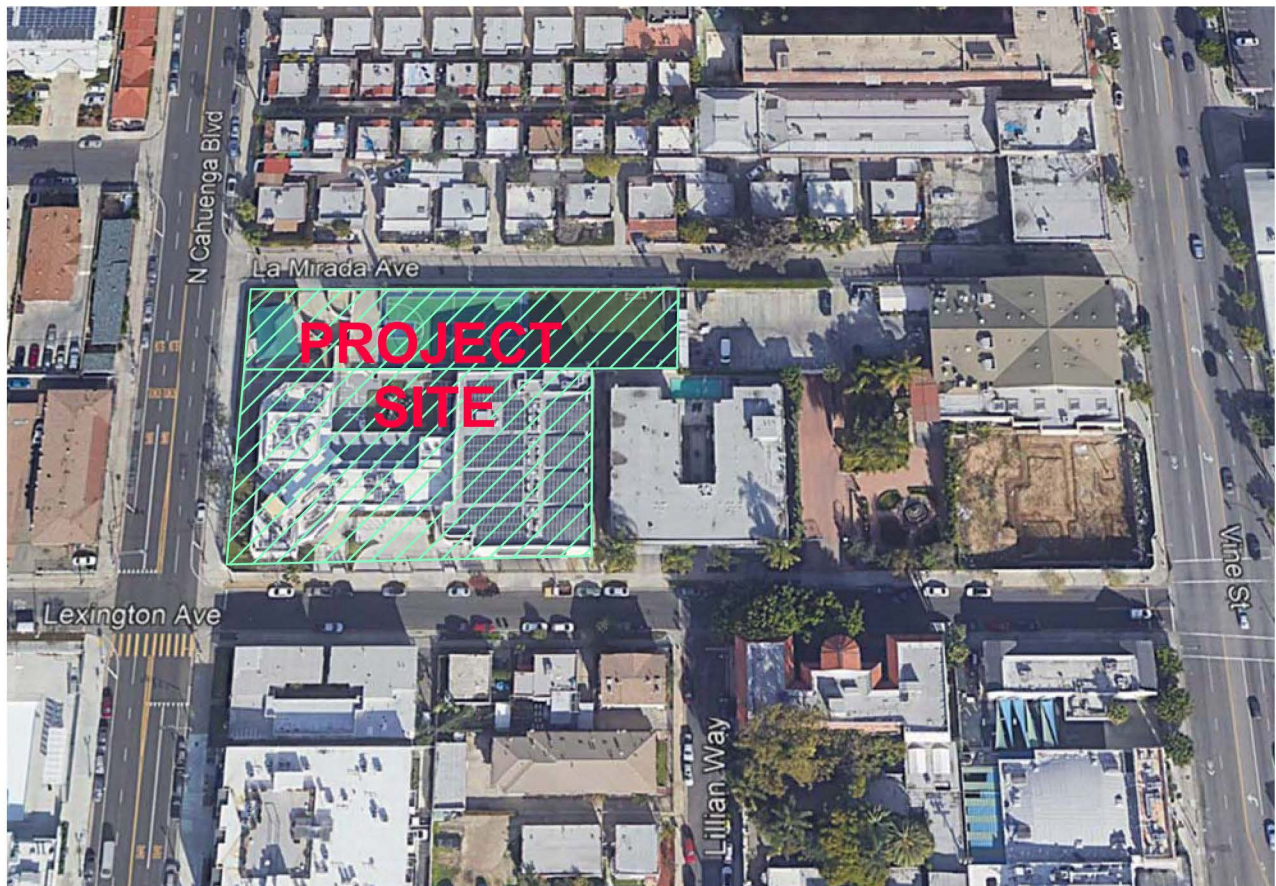


TRAFFIC ASSESSMENT FOR 1200 CAHUENGA

Located at
1200-1210 N. Cahuenga Bl.,
6337-6357 W. Lexington Av., &
6332-6356 W. La Mirada Av.

in the Hollywood Community Plan Area
of the City of Los Angeles



Prepared by:
Overland Traffic Consultants, Inc.
952 Manhattan Beach Bl, #100
Manhattan Beach, California 90266
(310) 545-1235

TRANSPORTATION ASSESSMENT
1200 CAHUENGA

Located at 1200-1210 N. Cahuenga Bl., 6337-6357 W. Lexington Av.,
6332-6356 W. La Mirada Av.
in the Hollywood Community Plan Area
of the City of Los Angeles

Prepared by:

Overland Traffic Consultants, Inc.
952 Manhattan Beach Bl., Suite 100
Manhattan Beach, California 90266
(310) 545-1235

December 2021

(Corrected 8-4-2022)



EXECUTIVE SUMMARY

Introduction

Overland Traffic Consultants has prepared this assessment of the potential California Environmental Quality Act (CEQA) transportation impacts and potential Non-CEQA deficiencies for a proposed creative office project located at 1200-1210 North Cahuenga Boulevard, 6337-6357 West Lexington Avenue and 6332-6356 West La Mirada Avenue (Project), in the Hollywood Community Plan Area. See the aerial view for the Project's location on the following page.

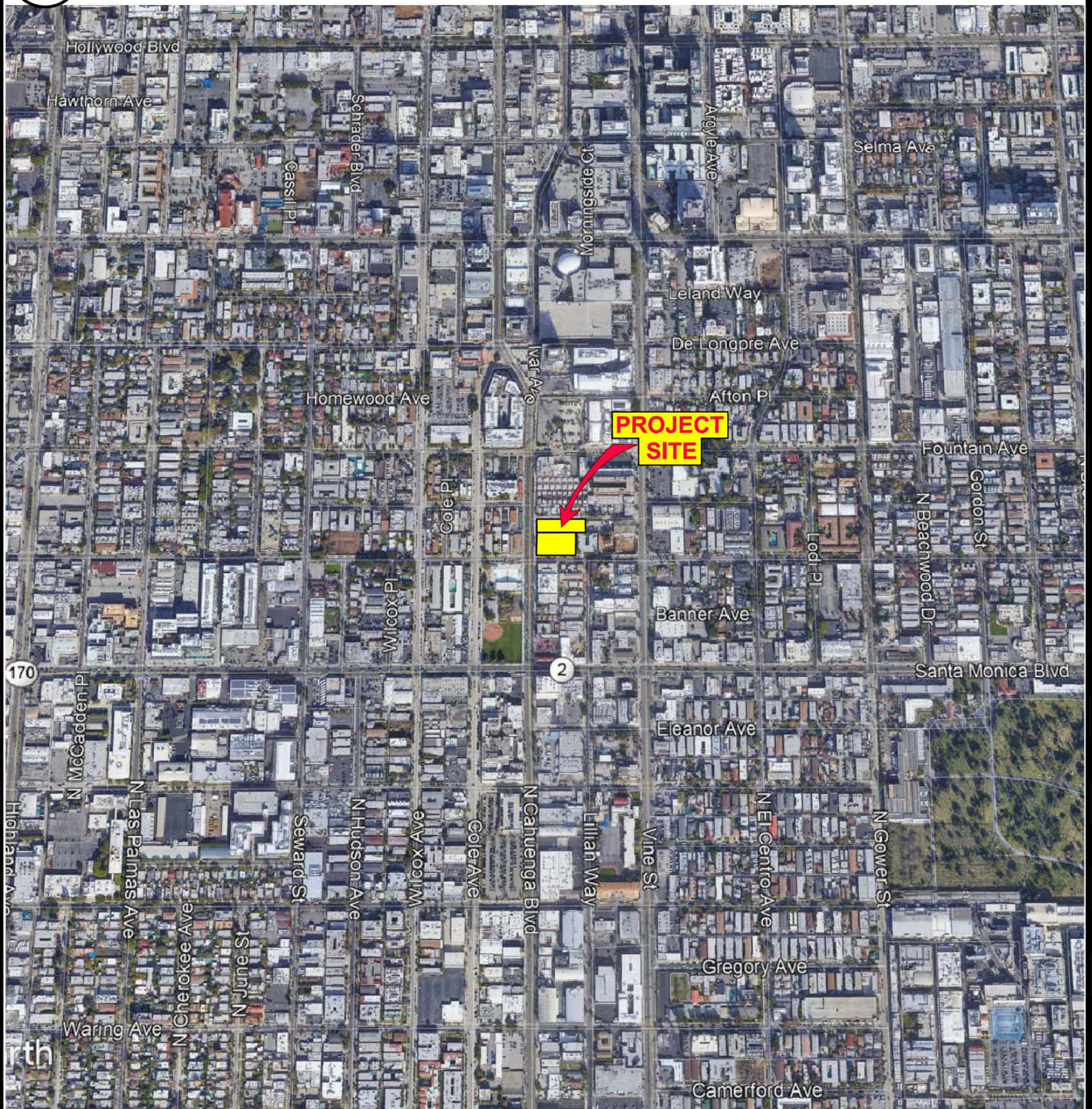
Project Description

The proposed Project is located on the northeast corner of North Cahuenga Boulevard and West Lexington Avenue. The Project would replace and refurbish an existing vacant private school complex (previously with 200 students) to provide three buildings (building A, B and C) with a total 74,762 square feet of creative office and 500 square feet of ground floor retail uses, for a total of 75,262 square feet. As such, the Project would demolish the vacant private school's free-standing subterranean parking lot and access ramp, topped with a recreation field and basketball court, and two playgrounds. The Project would also demolish 8,941 square feet of an existing approximately 28,389 square foot, two-story school building, but would preserve and upgrade with a few exterior modifications the remaining approximately 19,448 square feet of the building and its subterranean parking garage to be a creative office building (Building B). Building A would be a new four-story creative office building of approximately 35,000 square feet located along the northern border of the Project Site with one level of at-grade parking and one level of subterranean parking. Building C is proposed as a new four-story building located at the southwest corner of the Project Site with approximately 20,814 square feet of creative office and the accessory retail. The retail component of the Project would be provided primarily for the use of the office employees and their guests. Building C would include at-grade parking on its first level, along with the retail use and creative office use.



Project Parking and Access

The Project proposes a total of 156 vehicle parking spaces. There would be 55 vehicle parking spaces at grade level and 101 parking spaces in the below-grade level. The Project would provide 2-level cantilevered vehicle parking lifts on the below-grade parking level under Building A. Vehicular access to the Project Site would be provided via a two-way entry/exit driveway on La Mirada Avenue, the existing two-way entry/exit driveway on Lexington Avenue and an at-grade on-site drop off area to serve both rideshare arrivals/departures in the surface parking lot on Lexington Avenue. The Project is required, and would provide, a minimum of 22 bicycle parking spaces (8 short term and 14 long term). In addition, 4 showers and 14 lockers would be provided.



12/2021

PROJECT SETTING



Overland Traffic Consultants, Inc.

952 Manhattan Beach Bl, #100, Manhattan Beach, CA 90266
(310) 545-1235 phone, liz@overlandtraffic.com

Transportation Assessment CEQA and NON – CEQA Review

On July 30, 2019, the City of Los Angeles adopted vehicle miles traveled (VMT) as its criterion for determining transportation impacts under the California Environmental Quality Act (CEQA). These changes are mandated by requirements of the State of California Senate Bill 743 (SB 743) and the State’s CEQA Guidelines.

The new CEQA guidelines for evaluating transportation impacts no longer focus on measuring automobile delay and level of service (LOS). Instead, SB 743 directed lead agencies to revise transportation assessment guidelines to include a transportation performance metric that promotes: the reduction of greenhouse gas emissions, the development of multimodal networks, and access to diverse land uses.

The July 2020 Los Angeles Department of Transportation (LADOT) Traffic Assessment Guidelines (TAG) is the City document providing guidance for conducting both CEQA and non-CEQA transportation analyses for land development projects. The TAG identifies three CEQA thresholds for identifying significant transportation impacts that are applicable to the Project.

- Threshold T-1: Conflicting with Plans, Programs, Ordinances, or Policies
- Threshold T-2.1: Causing Substantial Vehicle Miles Traveled (VMT)
- Threshold T-3: Substantially Increasing Hazards Due to a Geometric Design Feature or Incompatible Use

The City’s adopted process also requires additional non-CEQA analysis and review for land development projects. The purpose of this review is to evaluate how projects affect vehicular access, circulation, and safety for all users of the transportation system. A Memorandum of Understanding (MOU) was prepared and approved by LADOT establishing the traffic assessment parameters for the study. A copy of the MOU is provided in Appendix A.

Transportation Demand Management (TDM) Program

The Project includes bike parking and shower amenities as a part of the Project's design features. The proposed Project with inclusion of these Project Design Features creates no significant Work VMT impacts. These strategies, as described by LADOT'S TAG, are listed below:

PROJECT DESIGN FEATURES

- BICYCLE INFRASTRUCTURE – Include Bike Parking per Los Angeles Municipal Code (LAMC) - This strategy involves implementation of short and long-term bicycle parking to support safe and comfortable bicycle travel by providing parking facilities at destinations under existing LAMC regulations applicable to the Project. The Project is required to, and will provide, a minimum of 22 bicycle parking spaces.
- BICYCLE INFRASTRUCTURE – Include Bike Parking and Showers - This strategy involves implementation of additional end of trip bicycle facilities to support safe and comfortable bicycle travel by providing amenities at the Project. This Project will provide up to 4 showers along with 14 lockers.

The proposed Project, with inclusion of these Project Design Features, creates no significant Work VMT impacts. No CEQA mitigation is required for the Project.

Findings

Based on the following review discussed in Chapters 2 and 3, no significant CEQA impacts or significant circulation, access, and safety deficiencies (non-CEQA) were identified for the Project.

The Bureau of Engineering (BOE)/ Department of City Planning (DCP) Planning Case Referral Form (PCRF) details street classifications per the Mobility Plan 2035, current street dedications and widths and the street dedication and improvement requests of the Project. Pursuant to LAMC Section 12.37, the Project is seeking the following waiver to dedicate and improve the following along the Project frontages:

- La Mirada Avenue – 5-foot dedication and 3-foot widening;

- Lexington Avenue – variable dedication and 3-foot widening;
- Cahuenga Boulevard – 1-foot widening; and,
- Southeast Corner of Cahuenga Boulevard & La Mirada Avenue – Construction of 15-foot by 15-foot corner cut or 20-foot radius dedication.

However, the dedications and widening are not currently necessary to meet the City's mobility needs and would disrupt street frontages and potentially create hazardous situations. The Project requests to maintain the current dedications and roadways. The BOE PCRFR required widening and dedications are unlikely on neighboring properties and improvements would not extend the entire block. Discontinues improvements does not yield practical benefits to the City's mobility needs and may hinder movement with street frontages that are not uniform.

Potential conflicts with other proposed land development projects have been reviewed to assess cumulative impacts that may result from the proposed Project in combination with other development projects in the study area. No cumulative development project impacts have been identified that would preclude the City's ability to provide transportation mobility in the area.



TABLE OF CONTENTS

Chapter 1 - Project Description	1
Chapter 2 - CEQA Transportation Assessment	5
Project Initial Screening.....	5
Conflicts Evaluation with Plans, Programs, Ordinances, or Policies	8
Cumulative Consistency Check	12
Causing Substantial Vehicle Miles Traveled (VMT)	13
TDM Program	14
Cumulative VMT Consistency Check.....	15
Substantially Increasing Hazards Due to Geometric Design Feature or Incompatible Use	16
Chapter 3 – Non-CEQA Transportation Assessment	18
Environmental Setting	18
Land Use	18
Transportation Facilities.....	18
Transit Information.....	21
Complete Streets Mobility Networks	22
Project Traffic Generation	25
Pedestrian, Bicycle and Transit Access Assessment.....	27
Removal or Degradation of Facilities	27
Project Intensification of Use	27
High Injury Network	32
Project Access, Safety and Circulation Evaluation.....	32
Operational Evaluation	32
Analysis of Existing and Future Traffic Conditions	34
Safety Evaluation	54
Passenger Loading Evaluation	54
State Facility Evaluation.....	54
Construction Overview.....	56
Residential Street Cut-Through Analysis.....	58



Appendices

Appendix A – LADOT Approved MOU
Appendix B – Screening Criteria
Appendix C – Plans, Programs, Ordinances and Policies
Appendix D – VMT Report
Appendix E – Community Plan Land Use Map
Appendix F – Designation Map, Street Standards, & Aerial Views of Intersections
Appendix G – Transit Routes
Appendix H – Mobility Network, Walkability Index Maps, Bicycle Plan Maps,
Pedestrian Destination Map
Appendix I – Related Project Information
Appendix J – Traffic Volume Data, HCS Level of Service Worksheets, and Signal
Warrant Worksheets

LIST OF FIGURES

Figure 1	Project Location.....	3
Figure 2	Project Site Plan.....	4
Figure 3	Study Intersection Lane Configuration and Traffic Control	35
Figure 4	Project Distribution Percentages	36
Figure 5	Project Assignment Percentages and Project Only Trips	37
Figure 6	Existing (2021) AM & PM Traffic Volume	40
Figure 7	Existing + Project AM & PM Traffic Volume	41
Figure 8	Related Project Location Information	Appendix I
Figure 9	Related Project Volumes	Appendix I
Figure 10	Future (2024) Without Project AM & PM Traffic Volume	45
Figure 11	Future (2024) With Project AM & PM Traffic Volume	46



LIST OF TABLES

Table 1	Consistency Check with Plans, Programs, Ordinances or Policies	9
Table 2	Project Trip Generation Rates.....	26
Table 3	Estimated Project Traffic Generation	26
Table 4	a) Transit, b) Bike & c) Pedestrian Trip Rates & Trip Ends	28,30,31
Table 5	Intersection Level of Service Definitions.....	33
Table 6	Existing Traffic Conditions - Without and With Project	38
Table 7	Future Traffic Conditions - Without and With Project	43
Table 8	Summary Signal Warrant Analysis Results	51
Table 9	Future Driveway Conditions With Project.....	52
Table 10	Future Driveway Queues.....	53
Table 11	State Facility Off ramp Distribution & Trips.....	56



CHAPTER 1

PROJECT DESCRIPTION

The proposed Project is located on the northeast corner of North Cahuenga Boulevard and Lexington Avenue. There is Project frontage on North Cahuenga Boulevard to the west, La Mirada Avenue to the north, residential to the east and Lexington Avenue to the south. The location of the proposed Project is provided on Figure 1.

Currently, the Project site consists of 44,563 square feet of private school buildings and amenities for up to 200 students and an existing underground parking garage. The school was permanently closed on August 13, 2021. The proposed Project would provide three buildings with a total 74,762 square feet of creative office and 500 square feet of retail. A total of 156 parking spaces will be provided for the Project.

The proposed Project would replace and refurbish the existing vacant private school complex to provide three buildings (Building A, B and C) with a total 74,762 square feet of creative office and 500 square feet of ground floor retail uses, for a total of 75,262 square feet. Building A would be a new four-story creative office building of approximately 35,000 square feet located along the northern border of the Project Site, with one at-grade parking level and one subterranean parking level. The Project would demolish the school's free-standing subterranean parking lot and access ramp, topped with a recreation field and basketball court, and two playgrounds. The Project would also demolish 8,941 square feet of the existing approximately 28,389 square foot, two-story school building. The remaining approximately 19,448 square feet of the building would be preserved, along with its subterranean garage, and upgraded with a few exterior modifications to be a creative office building (Building B). Building C is proposed as a new four-story building located at the southwest corner of the Project Site with approximately 20,814 square feet of creative office and the accessory retail. The retail component of the Project would be provided primarily for the use of the office employees and their guests. The first level of Building C would include at-grade parking, the retail use and creative office use.

Project Vehicle Parking and Access

Vehicle Parking - Los Angeles Municipal Code (LAMC) Section 12.21A requires 151 vehicle parking spaces. It is permissible for up to 5 vehicle parking spaces to be replaced with bicycle parking at a ratio of four bicycle spaces per vehicle parking space for a total of 146 vehicle parking spaces. The Project proposes to provide 72 existing on-site parking spaces and 84 new parking spaces for a total of 156 vehicle parking spaces. The Project will provide 55 at-grade level parking spaces and 101 parking spaces located below-grade connected by internal vehicle ramps and access from Lexington Avenue. A 2-level cantilevered vehicle parking lift system will be provided in the below-grade parking under Building A. Thirty-six at-grade parking spaces will be accessed from a new driveway on La Mirada Avenue, 101 subterranean parking spaces will be accessed from an existing driveway on Lexington Avenue near the east end of the site, and 19 at-grade parking spaces will be accessed from a new driveway on Lexington Avenue between North Cahuenga Boulevard and the east Lexington driveway. Parking areas will be assigned so that circulation through the lots to find an open space will not be required.

Bike Parking - The Project is required to provide a total of 22 bicycle parking spaces (8 short term and 14 long term) with 1 long term per 5,000 square feet and 1 short term space per 10,000 square feet for the new creative office construction. The new retail requires 1 short and 1 long term bicycle parking space per 2,000 square feet with a minimum of 2 each. The Project will provide, at a minimum, 22 commercial bicycle parking spaces with 14 lockers and up to 4 showers provided.

Figure 2 illustrates the Project Site plan.

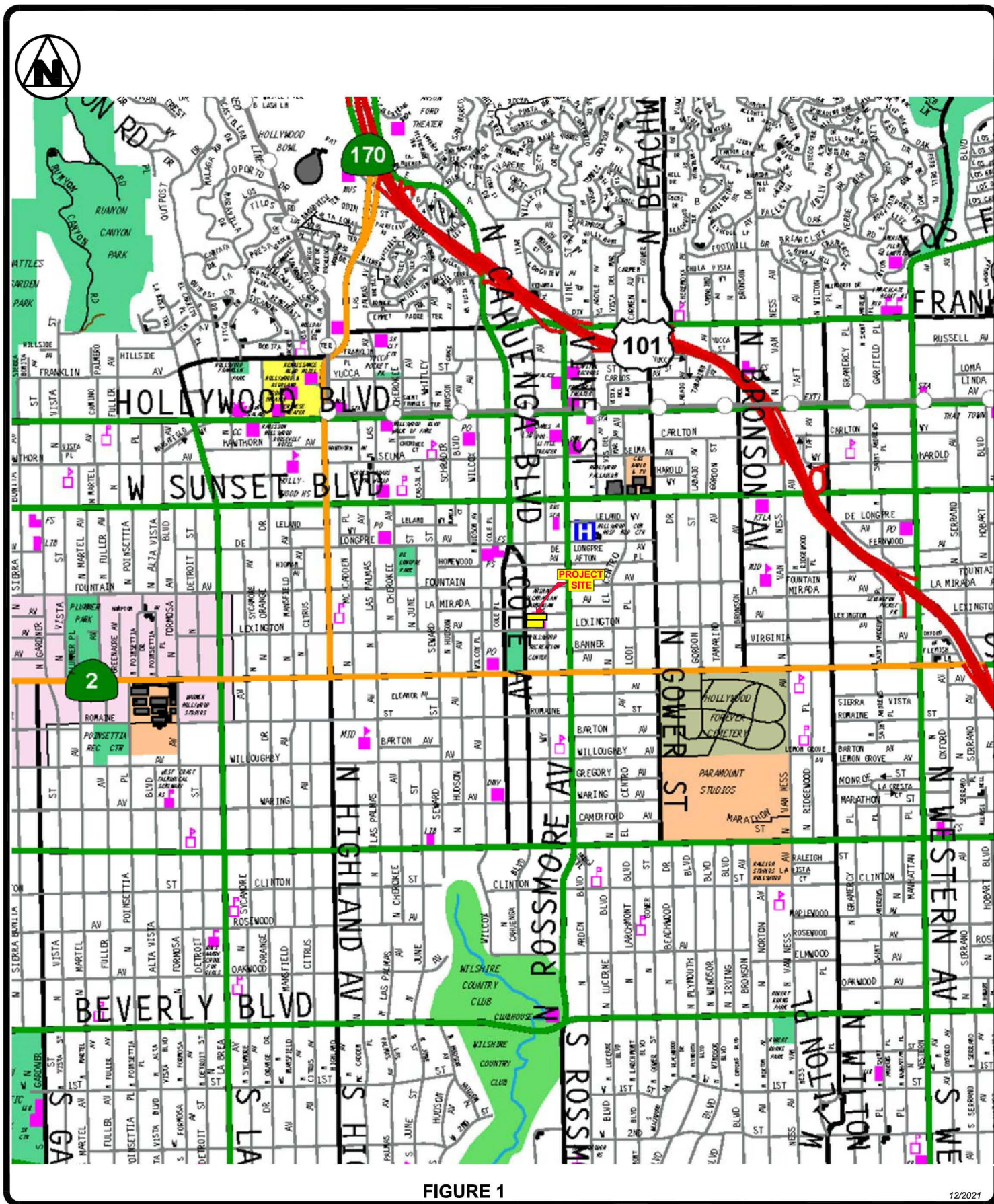


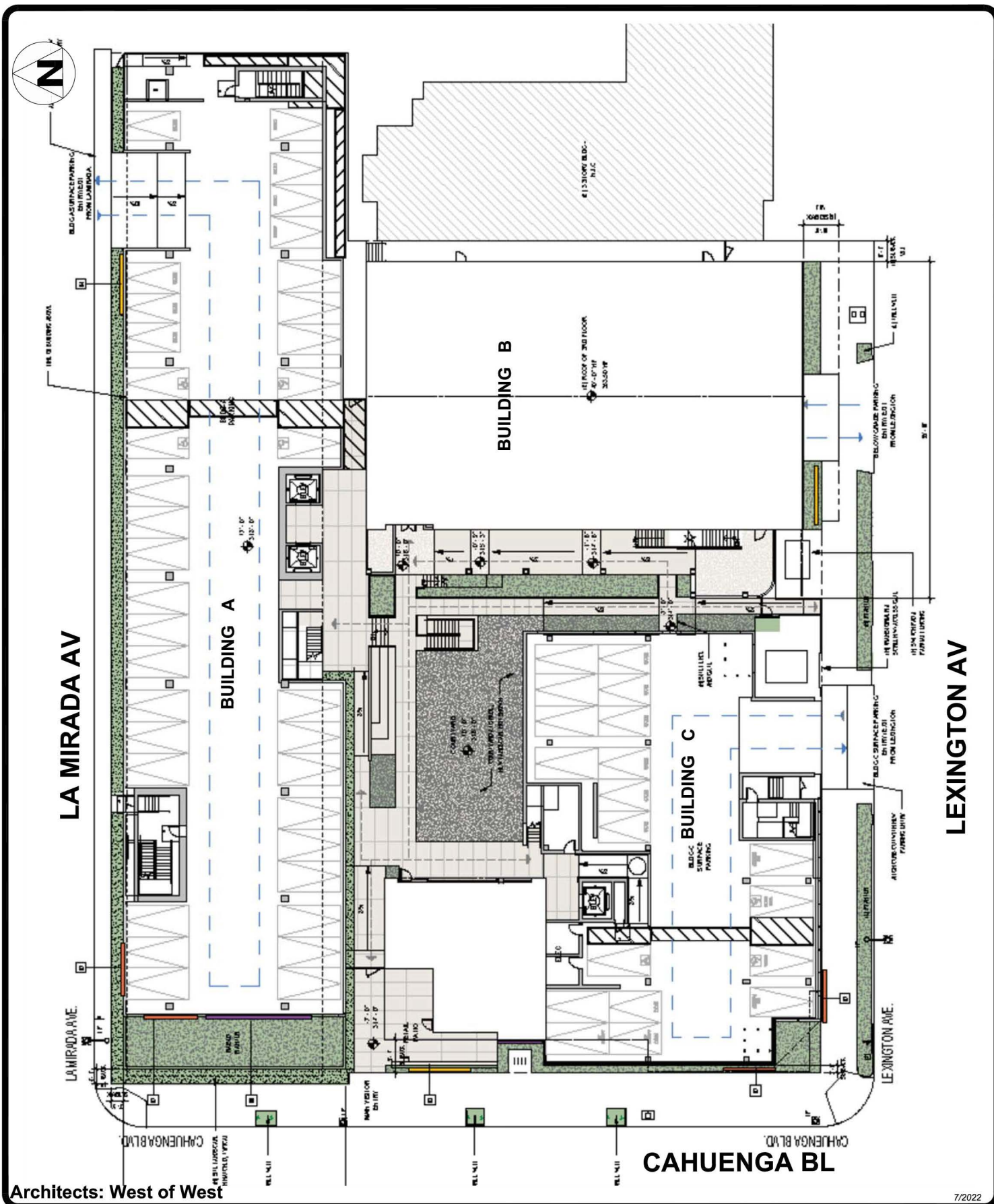
FIGURE 1

12/2021

PROJECT LOCATION

Overland Traffic Consultants, Inc.

952 Manhattan Beach Bl, #100, Manhattan Beach, CA 90266
(310) 545-1235 phone, liz@overlandtraffic.com



PROJECT PLOT PLAN

FIGURE 2

Overland Traffic Consultants, Inc.
 952 Manhattan Beach Bl, #100, Manhattan Beach, CA 90266
 (310) 545-1235 phone, liz@overlandtraffic.com

CHAPTER 2

CEQA TRANSPORTATION ASSESSMENT

The scope for this study was reviewed and approved by LADOT in accordance with the City CEQA requirements as contained in the LADOT TAG, adopted in July 2020. A copy of the LADOT approved MOU is provided in Appendix A.

The TAG is the City document that establishes procedures and methods for conducting CEQA transportation analyses for land development projects. The TAG identifies three CEQA thresholds for identifying significant transportation impacts.

- Threshold T-1: Conflicting with Plans, Programs, Ordinances, or Policies;
- Threshold T-2.1: Causing Substantial Vehicle Miles Traveled (VMT);
- Threshold T-3: Substantially Increasing Hazards Due to a Geometric Design Feature or Incompatible Use.

Project Initial VMT Screening

This is the first step in evaluating whether conditions exist that might indicate an environmental impact. A project is reviewed through a series of screening criteria to determine whether further CEQA analysis is required to address the threshold questions.

If the development project requires a discretionary action, and the answer is yes to any of the following threshold questions, further analysis is required to assess whether the proposed project would negatively affect the transportation system for all travel modes including pedestrian, bicycle, or transit facilities

1. Does the Project involve a discretionary action that would be under review by the Department of Planning?

Yes, the Project is requesting a General Plan Amendment and Zone Change approval.

2. Would the Project generate a net increase of 250 or more daily vehicle trips?

Yes, using the LADOT VMT calculator (version 1.3) for screening purposes, the Project

will generate an increase of 259 net daily vehicle trips with credits for removal of the existing 200 student private school and without any TDM strategies. TDM strategies are not considered in the screening criteria.

3. Is the Project proposing to, or required to, make any voluntary or required, modifications to the public right-of-way (i.e., street dedications, reconfigurations of curb lines, etc.)?

Yes, according to the BOE PCRF and Mobility Element, street standards La Mirada Avenue, which is designated as a local street, would require a 5-foot dedication and 3-foot widening along the northern boundary of the Project. Lexington Avenue, which is designated as a local street, would require a variable dedication and 3-foot widening along the eastern side of the property. Cahuenga Boulevard would require a 1-foot widening along the western boundary of the site. A 15-foot by 15-foot corner cut construction or 20-foot radius dedication on the southeast corner of Cahuenga Boulevard and La Mirada Avenue is required. A waiver under LAMC 12.37 from noted dedication and improvements will be requested.

4. Is the Project's frontage along a street classified as an Avenue, Boulevard or Collector (as designated in the City's General Plan) 250 linear feet or more, or is the Project's frontage encompassing an entire block along an Avenue or Boulevard (as designated in the City's General Plan)?

No, the frontage along North Cahuenga Boulevard, which is designated as an Avenue II, is approximately 202 feet in length.

5. Would the Project generate a net increase in daily VMT?

Yes, using the LADOT VMT calculator, the Project would generate 2,271 daily VMT after credits for the portion of the existing that will be removed. TDM strategies are not considered in the screening criteria. Appendix D contains the VMT reports.

6. Would the Project be located within a one-half mile of a fixed-rail or fixed-guideway transit station and replace an existing number of residential units with a smaller number of residential units?

No, the location of the Project is not within a half mile of a fixed-rail or fixed-guideway transit station. There are not any existing residential units existing or proposed.

7. Is the project proposing new driveways, or introducing new vehicle access to the property from the public right-of-way?

Yes, the Project is proposing two new driveways to the property from the public right-of-way. However, the Project will be reducing the overall number of driveways from five to three. Two existing driveways on La Mirada Avenue will be removed. A new driveway will be constructed to Building A parking. There are three existing driveways on Lexington Avenue. One driveway near the eastern boundary of the site with access to the subterranean parking at Building B will be retained. Two existing driveways on Lexington Avenue will be removed and one new driveway will be constructed at Building C.

8. Does the land use project include the construction of 50 dwelling units or guest rooms or combination thereof or 50,000 square feet of non-residential space?

Yes. The Project does not include any residential space but will provide the addition of 55,314 square feet of new commercial office and 500 square feet of retail along with the retention of 19,448 square feet of private school buildings renovated to creative office.

The TAG also provides screening criteria for consistency in accordance with CEQA Section 15064.3 subdivision (b)(2) on VMT impacts from Transportation Projects. The screening criteria for Transportation Projects is determined from the following question below.

Criteria for Transportation Projects - Would the Transportation Project include the addition of through traffic lanes on existing or new highways, including general purpose lanes, high-occupancy vehicle (HOV) lanes, peak period lanes, auxiliary lanes, and lanes through grade-separated interchanges (except managed lanes, transit lanes, and auxiliary lanes of less than one mile in length designed to improve roadway safety)?

Not Applicable - This analysis for Transportation Projects is not applicable to land

development projects and the Project is not a transportation project because the Project is a land development project. Therefore, the transportation project analysis is not part of the Project's CEQA review.

Based on the Project VMT Initial Screening Criteria on pages 5 through 7 for land development projects, further analysis is required to assess whether the Project would negatively affect the transportation system. Screening criteria presented in the TAG document specific to each area of analysis is contained in Appendix B.

I. Conflicts with Plans, Programs, Ordinances or Policies (Threshold T-1)

To guide the City's Mobility Plan 2035, the City adopted programs, plans, ordinances, and policies that establish the transportation planning framework for all travel modes, including vehicular, transit, bicycle, and pedestrian facilities. Land development projects shall be evaluated for conformance with these City adopted transportation plans, programs, and policies.

Per the TAG guidelines, a project would not be shown to result in an impact merely based on whether a project would not implement a program, policy, or plan. Rather, it is the intention of this threshold test to ensure that proposed development does not conflict with nor preclude the City from implementing adopted programs, plans, and policies.

The TAG provides a list of key City plans, policies, programs, and ordinances for consistency review, see Table 1. Projects that generally conform with and do not conflict with the City's development policies and standards addressing the circulation system, will generally be considered consistent.

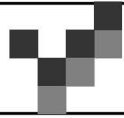
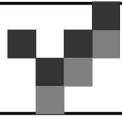


Table 1
Consistency Check with Key City Plans, Programs, Ordinances or Policies

TAG Table 2.1-1: City Documents that Establish the Regulatory Framework				
	Plan or Policy	Consistent?	Notes	Preclude City Implementation?
1.	LA Mobility Plan 2035	No	La Mirada Avenue is designated as a Local Street in the Mobility Plan 2035. Currently La Mirada Avenue is dedicated to 30 feet in width and is required to provide 60 feet. Lexington Avenue is designated as a Local Street and is currently dedicated to 50 and 55 feet in width along the Project frontage. A Local Street requires a 60-foot dedication. The western half of the property is dedicated to 30'-half street. A 15-foot by 15-foot corner cut or 20' radius dedication would be required at the southeast corner of North Cahuenga Boulevard and La Mirada Avenue. The Project proposes to seek a WDI for La Mirada Avenue – 5-foot dedication and 3-foot widening, Lexington Avenue – variable dedication and 3-foot widening, North Cahuenga Boulevard – 1-foot widening; and, southeast corner of North Cahuenga Boulevard & La Mirada Avenue – Construction of 15-foot by 15-foot corner cut or 20-foot radius.	Yes
2.	Plan for Healthy LA	Yes	The Project would support Policy 5.7, Land Use Planning for Public Health and Greenhouse Gas (GHG) Emission Reduction, by reducing single-occupant vehicle trips by its proximity to transit service and on-site amenities for the employees. The Project would not conflict with other policies in the Plan for Healthy LA.	No
3.	Land Use Element of the General Plan (35 Community Plans)	Yes	The Project is in the Hollywood Community Plan area. The Project would be in substantial conformance with the purposes, intent, and provisions of the General Plan and the Community Plan.	No
4.	Specific Plans	Not Applicable	The Project is not within a Specific Plan area.	No
5.	LAMC Section 12.21A.16 (Bicycle Parking)	Yes	The Project will, at a minimum, comply with the required of short- and long-term bicycle parking pursuant to LAMC Section 12.21. A.16.	No
6.	LAMC Section 12.26J (TDM Ordinance)	Yes	LAMC Section 12.26J for Transportation Demand Management and Trip Reduction Measures applies to the construction of new non-residential floor area greater than 25,000 sf. The Project will comply with this requirement.	No
7.	LAMC Section 12.37 (Waivers of Dedications and Improvement)	Yes	A waiver of dedication and improvements is requested for La Mirada Avenue, Lexington Avenue and North Cahuenga Boulevard with request to retain existing uniform street frontages, unlikely neighboring dedication and improvements and avoidance of creating hazards.	Yes



	Plan or Policy	Consistent?	Notes	Preclude City Implementation?
8.	Vision Zero Action Plan	Yes	The Project will reduce the number of vehicle driveways at the site. Instead of the three existing driveways on Lexington Avenue and two existing driveways on La Mirada Avenue, the Project will retain one existing and create one new driveway on Lexington Avenue. The two existing driveways on La Mirada Avenue will be removed and one new driveway on La Mirada Avenue will be created. The Project would not preclude or conflict with the implementation of future Vision Zero projects in the public right-of-way.	No
9.	Vision Zero Corridor Plan	Yes	The Project would not preclude or conflict with the implementation of future Vision Zero projects in the public right-of-way	No
10.	Citywide Design guidelines	Yes	Per Guideline 1-3 below.	No
	Guideline 1: Promote a safe, comfortable, and accessible pedestrian experience for all	Yes	The Project will create a continuous and straight sidewalk clear of obstructions for pedestrian travel. The Project will provide adequate sidewalk width and right-of-way that accommodates pedestrian flow and activity. Pedestrian access will be provided at street level with direct access to the surrounding neighborhood and amenities.	No
	Guideline 2: Carefully incorporate vehicular access such that it does not degrade the pedestrian experience.	Yes	The Project complies with the Citywide Design Guidelines incorporating vehicle access locations that do not discourage and/or inhibit the pedestrian experience. Vehicular access and parking are located on the local streets only. The Project vehicular access complies with driveway location standards. No vehicular access is provided on North Cahuenga Boulevard.	No
	Guideline 3: Design projects to actively engage with streets and public space and maintain human scale.	Yes	The building design uses attractive architectural elements. The Project would not preclude or conflict with the implementation of future streetscape projects in the public right-of-way.	No

As summarized above in Table 1, the Project would not conflict with most key City planning documents. The Bureau of Engineering (BOE)/ Department of City Planning (DCP Planning Case Referral Form (PCRF) details street classifications per the Mobility Plan 2035, current street dedications and widths and the street dedication and improvement requests of the Project. Pursuant to LAMC Section 12.37, the Project is seeking the following waiver to dedicate and improve the following along the Project frontages:

- La Mirada Avenue – 5-foot dedication and 3-foot widening;
- Lexington Avenue – variable dedication and 3-foot widening;
- North Cahuenga Boulevard – 1-foot widening; and,
- Southeast Corner of North Cahuenga Boulevard & La Mirada Avenue – Construction of 15-foot by 15-foot corner cut or 20-foot radius dedication.

The waiver is justified because the dedications and widening are not currently necessary to meet the City's mobility needs and would disrupt street frontages and potentially create hazardous situations. The Project requests to maintain the current dedications and roadways.

La Mirada Avenue is a short segment of Local Street between North Cahuenga Boulevard and Vine Street that is currently developed with residential homes. The proposed Office and small Commercial uses will not disrupt the traffic flow. La Mirada Avenue is not a primary east-west connector road such as Santa Monica Boulevard which is one block south of the Project Site. Further dedications would be required from the 11 single-family homes on the north side La Mirada Avenue with multiple ownerships with unlikely dedications and improvements. The current narrower roadway may discourage cut-through traffic.

Lexington Avenue is a Local Street located one block north of Santa Monica Boulevard with multiple zero-lot line buildings including a commercial building and hotel constructed in the 1920s. These buildings are located on the same block as the Project. These buildings would negate the ability to provide widening the entirety of the block.



North Cahuenga Boulevard is currently wider than required by the Mobility Plan 2035 and is a uniform roadway width serving the City needs. Widening it by one foot would result in significant disruption in traffic and may create unnecessary blind spots for turning vehicles and pedestrians, thereby creating hazardous situations.

The BOE PCRF-required widening and dedications are unlikely to be achieved on neighboring properties and the improvements would not extend the entire block. Discontinuous improvements do not yield practical benefits to the City's mobility needs and may hinder movement with street frontages that are not uniform. As the widening and dedication required along La Mirada Avenue, Lexington Avenue and North Cahuenga Boulevard are unnecessary, would disrupt uniform street frontages and potentially create hazardous situations, the requirement to construct the 15-foot by 15-foot corner cut or a 20-foot radius improvement would be unnecessary. Instead, the Project requests to maintain the current corner cut *on* the southeast corner of North Cahuenga Boulevard and La Mirada Avenue.

The TAG also provides a list of questions to guide the Project's consistency review. These questions and answers relative to the Project are provided in Appendix C. As demonstrated in Appendix C, with approval of the requested waiver, the potential impacts would be less than significant. Improvements along these connecting segments of La Mirada Avenue, Lexington Avenue and North Cahuenga Boulevard have not been made at this time and are not likely to be made in the near future.

Cumulative Consistency Check

Pursuant to the TAG, each of the plans, programs, ordinances, and policies to assess potential conflicts with proposed projects should be reviewed to assess cumulative impacts that may result from the Project in combination with other nearby development projects.

A cumulative impact could occur if the Project, with other future development projects located on the same block were to cumulatively preclude the City's ability to serve transportation user needs as defined by the City's transportation policy framework¹. The results of the Project's VMT calculation (as shown in Appendix D) would not exceed the City's APC VMT impact thresholds and as such, the Project's contribution to the cumulative VMT impact is adequate to demonstrate there is no cumulative VMT impact. No cumulative impact has been identified with this Project that would preclude the City's implementation of any transportation related policies, programs, or standards.

Therefore, the Project does not have a significant transportation impact under CEQA Threshold T-1 (Conflicting with Plans, Programs, Ordinances, or Policies).

II. Causing Substantial Vehicle Miles Traveled (Threshold T - 2.1)

The intent of this threshold question is to assess whether a land development project causes a substantial VMT impact. CEQA Guidelines Section 15064.3(b) relates to use of VMT as the methodology for analyzing transportation impacts.

To address this question, LADOT's TAG identified significant VMT impact thresholds for each of seven Area Planning Commission (APC) sub-areas in the City. A project's VMT is compared against the City's APC threshold goals for household VMT per capita and work VMT per employee to evaluate the significance of the project's VMT.

A development project will have a potential impact if the development project would generate VMT exceeding 15% below the existing average VMT for the Area Planning Commission (APC) area in which the project is located per TAG Table 2.2-1.

The Project is in the Central APC sub-area which limits daily household VMT per capita to a threshold value of above 6.0 and a daily work VMT per employee to a threshold value of above 7.6 (15% below the existing VMT for the Central APC).

² Framework includes LA Mobility Plan 2035, Plan for Healthy LA, Specific Plans, LAMC Section 12.21.a.16, LAMC Section 12.26J, Vision Zero Action Plan, Vision Zero Corridor Plans, Streetscape Plans, Citywide Design guidelines as noted in the LADOT July 2020 TAG page 2-3.

As a project design feature, the Project proposes to provide a sufficient number of bicycle parking spaces to meet City of Los Angeles bicycle parking requirements per LAMC Section 12.21.A.16 with 8 short term bicycle parking spaces, 14 long term bicycles spaces, and provide 4 showers and a total of 14 secure lockers.

Results of the Project's VMT calculation (as shown in Appendix D) provides an estimate based on the Project's land uses, size and TDM program strategies that are included as Project design features (i.e. bike parking per LAMC, showers and secure lockers). There is no Project household VMT per capita impact because no housing is proposed. The Project's work VMT per employee is estimated as 7.6.

Thus, the Project does not propose any housing and does not create a household VMT impact. The Project does not have a significant work VMT impact in the Central APC because the household VMT is 7.6 which is below the CEQA Threshold T-2.1 (Causing Substantial Vehicle Miles Traveled) of above 7.6. There are no remaining significant traffic impacts.

The Project's VMT analysis worksheets are provided in Appendix D.

TDM Program Project Design Features

Project Design Feature: The Project includes two TDM measures that reduce trips and VMT through TDM strategies and are included in the VMT analysis for the Project. These TDM project features, as described by LADOT'S TAG, are listed below:

BICYCLE INFRASTRUCTURE – Include Bike Parking per LAMC - This strategy involves implementation of short and long-term bicycle parking to support safe and comfortable bicycle travel by providing parking facilities at destinations under existing LAMC regulations applicable to the Project. The Project is required to, and will provide, a minimum of 22 bicycle parking spaces.

BICYCLE INFRASTRUCTURE – Include Bike Parking and Showers - This strategy involves implementation of additional end of trip bicycle facilities to support safe and comfortable bicycle travel by providing amenities at the Project. This Project will provide up to 4 showers and 14 secure lockers.

As stated in the City of Los Angeles VMT Calculator User Guide, November 2019

(Chapter 4, page 16), the effectiveness (reduction in Project VMT) of each TDM strategy/Project Design Feature included in the VMT Calculator is based primarily on research documented in the 2010 California Air Pollution Control Officers Association (CAPCOA) publication, Quantifying Greenhouse Gas Mitigation Measures (CAPCOA, 2010). No significant household or work impact is identified and no mitigation is required of the Project.

Summary:

- Household VMT per Capita Threshold is above 6.0
- There is NO residential component to the Project.
NO HOUSEHOLD VMT IMPACT

- Work VMT per Employee Threshold is above 7.6
- Work VMT per Employee is 7.6 with Project Features
- NO WORK VMT IMPACT

Cumulative VMT Consistency Check

Cumulative VMT impacts are evaluated through a consistency check with the Southern California Association of Governments' (SCAG) Regional Transportation Plan/Sustainable Communities Strategy (2016-2040 RTP/SCS) plan. The RTP/SCS is the regional plan that demonstrates compliance with air quality conformity requirements and greenhouse gas (GHG) reduction targets.

Per the City's TAG, projects that are consistent with the RTP/SCS plan in terms of development location and density are part of the regional solution for meeting air pollution and GHG goals. Projects that have less than a significant VMT impact are deemed to be consistent with the SCAG's 2016-2040 RTP/SCS and would have a less-than-significant cumulative impact on VMT.

As shown, the Project VMT impact would not exceed the City's Central APC VMT impact thresholds with mitigation and as such, the Project's contribution to the cumulative VMT impact is adequate to demonstrate there is no cumulative VMT impact.

III. Substantially Increasing Hazards Due to a Geometric Design Feature or Incompatible Use (Threshold T- 3.1)

Impacts regarding the potential increase of hazards due to a geometric design feature generally relate to the design of access points to and from the project site, and may include safety, operational, or capacity impacts. Impacts can be related to vehicle conflicts as well as to operational delays caused by vehicles slowing and/or queuing to access a project site.

No deficiencies are apparent in the site access plans which would be considered significant. This determination considers the following factors:

1. No vehicular access is proposed on North Cahuenga Boulevard, a designated Modified Avenue II roadway.
2. Vehicle access to the parking will be from the adjacent Local Streets of La Mirada Avenue and Lexington Avenue.
3. There is reduction in the number of driveways on to the city streets. Currently there are 2 driveways for the site on Lexington Avenue. One driveway will be removed, one driveway will remain and one new driveway will be constructed. The two existing driveways on La Mirada Avenue will be removed and one driveway will be constructed. By providing one less driveway, the Project will reduce the number of potential hazard points with pedestrians, cyclists and other vehicles.
4. The Project's local street access is consistent with LADOT driveway placement and location per LADOT Manual of Policies and Procedures, Section 321, Driveway Design.

A review of the Project Site plans does not present any hazardous geometric design features. Therefore, the Project does not have a significant transportation impact under CEQA Threshold T-3.1 (Substantially Increasing Hazards Due to a Geometric Design Feature).



Cumulative Access Evaluation

According to the TAG, an evaluation of site access plans for related projects with access points proposed along the same blocks as the proposed project must be reviewed for potential cumulative access impacts.

The proposed Project will have vehicle access from La Mirada Avenue and Lexington Avenue, both local streets. No other related projects were identified along the same block in the Project area. No cumulative impacts were identified.

CHAPTER 3

NON-CEQA TRANSPORTATION ASSESSMENT

In addition to conducting a CEQA review of development projects pursuant to SB743, LAMC Section 16.05 (Site Plan Review) authorizes a non-CEQA transportation analysis of development projects to identify deficiencies that may occur in the area due to the project. Additional authority is sited in other discretionary processes (e.g. conditional use permits) where the City is required to make findings to support approval of development projects. LADOT retains the ability to impose development conditions to improve operational safety and access around a project site and to better assess how proposed projects may affect the City's transportation system under the non-CEQA assessment.

Pursuant to the TAG, a delay-based analysis has been used to evaluate if the Project would contribute to potential circulation and access deficiencies that require specific operational improvements to the circulation system.

To assist in the non-CEQA evaluation, the following information provides the environmental conditions in which the Project is located.

ENVIRONMENTAL SETTING

Land Use

The Project site is in the Hollywood Community Plan area located approximately 5 miles northwest of downtown Los Angeles. The Community Plan area is located predominately north of Melrose Avenue west of the City of West Hollywood, south of Mulholland Drive, Barham Boulevard and Forest Lawn Drive and west of the Silver Lake-Echo Park – Elysian Valley and the Northeast Los Angeles Community Plan areas. The Project is located within a Transit Priority Area (TPA) and Enterprise Zone. Appendix E contains the Hollywood Community Plan land use map.

Transportation Facilities

The City of Los Angeles has adopted the Mobility Plan 2035 as an update to the City's General Plan Transportation Element to incorporate the complete streets principles for integrating multi-mode transportation networks. The Mobility Plan 2035 dictates the street



standards and designations for all users. Appendix F provides a map of the area roadway designations, roadway design standards and aerials of nearby signalized locations.

Pursuant to the City of Los Angeles Mobility Element, arterial roadways are designated as Boulevards and Avenues. Avenues may vary in their land use context, with some streets passing through both residential and commercial areas. The roadway standard for a Modified Avenue II is a right-of-way width of 80 feet and a roadway width of 56 feet. Non-arterial roadways connect arterial roadways to local residential neighborhoods or industrial areas. Non-arterial roadways are designated collector or local streets. The standard for a Local Street is a right-of-way width of 60 feet and a roadway width of 36 feet.

Regional access to Project area is provided by the Hollywood Freeway (US-101). The north-south Hollywood Freeway is located approximately 1.1 miles east of the Project. The Hollywood Freeway is accessible via Lexington Avenue with a southbound off ramp, a northbound on ramp on Western Avenue north of Lexington Avenue, and a southbound on ramp and northbound off ramp on Santa Monica Boulevard.

The Hollywood Freeway carries approximately 258,000 vehicles per day (VPD) with 15,300 vehicles per hour (VPH) at Santa Monica Boulevard. Freeway traffic volumes are provided by Caltrans in the 2017 Traffic Volumes Book. The Hollywood Freeway is typically congested during the morning and afternoon commute hours.

Major roadways in this area of Hollywood generally follow an overall grid pattern with some curves. Key east - west streets providing access to the immediate project area include Fountain Avenue and Lexington Avenue. Key north - south streets serving the study area include North Cahuenga Avenue and Vine Street.

Fountain Avenue is an east - west roadway designated a Collector Street in the Mobility Plan 2035. Fountain Avenue, in the Project study area, is identified as part of the City of Los Angeles Neighborhood Enhanced (NEN) from close Street West and from Gower Street East. It is identified as part of the Pedestrian Enhanced District (PED) between Gower Street and North Cahuenga Boulevard and west of Cole Street. In the



Project Study area, one traffic lanes in each direction is provided with yellow lane striping. Parking is generally provided on both sides of the street.

North Cahuenga Boulevard is a north – south roadway designated as a Modified Avenue II provides two lanes in each direction. Left turn movements are conducted from a shared through lane at Fountain Avenue, La Mirada Avenue and Lexington Avenue. There is a signalized pedestrian crossing signal at North Cahuenga Boulevard and Lexington Avenue with a yellow crosswalk on the south leg. Parking is generally permitted with 1 hour parking between 8AM to 6PM weekdays on the east and west side of North Cahuenga Boulevard and restrictions for no parking from 10 AM to 1 PM for street cleaning on Monday on the east side of the street and Tuesday on the west side of the Street. North Cahuenga Boulevard creates the western boundary of the Project site. Thirty Miles per Hour (MPH) speed limit signs are posted in the area.

Vine Street is a north - south roadway designated an Avenue II in the Mobility Plan 2035. Highland Avenue is identified as part of the City's High Injury Network (HIN) and Tier 2 Bicycle Lane Network. In the Project study area, two traffic lanes are provided in each direction. The southbound curb lane is identified as a shared bicycle/vehicle lane. South of Melrose Avenue, two traffic lanes and one bicycle lane in each direction are provided. Parking is generally permitted on the east and west side of the street. The roadway is posed with a 35 MPH speed limit sign.

La Mirada Avenue is an east - west roadway designated a Local Street in the Mobility Plan 2035. In the Project area, La Mirada Avenue is a discontinuous roadway and extends from Vine Street to North Cahuenga Boulevard with off-set intersections at both roadways. One lane in each direction is provided. No parking is permitted on La Mirada Avenue between Vine Street and North Cahuenga Boulevard. La Mirada Avenue creates the northern boundary of the Project site.

Lexington Avenue is an east - west roadway designated a Local Street in the Mobility Plan 2035. One lane in each direction if provided in the Project study area. The Lexington Avenue and Vine Street intersection is controlled with a full traffic signal. The Lexington Avenue and North Cahuenga Boulevard is controlled with stop signs on



Lexington and a pedestrian signal on North Cahuenga Boulevard. Lexington Avenue creates the southern boundary of the Project site.

Transit Information

The proposed Project is a creative office complex. Some public transportation opportunities are provided in the Project Site vicinity within walking distance.

Public transportation in the study area is provided by the Metropolitan Transportation Authority (Metro). There is a Metro B Line (previously Red Line) Hollywood/Vine Metro station located approximately 3,200 feet northeast of the site and the Hollywood/Highland Metro station located approximately 4,600 feet northwest of the site. These stations are accessible by walking, cycling or other transit services in the area. Metro B line provides service between North Hollywood, Universal City, Hollywood, Vermont area, Wilshire area, and downtown Los Angeles.

Metro and LADOT provides local and rapid bus lines through this area of Hollywood.

Metro local and rapid lines provide service along Santa Monica Boulevard in the Project area which include:

-Route 4 and Rapid 704 (with fewer stops along route) operates between Santa Monica, West Los Angeles, West Hollywood, Hollywood and downtown Los Angeles. There is a stop for Route 4 at Santa Monica Boulevard & Wilcox Avenue approximately 1,230 feet southwest of the site. There is a stop for Route 4 and Rapid 704 at Santa Monica Boulevard & Vine Street approximately 1,100 feet southeast of the site.

LADOT provides circuitous DASH service in the Project area along Fountain Avenue. The service includes:

DASH Hollywood provides circuitous service between the Project area along Fountain Avenue to Highland Avenue, north to the Highland/Hollywood D Line Station, northeast to Las Palms & Franklin Avenue, east to Whitley Street, south to Hollywood, east again to the Hollywood/Vine D Line Station, north back to Franklin Avenue east to



Vermont Avenue, south to Santa Monica Boulevard and then east along Santa Monica Boulevard, Fountain Avenue and Sunset Boulevard back to the Project area. There is a bus stop on the northeast and southwest corner of Fountain Avenue and North Cahuenga Boulevard approximately 420 feet from the site.

Transfer opportunities are available to/from this area of Hollywood from the local and regional lines. The transit and metro lines are illustrated in Appendix G.

Complete Streets Mobility Networks (Vehicle, Bicycle, Transit and Neighborhood)

The Mobility Plan Element establishes a layered network of street standards that are designed to emphasize mobility modes within the larger system. This approach maintains the primary function of the streets that exist but identifies streets for potential alternative transportation modes providing a range of options available when selecting the appropriate design elements. Street may be listed in several networks with the goal of selecting a variety of mobility enhancements.

Network layers have been created for the Complete Street Network that prioritizes a certain mode within each layer with the goal of providing better connectivity. The network layers are: Vehicle Enhanced Network, Transit Enhanced Network, Bicycle Enhanced Network and Neighborhood Enhanced Network. Definitions of these networks per the Complete Street Design Guidelines are provide below. Mobility Element maps, Walkability Index maps, bicycle plan maps, and pedestrian destination maps are included in Appendix H.

Vehicle Enhanced Network (VEN) - The VEN includes a select number of arterials that carry high volume of traffic for long distance travel on corridors with freeway access. Moderate enhancements typically include technology upgrades and peak-hour restrictions for parking and turning movements. Comprehensive enhancements can include improvements to access management, all-day lane conversions of parking, and all-day turning movement restrictions or permanent access control.

- The closest VEN to the Project is north of the site on Sunset Boulevard between Highland Avenue and the Hollywood Freeway.

Transit Enhanced Network (TEN) - The TEN is comprised of streets that prioritize travel for transit riders.

- Santa Monica Boulevard – located south of the Project, is identified as part of the TEN.

Bicycle Enhanced Network (BEN) – The BEN is comprised of a network of low – stressed protected bike lanes (Tier 1) and bike paths prioritize bicycle travel by providing specific bicycle facilities and improvements. The BEN proposes bike facilities on arterial roadways with a striped separation. Tier 1 corresponding to protected bicycle lanes, and Tier 2 and Tier 3 bicycle lanes on arterial roads with a striped separation that are differentiated only by their potential implementation phasing. The difference between Tier 2 and Tier 3 implies probability that some lanes are not expected to be implemented by 2035.

- Vine Street – located east of the Project, is identified as part of the BEN – Tier 2.
- Santa Monica Boulevard – located south of the Project is identified as part of the BEN – Tier 3.
- Sunset Boulevard – located north of the Project is identified as part of the BEN – Tier 3.

The City of Los Angeles adopted a 2010 Bicycle Master Plan to encourage alternative modes of transportation throughout the City of Los Angeles. The Master Plan was developed to provide a network system that is safe and efficient to use in coordination with the vehicle and pedestrian traffic on the City street systems. The Master Plan has mapped out the existing, funded, and potential future Bicycle Paths, Bicycle Lanes, and Bicycle Routes. Copies of the Bicycle Plan maps dated 2010 are provided in Appendix H for reference. A brief definition of the bicycle facilities is provided below:

Bicycle Path – A bicycle path is a facility that is separated from the vehicular traffic for the exclusive use of the cyclist (although sometimes combined with a pedestrian lane). The designated path can be completely separated from vehicular traffic or cross the vehicular traffic with right-of-way assigned through signals or stop signs.

- No bicycle paths are provided in the immediate area.

Bicycle Lane – A bicycle lane is typically provided on street with a designated lane striped on the street for the exclusive use of the cyclist. The bicycle lanes are occasionally curbside, outside the parking lane, or along a right turn lane at intersections.

Bicycle Route – A bicycle route is a designated route in a cycling system where the cyclist shares the lane with the vehicle. Cyclist would follow the route and share the right-of-way with the vehicle.

Neighborhood Enhanced Network (NEN) - NEN is comprised of local streets intended to benefit from pedestrian and bicycle related safety enhancements for more localized travel of slower means of travel while preserving the connectivity of local streets to other enhanced networks. These enhancements encourage lower vehicle speeds, providing added safety for pedestrians and bicyclists.

- Fountain Avenue, located north of the Project site, identified as part of the Tier 2 NEN.
- Cole Street, located west of the Project site, from Melrose Avenue northerly is identified as part of the Tier 2 NEN.
- Gower Street, located east of the Project site, is identified as part of the Tier 2 NEN

Pedestrian Enhanced District (PEDs) - In addition to these street networks, many arterial streets that could benefit from additional pedestrian features to provide better walking connections are identified as Pedestrian Enhanced Districts. The PED segments provided in the mobility map identify streets where pedestrian improvements on arterial streets could be prioritized to provide better walking connections to and from the major destinations within communities.

- Fountain Avenue between Gower Street and North Cahuenga Boulevard and west of Cole Avenue is identified as part of the PED.
- North Cahuenga Boulevard to Gower Street except between Fountain Avenue and La Mirada Avenue is identified as part of the PED.

- Cole Avenue from North Cahuenga Boulevard in the north to Fountain Avenue and then again from La Mirada Avenue to Romaine Street is identified as part of the PED.

The Complete Streets guide acknowledges that adding pedestrian design features and street trees encourages people to take trips on foot instead of by car. Thereby helping to reduce the volume of cars on the road and emissions, increases economic vitality, and make the City feel like a more vibrant place.

PROJECT TRAFFIC GENERATION

As part of the Non-CEQA assessment, an operational analysis of the peak hour traffic flow with the Project is required. This evaluation is based on peak hour traffic flow level of service (LOS) methodologies which determines vehicle delay using current traffic volume data, traffic signal and street characteristics.

Traffic generating characteristics of land uses have been studied by the Institute of Transportation Engineers (ITE). The results of these studies are published in ITE Trip Generation, 11th Edition Handbook. The Project is retaining 19,448 square feet of existing structures that were provided for a recently vacated 200 student private school. An additional 55,314 square feet new creative office (for a total of 74,762 square feet of creative office) and 500 square feet retail will be constructed. Creative office uses tend to differ from standard offices in that the employees keep non-traditional hours. However, the ITE Trip Generation Manual does not differentiate between types office so the general office rate was used to estimate the creative office trip generation. The small retail/restaurant shop will be established primarily for the use of office employees or their guests.

Traffic rates used in this analysis are presented in Table 2. Table 3 shows the Project's peak hour trip estimate. Note that the Project is within a Transit Priority Area (TPA) with services provided along Fountain Avenue (DASH) with service to the Metro D Line, Santa Monica Boulevard (Route 4 and 704) and Hollywood Boulevard (Metro D



Line). A 15% transit credit was incorporated for the Creative office and prior Private School.

Table 2
Project Trip Generation Rates

Description	ITE CODE	Daily Traffic	AM Peak Hour			PM Peak Hour		
			Total	In	Out	Total	In	Out
Private School	532	2.48	0.79	63%	37%	0.17	43%	57%
Office	710	10.84	1.52	88%	12%	1.44	17%	83%
Coffee/Donut Shop wo Drive Thru	936	626.85	93.08	51%	49%	32.29	50%	50%

General office rate used for Creative Office, no small Retail/Restaurant; used coffee/donut shop (no daily rate used 5XAM+PM)
 Rater per 1,000 sf for Office & Restaurant, per student for school

Table 3
Estimated Project Traffic Generation

ITE Code	Description	Size	Daily Traffic	AM Peak Hour			PM Peak Hour		
				Total	In	Out	Total	In	Out
710	Proposed Project								
	Creative Office	74,762 sf	810	114	100	14	108	19	89
	Transit Trips	15%	(122)	(17)	(15)	(2)	(16)	(3)	(13)
	Subtotal Creative Office		688	97	85	12	92	16	76
936	Small Retail/Restaurant*	500 sf	313	47	24	23	16	8	8
	Internal Trips	75%	(235)	(35)	(18)	(17)	(12)	(6)	(6)
	Subtotal Small Retail/Restaurant		78	12	6	6	4	2	2
Subtotal Proposed (Office + Retail)		75,262 sf	766	109	91	18	96	18	78
532	Existing to be removed								
	Private School	200 students	496	158	100	58	34	15	19
	Transit Trips	15%	(74)	(24)	(15)	(9)	(5)	(2)	(3)
Subtotal Existing			422	134	85	49	29	13	16
NET TRIPS (PROPOSED-EXISTING)			344	(25)	6	(31)	67	5	62

* Small Retail is for the primary use of the office employees/visitors, 75% internal conservatively estimated

Table 3 shows the Project traffic estimates using ITE traffic rates. It is estimated that the Project will generate an increase of 344 net daily trips with 25 fewer vehicle trips during the AM Peak Hour and 67 more trips during the PM Peak Hour on the nearby street network.

A primary factor affecting trip direction is the distribution of population and employment which would generate project trip origins and destinations. The estimated project directional trip distribution is also based on the study area roadway network, freeway access points, traffic flow patterns in and out of this area of Hollywood, driveway



locations and consistency with previously approved traffic studies for this area. The Project's vehicle trips are analyzed at the nearby intersections in the Project Access, Safety and Circulation Evaluation section of this report starting on page 31.

PEDESTRIAN, BICYCLE AND TRANSIT ACCESS ASSESSMENT

Purpose - The pedestrian, bicycle and transit assessments are intended to determine a project's potential effect on pedestrian, bicycle, and transit facilities in the vicinity of the Project site. Any deficiencies could be physical (through removal, modification, or degradation of facilities) or demand-based (by adding pedestrian or bicycle demand to inadequate facilities).

Removal or Degradation of Facilities

The Project will not remove, modify, or degrade any pedestrian, bicycle, and transit facility in the vicinity of the Project Site. In fact, any damaged or off-grade sidewalk, curb and gutter along the property frontage(s) will be repaired under Section 12.37 of the Los Angeles Municipal Code (LAMC).

Project Intensification of Use

Generally, projects that contribute to efficient land use patterns enabling higher levels of walking, cycling, and transit as well as lower than average trip length are considered to have a less than significant impact on transportation. These projects include, for example, projects in transit priority areas, projects consisting of residential infill or those located in low VMT areas.

The Project is located within a TPA with a bus stop for DASH Hollywood 420 feet north of the Project site. This local service provides a circuitous route in the Hollywood area and provides stops at the Metro D line. The Project's frontage on North Cahuenga Boulevard is designated as a Modified Avenue II roadway and is included in the Pedestrian Enhanced District. Vine Street, to the east of the site is identified as a Tier 2 Bicycle Network improvement and has an existing shared vehicle/bicycle lane along the west curb lane.

Transit Facilities -The number of additional transit users created by the Project were estimated based on the ITE Trip Generation Manual 10th Edition Supplement, February 2020 (ITE Supplement). This ITE Supplement provides estimated transit trip ends for some land uses including the proposed office. Restaurant land uses were not included and shopping center was used to replicate transit activity created by the retail/restaurant. Note that the retail/restaurant is proposed primarily for convenient use by the office employees and their guests. The ITE Supplement transit trip end rates have varying number of sample sizes and reliance. The Dense Multi-Use Urban rates per 1,000 square feet were used for this Project. This category provides a conservative estimate of transit trips. Table 4a, on the following page, provides the transit trip end rates and trips.

Table 4a
Transit Trip Rates and Trip Ends

Transit Trip Generation Rates

ITE Code	Description	AM Peak Hour Total	PM Peak Hour Total
710	Office	0.15	0.14
820	Shopping Center*	0.91	0.64

* No restaurant transit trip generation available, estimated using shopping center

Transit Trips

ITE Code	PROJECT TRANSIT TRIPS Description	Size	AM Peak Hour Total	PM Peak Hour Total
	<u>Proposed New Construction</u>			
710	Office	74,762 sf	11	10
820	Retail/Restaurant	500 sf	0	0
NEW Transit TRIPS TOTAL			11	10

As mentioned previously, the Project is served by local transit. Metro Route 4 along Santa Monica Boulevard and DASH Hollywood have bus stops within 1/4 mile of the Project site. These local lines provide transit to major destination points including



Santa Monica, West Los Angeles, West Hollywood, Hollywood and downtown Los Angeles the Metro D Line stations at Hollywood/Vine and at Hollywood/Highland. Transfer opportunities from the local lines provides regional access.

Based on the schedule provided on Metro.net and LADOT, the bus services in the area have a range of 6 to 8 minutes headways (service between buses) in both the AM and PM Peak Hours for Route 4 and 10 to 12 minutes for the DASH services. Therefore, there would be 8 to 10 buses in each direction along Route 4 and 5 to 6 buses for DASH Hollywood. These two services will provide 21 buses in a single hour (8 buses X 2 directions + 5 buses). Metro buses have 40 seats on a low floor bus and 43 seats for a traditional high-floor bus. Larger articulated busses provide 56-60 seats. DASH buses tend to be in the lower range with approximately 40 seats. Conservatively, this would equate to a total of 840 seats during the peak hour (21 buses X 40 seats). This does not include standing capacity. The Project could create a 1.31% increase in ridership during the AM and PM Peak Hour (11 riders/840 seats for the AM Peak Hour and 10 riders/840 seats for the PM Peak Hour). The projected level of new transit ridership shown in Table 4a, with 11 during the AM Peak Hour and 10 during the PM Peak Hour, is not expected to create a deficiency to the current transit services in the area.

Bike Facilities -No bike facilities are currently located along the Project frontage of North Cahuenga Boulevard. Project employees may make use of the cycling in the area along Vine Street and including the Project's cycling storage. Showers will be available for those who cycle and want to make use of these. The number of additional cyclists created by the Project were estimated based on the ITE Supplement. This ITE Supplement provides estimated bike trip ends for some land uses including the proposed office. Restaurant land uses were not included and shopping center was used to replicate the bicycle use generation. Note that the small retail/restaurant is proposed primarily for convenient use by the office employees and their guests. The ITE Supplement's bike trip end rates have been estimated using the Dense Multi-Use Urban rates per 1,000 square feet for the office and Retail/Restaurant. Table 4b provides the bicycle trip end rates and trips.



Table 4b
Bicycle Trip Rates and Trip Ends

Bike Trip Generation Rates

ITE Code	Description	AM Peak Hour Total	PM Peak Hour Total
710	Office	0.02	0.01
820	Shopping Center*	0.27	0.03

* Not restaurant bike trip generation available, estimated using shopping center

Bike Trips

ITE Code	PROJECT BIKE TRIPS Description	Size	AM Peak Hour Total	PM Peak Hour Total
	<u>Proposed New Construction</u>			
710	Office	74,762 sf	1	1
820	Retail/Restaurant	500 sf	0	0
NEW Bike TRIPS TOTAL			1	1

The projected level of cyclists shown above in Table 4b is not expected to create a deficiency to the current cycling services in the area.



Pedestrian - After construction of the Project, there will be additional pedestrians in the area created by the employees and guests of the Project. As with the transit and bike trips, the ITE Supplement Dense Multi-Use Urban rates per unit for the office and restaurant (using shopping center rate) were used to provide the estimated pedestrian trip end rates and trips. Table 4c on the following page provides the pedestrian trip end rates and trips.

Table 4c
Pedestrian Trip Rates and Trip Ends

Walk Trip Generation Rates

ITE Code	Description	Daily	AM Peak Hour Total	PM Peak Hour Total
710	Office	5X(AM+PM)	0.16	0.17
932	High Turnover Restaurant	5X(AM+PM)	0.45	0.45

Walk Trip Generation

ITE Code	PROJECT PEDESTRIAN TRIPS Description	Size	Daily	AM Peak Hour Total	PM Peak Hour Total
	<u>Proposed New Construction</u>				
710	Office	74,762 sf	105	12	13
932	Retail/Restaurant	500 sf	2	0	0
NEW Pedestrian TRIPS TOTAL			107	12	13

A map of the various pedestrian destinations and facilities within ¼ mile is provided in Appendix H.

Street frontage along Lexington Avenue, North Cahuenga Boulevard and La Mirada Avenue will be improved with new landscaping and repaired or improved sidewalks along the Project frontages. An existing pedestrian traffic signal at North Cahuenga Boulevard and Lexington Avenue is striped with continental (crosshatch) crosswalks along the north leg of the intersection. A full traffic signal is provided at Vine Street & Lexington Avenue and North Cahuenga Boulevard & Fountain Avenue provides continental crosswalks on all 4 legs of the intersections.

High Injury Network

Vision Zero Los Angeles identified a strategic plan to reduce traffic deaths to zero by focusing on engineering, enforcement, education, and evaluation. The priority identified in the report is safety with a goal to make the streets of the City of Los Angeles the safest in the nation. As part of an effort to achieve this goal, LADOT identified a High Injury Network (HIN) of city streets. The HIN identifies streets with a high number of traffic-related severe injuries and deaths across all modes of travel with emphasis on those involving pedestrians and cyclists.

Although North Cahuenga Boulevard is designated as part of the HIN north of Fountain Avenue to Sunset Boulevard, the segment of North Cahuenga Boulevard along the Project frontage is NOT included in the HIN, as shown on the HIN map in Appendix H. However continental crosswalks are currently provided at the pedestrian signal on North Cahuenga Boulevard and Lexington Avenue along south leg, on the traffic signal controlled intersection of North Cahuenga Boulevard and Fountain Avenue along all legs of the intersection and on the traffic signal controlled North Cahuenga Boulevard and Santa Monica Boulevard along all legs.

PROJECT ACCESS, SAFETY AND CIRCULATION EVALUATION

Purpose – Project access and circulation is evaluated for safety, operational, and capacity constraints using vehicle level of service to identify circulation and access deficiencies that may require specific operational improvements.

Operational Evaluation

Criteria - Per the TAG, the Transportation Assessment should include a quantitative evaluation of the project's expected access and circulation operations. Project access is considered constrained if the project's traffic would contribute to unacceptable queuing on at project driveway(s) or would cause or substantially extend queuing at nearby signalized intersections. Unacceptable or extended queuing may be defined as follows:

- Spill over from turn pockets into through lanes.
- Block cross streets or alleys.
- Contribute to “gridlock” congestion. For the purposes of this section, “gridlock” is defined as the condition where traffic queues between closely - spaced intersections and impedes the flow of traffic through upstream intersections.

Evaluation - The following traffic conditions evaluation has been prepared to identify any new circulation and access deficiencies that may require specific operational improvements. The circulation level of service evaluation has been prepared using the Highway Capacity Manual (HCM) methodology which calculates the amount of delay per vehicle based upon the intersection traffic volumes, lane configurations, and signal timing. Highway Capacity Software (HCS) was utilized to conduct the evaluation.

Once the vehicle delay value has been calculated, operating characteristics are assigned a level of service grade (A through F) to estimate the level of congestion and stability of the traffic flow. The term "Level of Service" (LOS) is used by traffic engineers to describe the quality of traffic flow. Definitions of the intersection LOS grades in terms of vehicle delay are shown in Table 5.

Table 5
Signalized Intersection Level of Service Definitions

<u>LOS</u>	<u>HCM (delay in seconds)</u>	<u>Operating Conditions</u>
A	Less than 10	No loaded cycles and few are even close. No approach phase is fully utilized with no delay.
B	>10 to 20	A stable flow of traffic.
C	>20 to 35	Stable operation continues. Loading is intermittent. Occasionally drivers may have to wait more on red signal and backups may develop behind turning vehicles.
D	>35-55	Approaching instability. Delays may be lengthy during short time periods within the peak hour. Vehicles may be required to wait through more than one signal cycle.
E	>55 to 80	At or near capacity with possible long queues for left-turning vehicles. Full utilization of every signal cycle is seldom attained.
F	> 80	Gridlock conditions with stoppages of long duration.

Analysis of Existing and Future Traffic Conditions

This Existing and Future Traffic analysis is for Non-CEQA evaluation to determine if there are potential access and circulation deficiencies. This analysis does not affect the CEQA VMT Impact analysis. Baseline historic traffic counts were obtained from LADOT. New traffic data cannot be collected during the COVID-19 shutdown, as directed by LADOT. The traffic counts for North Cahuenga Boulevard & Fountain Avenue, Vine Street & Fountain Avenue, and Vine Street & Lexington Avenue was conducted on May 16, 2018, and for North Cahuenga Boulevard and Lexington Avenue on October 26, 2017. These baseline traffic counts have been increased by 1 percent per year ambient growth to year 2021 to reflect existing conditions and does not change the CEQA analysis.

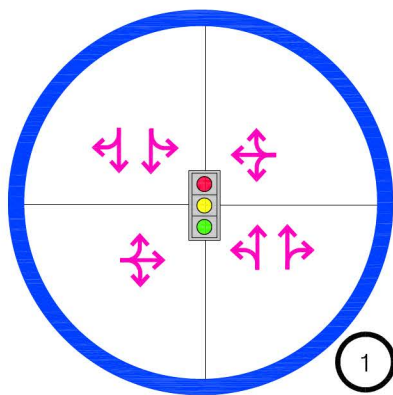
The intersections analyzed include:

1. North Cahuenga Boulevard and Fountain Avenue (traffic signal controlled);
2. North Cahuenga Boulevard and Lexington Avenue (pedestrian signal and stop sign controlled);
3. Fountain Avenue and Vine Street (traffic signal controlled); and
4. Lexington Avenue and Vine Street (traffic signal controlled).

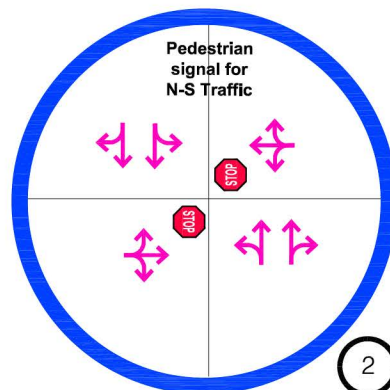
In addition, the West and East Driveways on Lexington Avenue and the Driveway on La Mirada Avenue were evaluated separately.

The lane configurations at the study intersections are provided in Figure 3. Regionally Project trips were distributed to the study area and are provided in Figure 4. The detailed distribution and Project trips at the study intersections and driveways is provided in Figure 5.

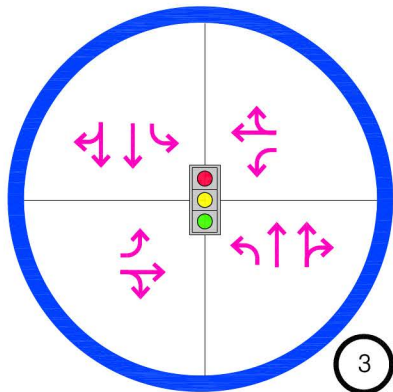
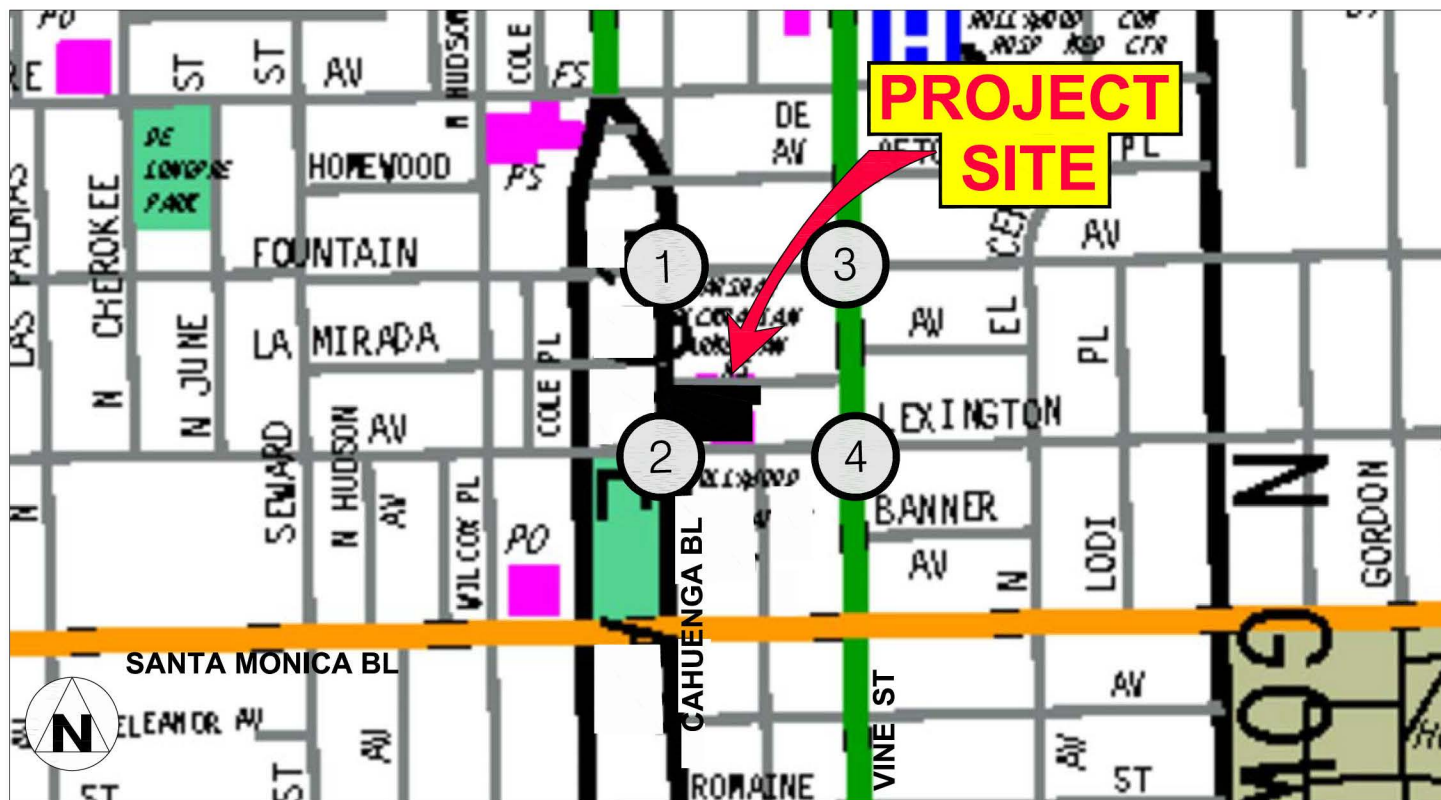
The LOS calculations summary, on the following pages, in Tables 6 and 7 shows the Project's traffic Existing and Future delay with and without the Project at the signalized intersections. Note that the pedestrian signal at North Cahuenga Boulevard and Lexington Avenue has been studied as a stop sign controlled intersection since side street traffic does not trigger the pedestrian signal. The driveways are evaluated separately.



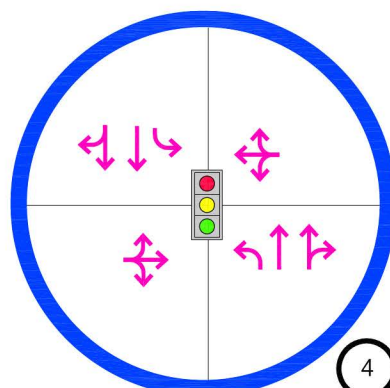
CAHUENGA BOULEVARD &
FOUNTAIN AVENUE



CAHUENGA BOULEVARD &
LEXINGTON AVENUE



FOUNTAIN AVENUE &
VINE STREET



LEXINGTON AVENUE &
VINE STREET

FIGURE 3

INTERSECTION CHARACTERISTICS

Overland Traffic Consultants, Inc.
952 Manhattan Beach Bl #100, Manhattan Beach Ca 90266
(310)545-1235, (661)799-8423, liz@overlandtraffic.com

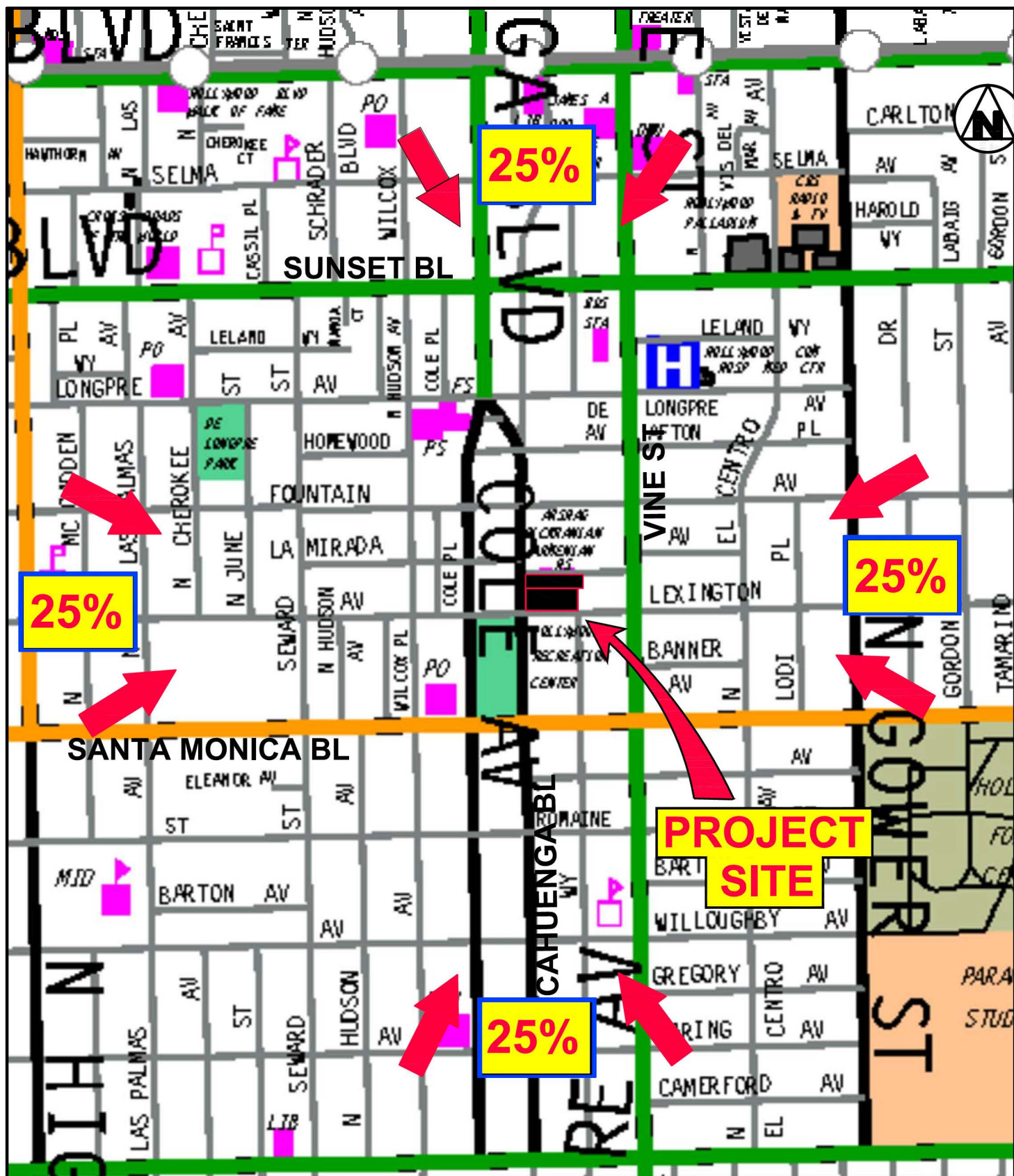


FIGURE 4

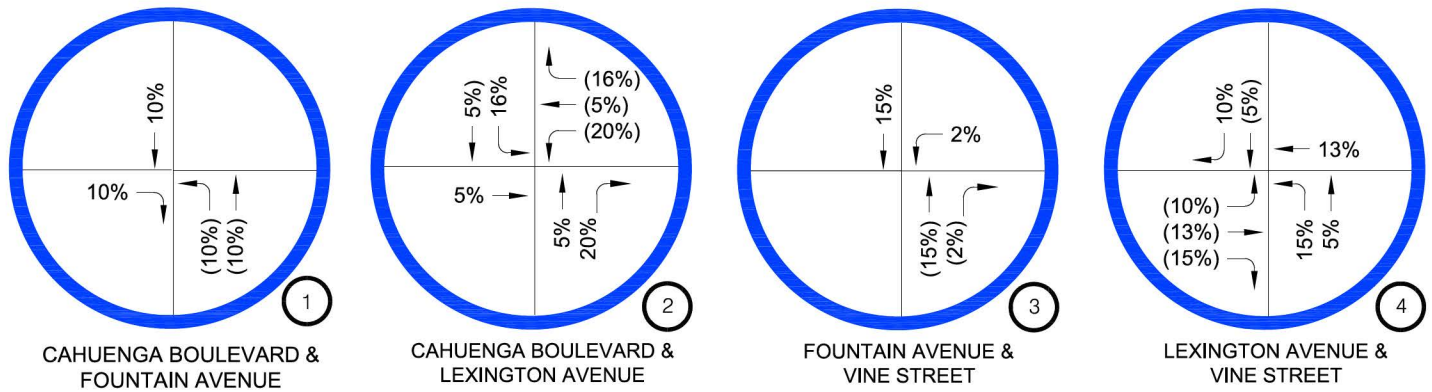
7/2021

OVERALL PROJECT TRIP DISTRIBUTION

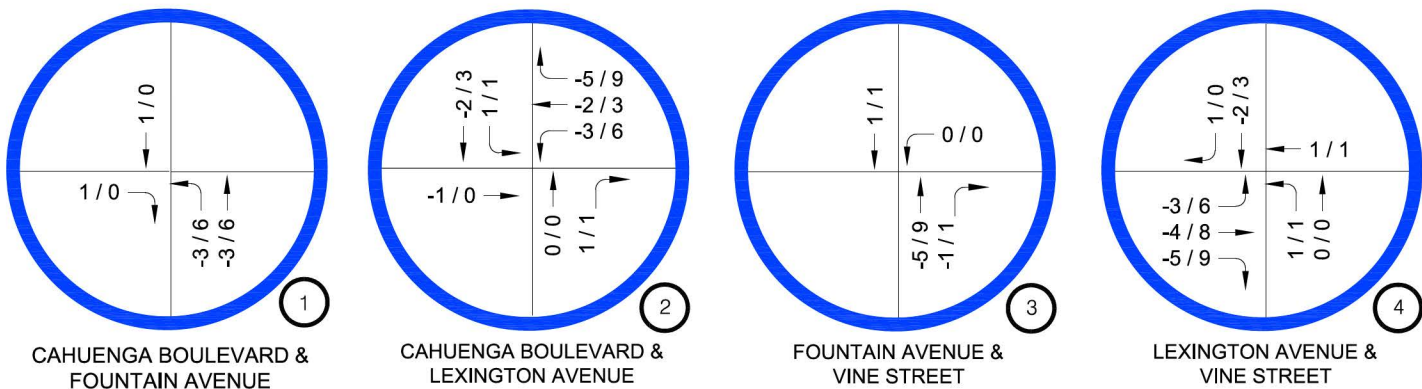
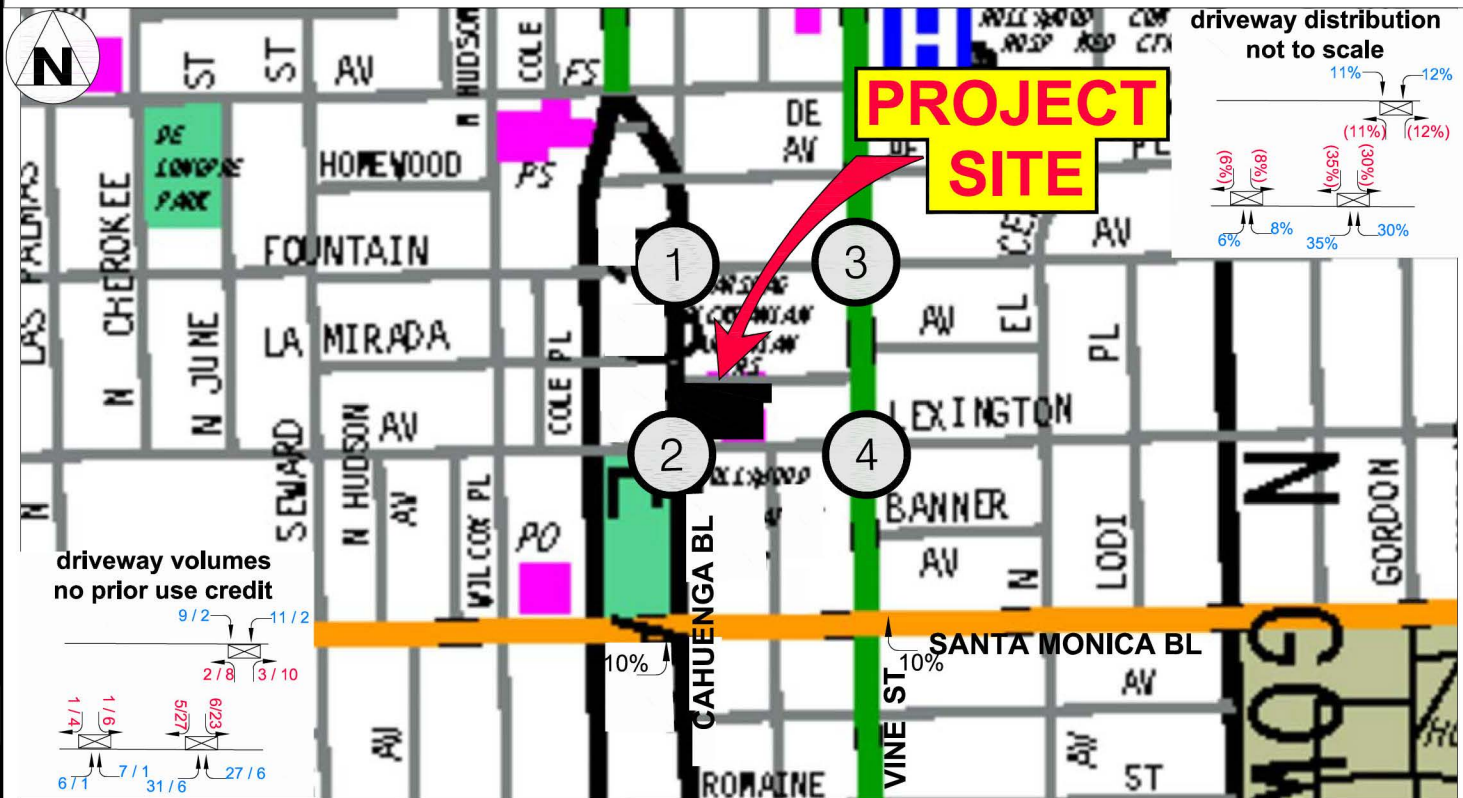


Overland Traffic Consultants, Inc.

952 Manhattan Beach Bl, #100, Manhattan Beach, CA 90266
(310) 545-1235, liz@overlandtraffic.com



PROJECT TRAFFIC ASSIGNMENT DISTRIBUTION IN / (OUT)



PROJECT VOLUMES AM PEAK HOUR/PM PEAK HOUR

FIGURE 5

PROJECT TRAFFIC ASSIGNMENT DISTRIBUTION & PROJECT VOLUMES

Overland Traffic Consultants, Inc.
 952 Manhattan Beach Bl #100, Manhattan Beach Ca 90266
 (310)545-1235, (661)799-8423, liz@overlandtraffic.com

Table 6 contains the results of the Existing (2021) and Existing + Project traffic conditions at the study intersections. In evaluation of the Existing conditions, the addition of Project traffic does not change the LOS at the nearby signalized locations. The pedestrian signal and stop sign controlled intersection of North Cahuenga Boulevard and Lexington Avenue is evaluated as a two way stop sign controlled intersection. The stop sign controlled intersections provide a delay in seconds and LOS for key moves.

Table 6
Existing Traffic Conditions – Without and With Project

No.	Intersection	Peak Hour	DIR	Existing 2021		Existing+ Project	
				Delay (s)	LOS	Delay (s)	LOS
1	N. Cahuenga Boulevard & Fountain Avenue	AM		16.1	B	16.2	B
		PM		17.1	B	17.2	B
2	N. Cahuenga Boulevard & Lexington Avenue	AM	NBL	10.8	B	10.8	B
			SBL	9.2	A	9.2	A
			WB	355.2	F	332.8	F
		PM	NBL	9.9	A	9.9	A
			SBL	8.8	A	8.8	A
			EB	1124.5	F	1329.5	F
3	Fountain Avenue & Vine Street	AM		15.9	B	15.9	B
		PM		20.7	C	20.8	B
4	Lexington Avenue & Vine Street	AM		5.6	A	5.5	A
		PM		7.7	A	8.2	A

DIR = DIRECTION - ONLY NEEDED FOR STOP SIGN CONTROLLED INTERSECTION

s = seconds

The AM Peak Hour delay in the Existing + Project delay is lower than the Existing Project delay in some of the analysis results due to the fewer vehicle trips exiting the site than was created by the prior 200 student private school.

A review of the HCS worksheets indicated no poor operating conditions at North Cahuenga Boulevard and Fountain Avenue, Fountain Avenue and Vine Street or

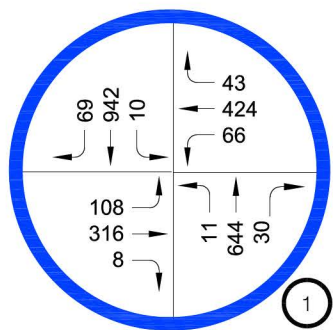


Lexington Avenue and Vine Street. However, the worksheets for North Cahuenga Boulevard and Lexington Avenue indicate the following:

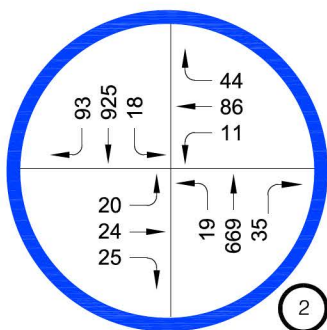
AM Peak Hour
Existing and Existing + Project
Westbound traffic on the minor street is operating at LOS F
PM Peak Hour
Existing and Existing + Project
Eastbound traffic on the minor street is operating at LOS F

The Project does not create this circulation deficiency at the intersection. A traffic signal warrant analysis has been conducted at North Cahuenga Boulevard and Lexington Avenue to determine if a full traffic signal is currently and with the Project warranted. This analysis is provided on pages 46-50 of the report.

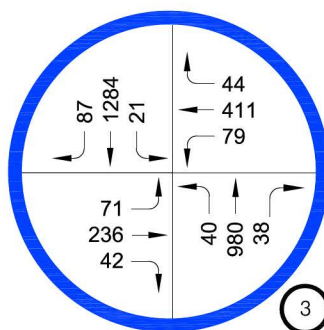
HCS worksheets are provided in Appendix J. Figure 6 displays the Existing Traffic Volumes and Figure 7 displays the Existing + Project Traffic Volumes.



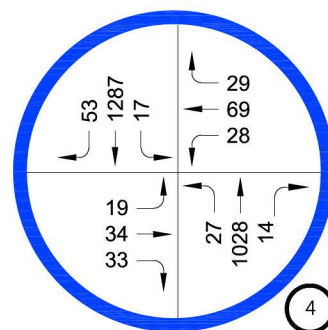
CAHUENGA BOULEVARD & FOUNTAIN AVENUE



CAHUENGA BOULEVARD & LEXINGTON AVENUE

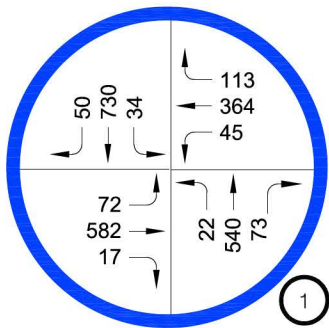
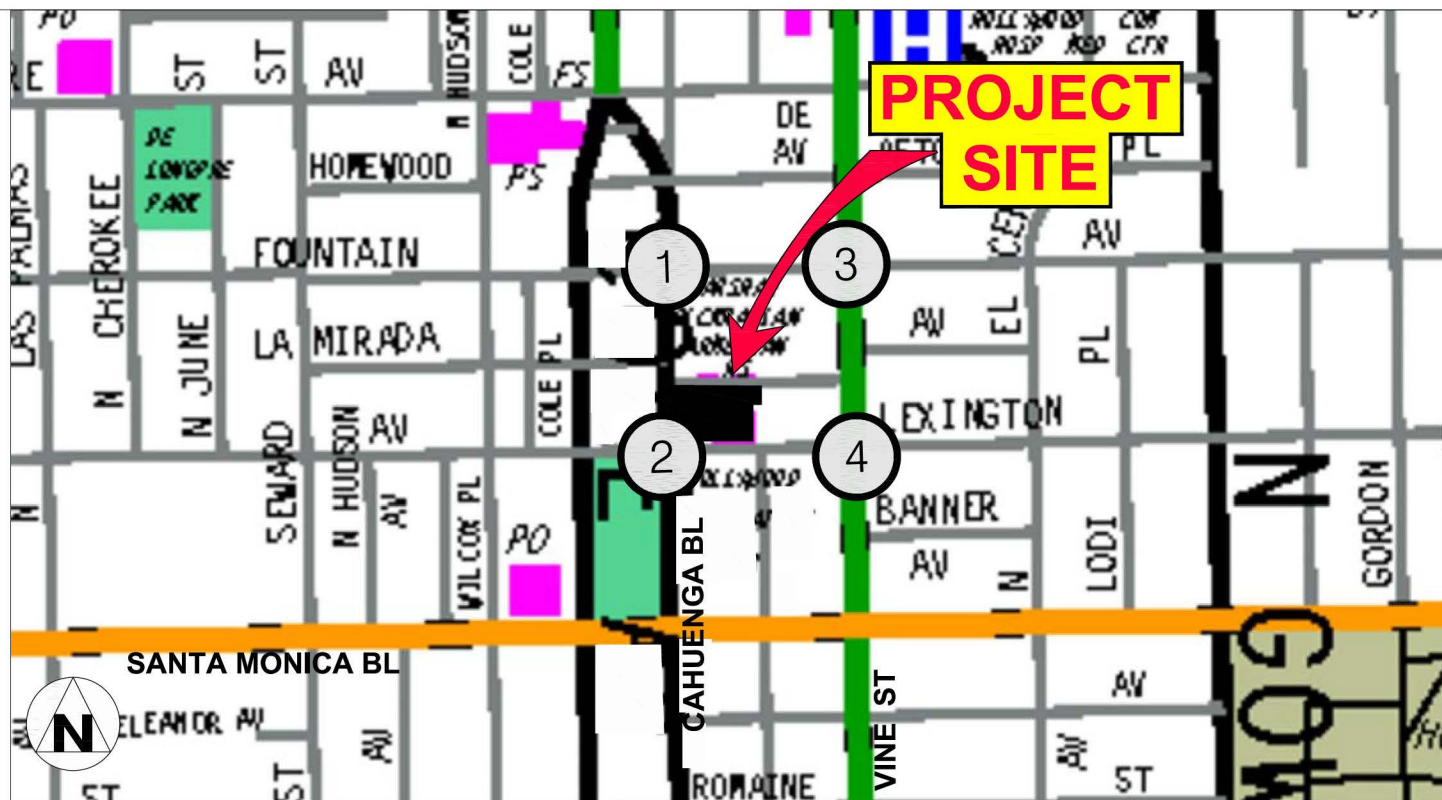


FOUNTAIN AVENUE & VINE STREET

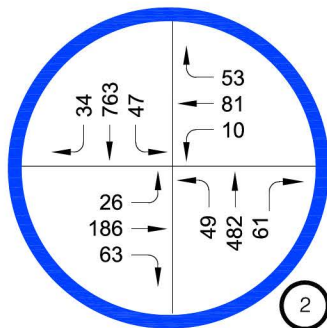


LEXINGTON AVENUE & VINE STREET

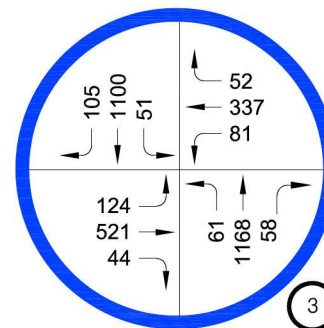
AM PEAK HOUR



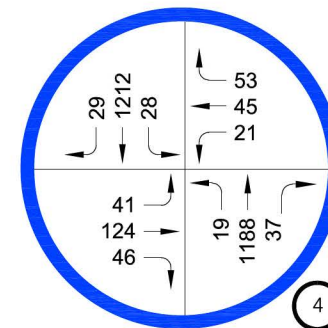
CAHUENGA BOULEVARD & FOUNTAIN AVENUE



CAHUENGA BOULEVARD & LEXINGTON AVENUE



FOUNTAIN AVENUE & VINE STREET



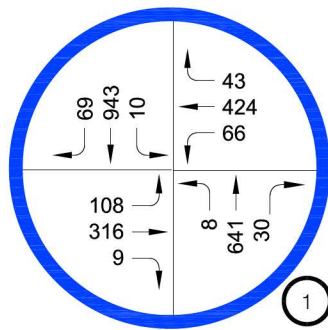
LEXINGTON AVENUE & VINE STREET

PM PEAK HOUR

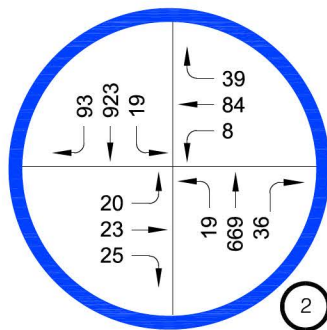
FIGURE 6

EXISTING (2021)
TRAFFIC VOLUMES

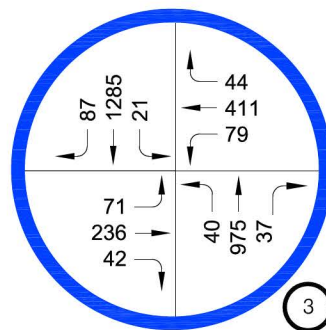
Overland Traffic Consultants, Inc.
952 Manhattan Beach Bl #100, Manhattan Beach Ca 90266
(310)545-1235, (661)799-8423, liz@overlandtraffic.com



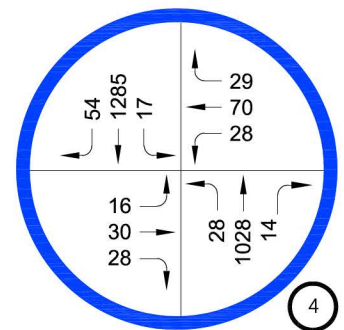
CAHUENGA BOULEVARD & FOUNTAIN AVENUE



CAHUENGA BOULEVARD & LEXINGTON AVENUE

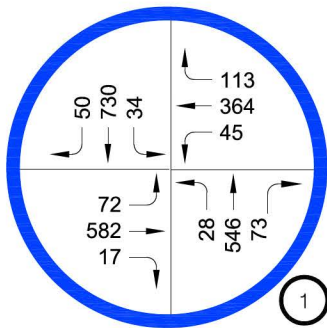
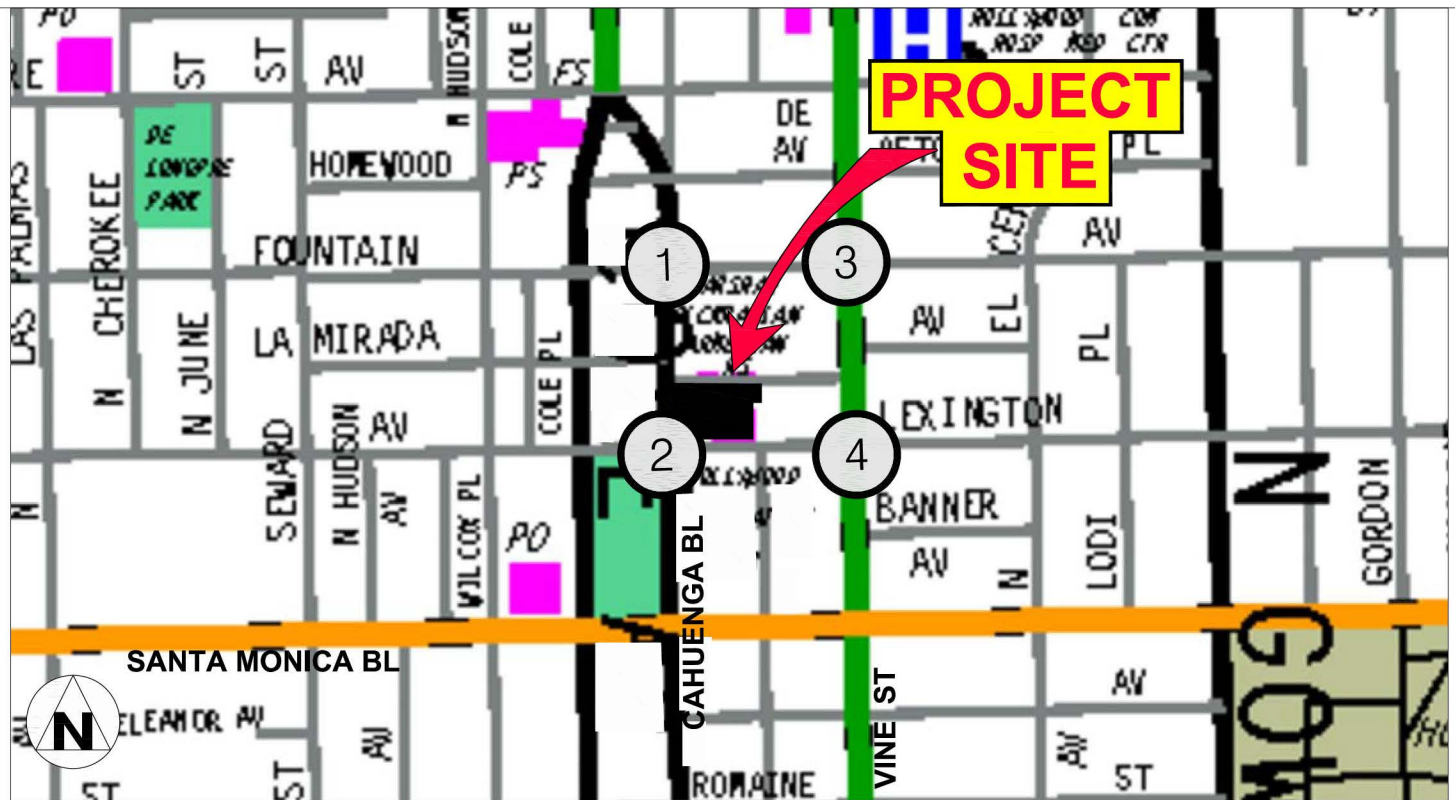


FOUNTAIN AVENUE & VINE STREET

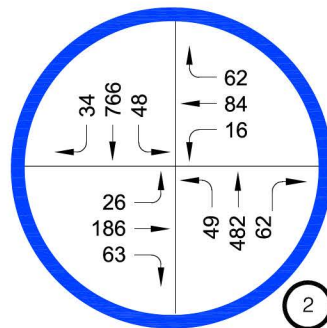


LEXINGTON AVENUE & VINE STREET

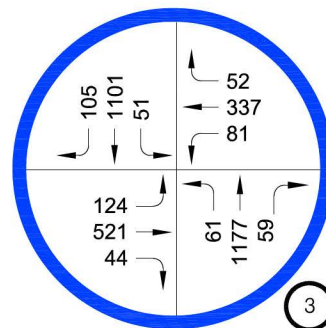
AM PEAK HOUR



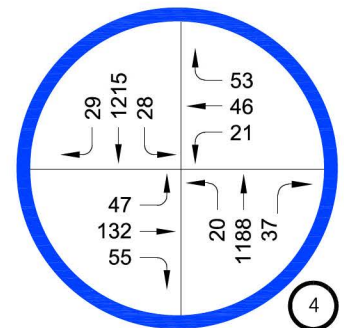
CAHUENGA BOULEVARD & FOUNTAIN AVENUE



CAHUENGA BOULEVARD & LEXINGTON AVENUE



FOUNTAIN AVENUE & VINE STREET



LEXINGTON AVENUE & VINE STREET

PM PEAK HOUR

FIGURE 7

EXISTING + PROJECT
TRAFFIC VOLUMES

Overland Traffic Consultants, Inc.
952 Manhattan Beach Bl #100, Manhattan Beach Ca 90266
(310)545-1235, (661)799-8423, liz@overlandtraffic.com

For the future traffic conditions in 2024, traffic generated by other projects identified in the Hollywood area within half mile radius of the Project have been added to the base counts to reflect potential growth in area. Twenty-two other related projects were included for this growth forecast. In addition, a one percent annual growth has been included to 2024 to account for other unknown projects or projects outside the study area. These adjustments provide a conservative traffic flow estimate for the study area and may overstate actual levels of congestion. The map and list of and locations of related projects (Figure 8) and the related projects' peak hour trips generated at the study locations (Figure 9) are provided in Appendix I.

Table 7 contains the results of the future cumulative plus Project traffic conditions at the study intersections for the 2024 study year. In evaluation of the Future conditions, the addition of Project traffic does not change the LOS at the nearby signalized locations.

Table 7
Future Traffic Conditions – Without and With Project

No.	Intersection	Peak Hour	DIR	Future (2024) Without Project		Future (2024) With Project	
				Delay (s)	LOS	Delay (s)	LOS
1	N. Cahuenga Boulevard & Fountain Avenue	AM		22.6	C	22.7	C
		PM		22.9	C	13.1	C
2	N. Cahuenga Boulevard & Lexington Avenue	AM	NBL	11.4	B	11.4	B
			SBL	9.7	A	9.7	A
			WB	940.5	F	875.4	F
		PM	NBL	10.5	B	10.5	B
			SBL	9.2	A	9.2	A
			EB	Not Available		Not Available	
3	Fountain Avenue & Vine Street	AM		25.7	C	25.8	C
		PM		29.0	C	29.4	C
4	Lexington Avenue & Vine Street	AM		6.2	A	6.1	A
		PM		9.0	A	9.7	A

DIR = DIRECTION - ONLY NEEDED FOR STOP SIGN CONTROLLED INTERSECTION
s = seconds

The AM Peak Hour delay in the Future with Project delay is lower than the Future without Project delay in some of the analysis results due to the fewer vehicle trips exiting the site than was created by the prior 200 student private school.

A review of the HCS worksheets indicated no poor operating conditions at North Cahuenga Boulevard and Fountain Avenue, Fountain Avenue and Vine Street or Lexington Avenue and Vine Street. However, the worksheets for North Cahuenga Boulevard and Lexington Avenue indicate the following:

AM Peak Hour

Future Without Project and Future With Project

Westbound traffic on the minor street is operating at LOS F

PM Peak Hour

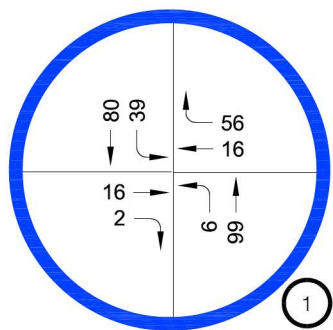
Future Without Project and Future With Project

Note that no information is provided on the worksheets for Eastbound or Westbound traffic and presumed to be operating at LOS F.

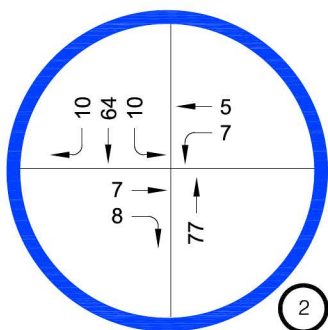


The Project does not create this circulation deficiency at the intersection. A traffic signal warrant analysis has been conducted at North Cahuenga Boulevard and Lexington Avenue to determine if a full traffic signal is currently and with the Project warranted. This analysis is provided on pages 46-50 of the report.

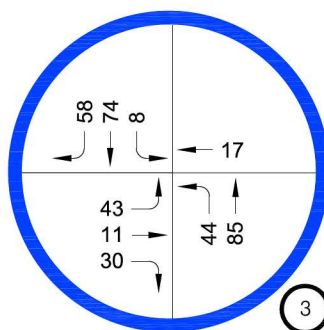
HCS worksheets are provided in Appendix J. Figure 10 displays the Future Without Traffic Volumes and Figure 11 displays the Future With Project Traffic Volumes.



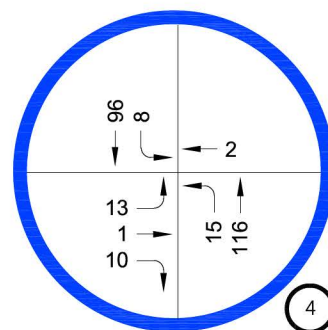
CAHUENGA BOULEVARD & FOUNTAIN AVENUE



CAHUENGA BOULEVARD & LEXINGTON AVENUE

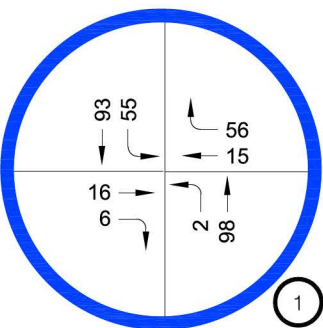
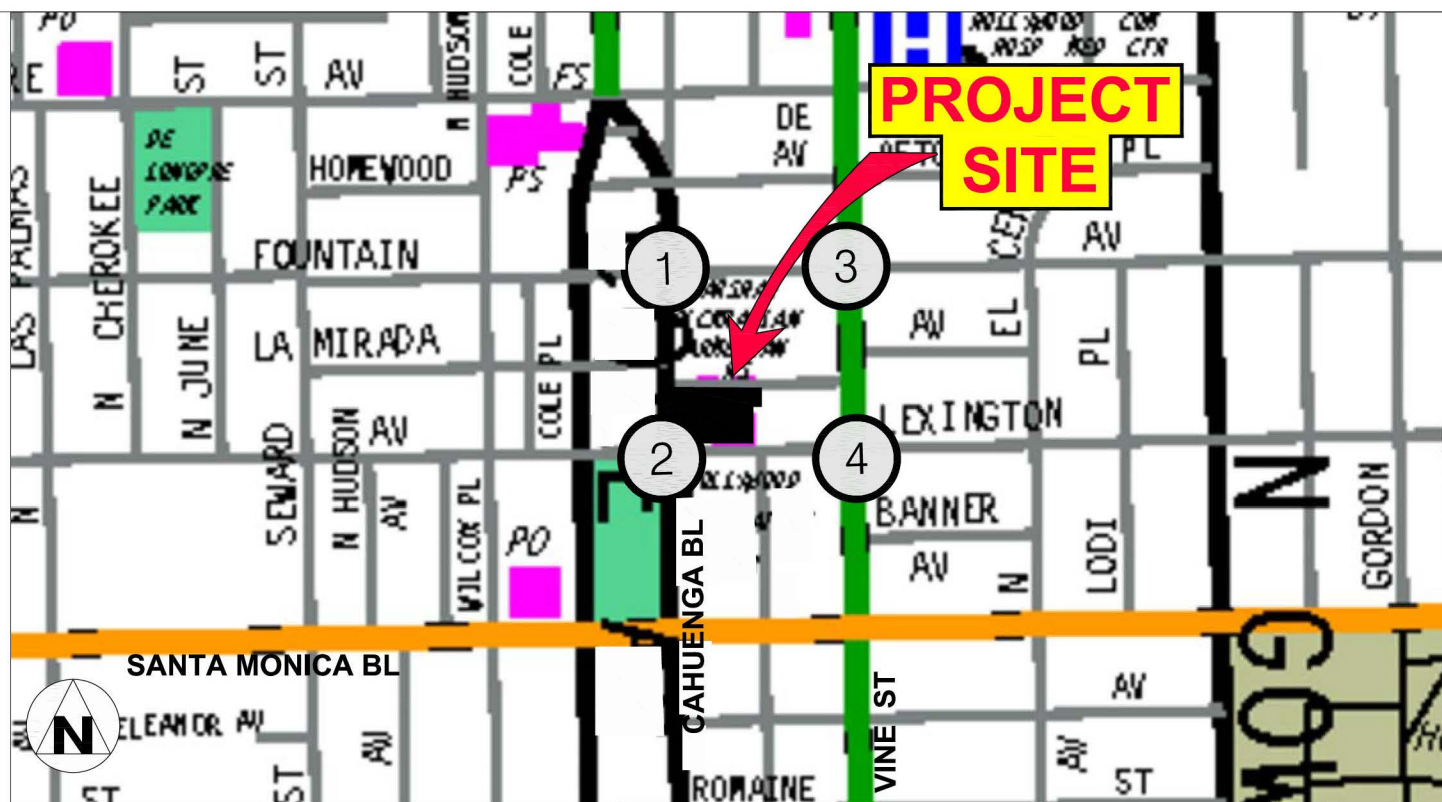


FOUNTAIN AVENUE & VINE STREET

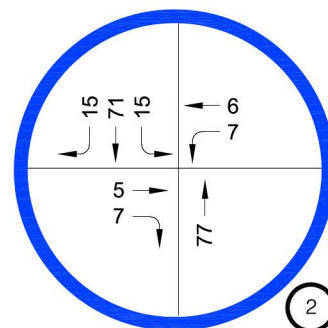


LEXINGTON AVENUE & VINE STREET

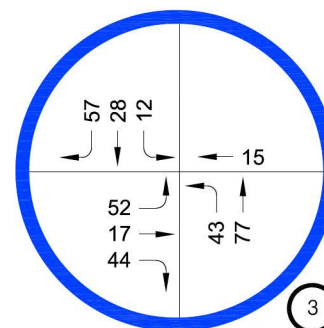
AM PEAK HOUR



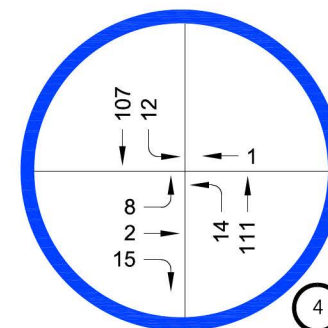
CAHUENGA BOULEVARD & FOUNTAIN AVENUE



CAHUENGA BOULEVARD & LEXINGTON AVENUE



FOUNTAIN AVENUE & VINE STREET



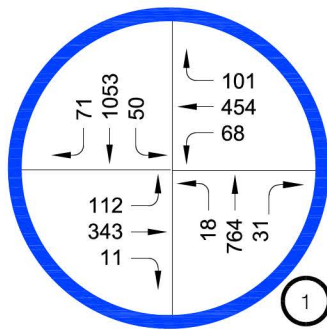
LEXINGTON AVENUE & VINE STREET

PM PEAK HOUR

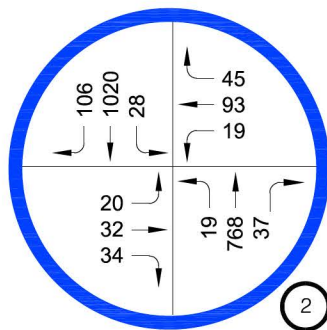
FIGURE 9

RELATED PROJECTS ONLY
TRAFFIC VOLUMES

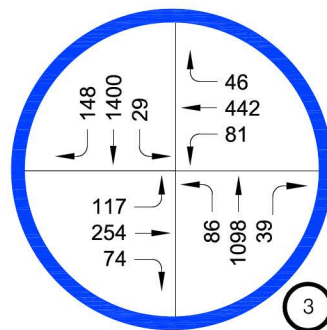
Overland Traffic Consultants, Inc.
952 Manhattan Beach Bl #100, Manhattan Beach Ca 90266
(310)545-1235, (661)799-8423, liz@overlandtraffic.com



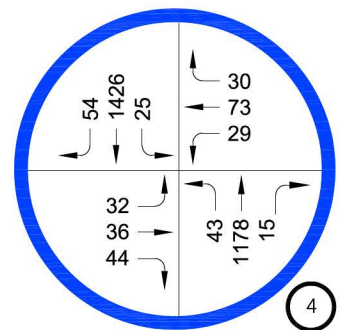
CAHUENGA BOULEVARD & FOUNTAIN AVENUE



CAHUENGA BOULEVARD & LEXINGTON AVENUE

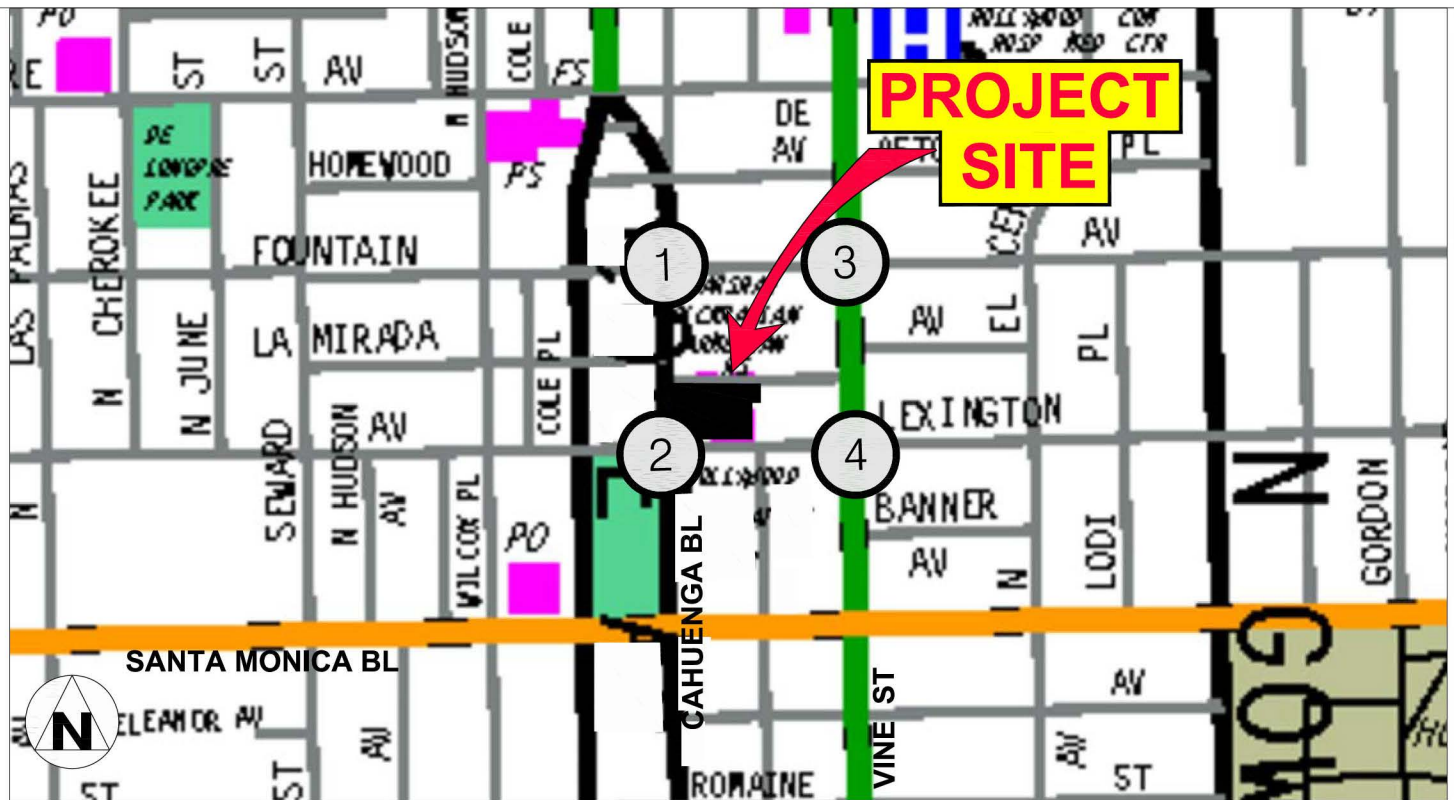


FOUNTAIN AVENUE & VINE STREET

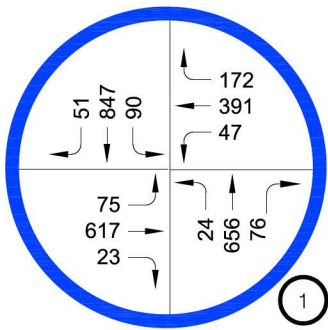


LEXINGTON AVENUE & VINE STREET

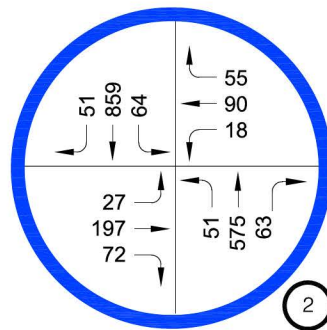
AM PEAK HOUR



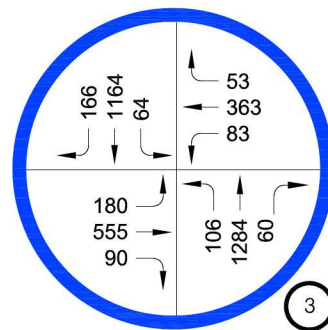
PROJECT SITE



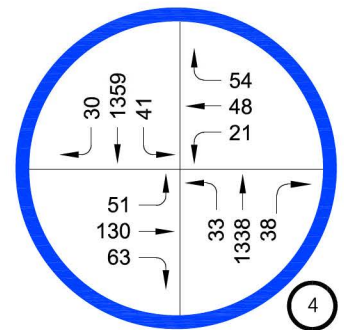
CAHUENGA BOULEVARD & FOUNTAIN AVENUE



CAHUENGA BOULEVARD & LEXINGTON AVENUE



FOUNTAIN AVENUE & VINE STREET



LEXINGTON AVENUE & VINE STREET

PM PEAK HOUR

**FUTURE (2024)
WITHOUT PROJECT
TRAFFIC VOLUMES**

FIGURE 10



Overland Traffic Consultants, Inc.

952 Manhattan Beach Bl #100, Manhattan Beach Ca 90266
(310)545-1235, (661)799-8423, liz@overlandtraffic.com

Traffic Signal Analysis

The pedestrian signal and stop sign controlled intersection on Lexington Avenue at North Cahuenga Boulevard was found to be operating poorly under existing and future conditions without and with the Project. This intersection has been evaluated to determine if a full traffic signal is warranted and if the addition of the Project traffic creates a need for a full traffic signal.

The State of California has established “Warrants” to determine if traffic signal control is required at an intersection. A signal analysis was conducted utilizing LADOT Traffic Signal Warrant Worksheets (revised 8-2020) based on the State Warrants incorporating size of the community, traffic volumes, lane configurations, speed limits, distances to other controls, peak hour delay, accidents, number of pedestrians and number of cyclists.

It is common traffic engineering practice to use the Signal Warrant Analysis as a tool to determine if a traffic signal is needed. Meeting one or even more than one traffic signal warrant does not necessarily mean that a traffic signal is the preferred approach to improve traffic conditions at a location. Other items are also considered including potential degradation to progression, alternative improvements such as widening or other traffic controls. The input information for the signal analysis is similar to the intersection analysis. A minimum of eight hours of peak hour traffic data are considered for potentially meeting traffic signal warrants. The eight hours of traffic data collected during the AM and PM peak periods (7 to 10 AM and 3 to 6 PM) was input into the software, comparisons to the relevant tables and graphs were conducted to determine if a traffic signal was warranted.

The traffic lanes, traffic volumes, and pedestrians, as indicated in the count information and the count information + future growth + project were used in the signal analysis.

A brief explanation of each of the warrants² is provided on the following pages.

² Based on Warrants 8 User Guide – Copyright 2011 Trafficware Ltd. Page 5-29. LADOT Traffic Signal Warrants Sheets Used in Analysis

Warrant 1 – Eight-Hour Vehicular Volume

There are two conditions for this warrant. Condition A is the Minimum Vehicular Volume Warrant intended for applications at intersections where large volumes of traffic are the principal reason to consider a new traffic signal. Condition B is the Interruption of Continuous Traffic intended for use at intersection where the Minimum Vehicular Volume warrant isn't likely to be met but the main street volumes are high and create excessive delay or conflict for minor street traffic. Either or both conditions may be met for this warrant to be satisfied.

Warrant 2 – Four Hour Vehicular Volume

This warrant's conditions are intended to be met when the high volume of peak hour intersecting traffic is the primary reason for the need of a traffic signal. Four hours of data are evaluated under this warrant.

Warrant 3 – Peak Hour

The Peak Hour Warrant is intended for use at a location where the minor street encounters undue delay when entering or crossing the major street for a at least one hour of a typical day.

Warrant 4 – Pedestrian Volume

Two conditions are required to be met for the Pedestrian Volume warrant to be considered met. At least 100 pedestrians are required for a minimum of four hours or at least 190 pedestrians within one hour. The second condition checks if a new signal will restrict traffic flow and if there are adequate gaps for pedestrians to cross. The Pedestrian Volume warrant is intended for use when high volumes of pedestrians encounter extensive delay in crossing a high volume major street.

Warrant 5 – School Crossing

This warrant is for use when school children are crossing a major street. The School Crossing Warrant is intended for use where school children crossing the intersection are the primary reason for considering installation of a new traffic signal. The Project is not adjacent to a school.



Warrant 6 – Coordinated Signal System

Occasionally, in order to maintain proper progressive movement of vehicles through a signal system, it is necessary to install a new traffic signal at a location where it would not otherwise be necessary.

Warrant 7 – Crash Experience

Locations where there are frequent and severe accidents are occasionally considered for installation for a traffic signal if such installation will reduce the frequency and/or severity of the accidents. Traffic accident data was based on City of Los Angeles RoadSafe GIS.

Warrant 8 – Roadway Network

This Warrant uses information from Warrants 1, 2 and 3. It would be met if the new traffic signal would encourage concentration and organization of traffic flow on a roadway network.

Warrant 9 – Intersection Near a Grade Crossing

This Warrant is considered when an intersection is near a grade crossing. The intersection of Lexington Avenue and North Cahuenga Boulevard is not near a grade crossing and this Warrant is not applicable.

Warrant 10 – Bicycles

This Warrant considers the traffic and cyclist volume, accidents including cyclists and the roadway configurations in the area.

Warrant 11 – Activated Pedestrian Warning Device

The location is already improved with a pedestrian traffic signal.

Signal warrants analysis was conducted under existing and future conditions with and without the Project. Traffic counts were conducted from 7 AM to 10 AM and from 3 PM to 6PM. These are historic counts with 1% per year growth added to estimate Existing 2021 and Future 2024 traffic volumes. At the time of the writing of this report, travel patterns have not settled back to a “normal” conditions and historic counts only are being used in order to better simulate future conditions. This is 2 hours short of the 8 hours

typically needed for signal warrant analysis. As shown in Table 8, Signal warrant analysis of this pedestrian signalized intersection indicates that 6 hours of the Eight-Hour Vehicle Volume Warrant 1. B-Interruption of Continuous Traffic and 4-hour Vehicle Volume Warrant are met. An additional two hours of data would be needed to assure that the Eight-Hour Vehicle Volume Warrant is met. The traffic signal warrants are met without the Project and with the Project. The Project does not create this potential need. As stated previously, meeting one or even more than one traffic signal warrant does not necessarily mean that a traffic signal is the preferred approach to improve traffic conditions at a location. This location is currently improved with a pedestrian signal and a full traffic signal may interrupt traffic flow along North Cahuenga Boulevard. The Project adds the following peak hour percentage of traffic³ to the overall volume at the intersections during the existing and future traffic conditions with the Project:

	Existing + Project	Future with Project
North Cahuenga Bl. & Lexington Av.	0.22%	0.20%

The detailed signal warrant sheets are provided in Attachment J. A summary of the findings is presented in Table 8.

³ 8 hours of project traffic added (3X AM Peak + 3X PM Peak from Figure 6) were divided by 6 hours of total peak hour volumes at the intersection X 100 for % Project trips in intersection.



Table 8
Summary of Traffic Signal Warrant Analysis
Existing, Existing+ Project, Future Without and With Project

<u>LEXINGTON AVENUE & CAHUENGA BL</u>		<u>Existing 2021</u>	<u>Existing + Project</u>	<u>Future Without Project</u>	<u>Future With Project</u>
Warrant 1	Eight-Hour Vehicle Volume Warrant	6 HOURS	6 HOURS	6 HOURS	6 HOURS
Warrant 2	Four-Hour Vehicle Volume Warrant	Yes	Yes	Yes	Yes
Warrant 3	Peak Hour	N/A	N/A	N/A	N/A
Warrant 4	Pedestrian Volume	Not Met	Not Met	Not Met	Not Met
Warrant 5	School Crossing	Not Met	Not Met	Not Met	Not Met
Warrant 6	Coordinated Signal System	Not Met	Not Met	Not Met	Not Met
Warrant 7	Crash Experience	Not Met	Not Met	Not Met	Not Met
Warrant 8	Roadway Network	Not Met	Not Met	Not Met	Not Met
Warrant 9	Intersection Near a Grade Crossing	N/A	N/A	N/A	N/A
Warrant 10	Bicycles	N/A	N/A	N/A	N/A
Warrant 11	Activated Pedestrian Warning Device	EXISTING	EXISTING	EXISTING	EXISTING

Driveway Queue Evaluation

At total of 156 parking spaces will be provided for the Project. Driveway queue evaluation has been conducted using the projected future Project traffic volumes in and out of the Project driveways. One existing driveway on La Mirada Avenue and one existing driveways on Lexington Avenue will be removed. A new driveway on La Mirada Avenue will be created near the eastern boundary of the site. This will provide access to 36 parking spaces (approximately 23% of the total number of parking spaces). A new driveway on Lexington Avenue will be created east of North Cahuenga Boulevard. This driveway will provide access to 19 parking spaces (approximately 12% of the total number of parking spaces). One existing driveway near the east end of the site on Lexington Avenue will remain. This driveway will provide parking to the basement area with 101 parking spaces (65% of the total number of parking spaces). HCS analysis along La Mirada Avenue and Lexington Avenue with the Project driveway volumes in and out of the parking areas has been conducted. The driveways are forecast to operate well as shown in Table 9.

Table 9
Future Driveway Conditions With Project

No.	Intersection	Peak Hour	Future (2024) With Project	
			Delay (s)	LOS
A	Project Driveway & La Mirada Avenue	AM	9.9	A
		PM	8.8	A
B	West Project Driveway & Lexington Avenue	AM	9.9	A
		PM	8.9	A
C	East Project Driveway & Lexington Avenue	AM	10.2	B
		PM	9.1	A

s = Seconds

The HCS analysis also provides the forecasted number of vehicles in the turning lanes at the driveways as shown in Table 10 on the following page.

Table 10
Future Queues at the Project's New Driveway

No.	Intersection	Peak Hour	With Project TYPICAL QUEUE LENGTH	
			DIRECTION	# of Cars
A	Project Driveway & La Mirada Avenue	AM	WBL	0
			NB	0
		PM	WBL	0
			NB	0 to 1
B	West Project Driveway & Lexington Avenue	AM	EBL	0
			SB	0
		PM	EBL	0
			SB	0
C	East Project Driveway & Lexington Avenue	AM	EBL	0 to 1
			SB	0 to 1
		PM	EBL	0
			SB	0 to 1

NB=Northbound, SB=Southbound,
EBL=Eastbound Left, WBL=Westbound Left

No Project driveway deficiencies have been identified in this analysis.

Access & Circulation Summary Findings

Based on the traffic conditions analysis, no Project access and circulation constraints have been identified. The Project's traffic would not contribute to unacceptable queuing on along the Project driveways on La Mirada Avenue or Lexington Avenue. The results of this evaluation show that the Project will not create any non-CEQA traffic deficiencies at the Project driveways.

Safety Evaluation

Providing access on the local street only will not increase vehicle conflicts with pedestrians, and bicycles along North Cahuenga Boulevard and no deficiencies are apparent in the site access plans which would be considered significant. All emergency ingress/egress associated with the Project would be designed and constructed in conformance to all applicable City Building and Safety Department, LADOT, and LAFD standards and requirements for design and construction. This would also ensure pedestrian safety. There are adequate sidewalks and crosswalks serving the Project Site. There is a pedestrian signal at North Cahuenga Boulevard and Lexington Avenue along the west boundary of the site, a full signal-controlled intersection at North Cahuenga Boulevard and Fountain Avenue approximately 500 feet north of the Project Site and at Vine Street and Lexington Avenue approximately 400 feet east of the site that provides traffic controlled crossing with continental crosswalks. The Project would not affect these facilities.

No access deficiencies are apparent in the site access plans which would be considered significant.

Passenger Loading Evaluation

All parking is located on-site in surface and basement parking garage areas. A passenger loading zone is proposed. There will be an at-grade on-site drop off area to serve both rideshare arrivals/departures in the surface parking lot on Lexington Avenue.

State Facility Evaluation –

The proposed Project is approximately 1.1 miles west of the Hollywood Freeway (US 101). This facility has been evaluated for potential deficiencies with the Project.

Based on LADOT, Department of City Planning and Traffic Consultant representatives' team collaboration in addition to Caltrans comments from other projects,

LADOT provided Interim Guidance for Freeway Safety Analysis on May 1, 2020. This guidance has been prepared to aid in evaluation of State Facilities. The guidelines include 8 steps which include (generally) 1) screening to determine if project trips on the off-ramps exceed 25 peak hour trips, 2) if screening is over 25 project trips on an off ramp, guidance on preparation of a “Future with Project” queuing analysis, 3) process for evaluation of existing and future ramp storage lengths, 4) determination of number of project vehicles that may exceed queue lengths including screening for over two or more vehicles, 5) speed differential evaluation, 6) screening for 30 miles per hour (mph) or more, 7) if more than 30 mph there are recommendations for corrective measures, 8) if the cost of the changes are substantial, contribution guidelines are provided.

For this Project, the following ramps were evaluated:

- Hollywood Freeway Southbound Off Ramp to Lexington Avenue north of Santa Monica Boulevard; and,
- Hollywood Freeway Northbound Off Ramp to Santa Monica Boulevard.

As required by the LADOT screening of the number of project trips (#1 in the process) has been conducted. In full, #1 states:

Identify the number of Project trips expected to be added to nearby off ramps serving the site. If the Project adds 25 or more trips to any off ramp in either the morning or afternoon peak hour, then that ramp should be studied for potential queueing impacts following the steps below. If the project is not expected to generate more than 25 or more peak hour trips at any freeway off ramps, then a freeway ramp analysis is not required.

Project trips were distributed to the nearby off ramps according to the traffic patterns in the area and previously approved distribution. Table 11 displays the results of this evaluation.

Table 11
Study Off Ramp Distribution and Trips

#	Location	Peak Hour	Project Trips In	# of Trips	Over 25 Peak Hour Trips?
A	Hollywood Freeway SB Off Ramp to Lexington Avenue	AM	15%	1	NO
		PM	15%	1	NO
B	Hollywood Freeway NB Off Ramp to Santa Monica Boulevard	AM	15%	1	NO
		PM	15%	1	NO

As shown in Table 11, fewer than 25 Project trips will be utilizing the nearby off ramps during the peak hours. No further analysis and no deficiencies have been identified at the off ramps.

Construction Overview

Project construction is evaluated to determine if activities substantially interfere with pedestrian, bicycle, transit, or vehicle mobility. Factors to be considered are the location of the Project Site, the functional classification of the adjacent street affected, temporary loss of bus stops or rerouting of transit lines, and the loss of vehicle, bicycle, or pedestrian access. LADOT's TAG considers three areas to be considered when evaluating project construction activities.

Temporary Transportation Constraints

As part of the Project's construction, the City may require a Construction Traffic Management Plan (Plan) to be implemented during the construction phase to minimize potential conflicts with vehicles, pedestrians, bicycle, and transit facilities associated with the Project's construction. The Plan should include a construction schedule, the location of any traffic lane or sidewalk closures, any traffic detours, haul routes, hours of operation, access plans to abutting properties, and contact information.

Construction workers are typically expected to arrive at the Project Site before 7:00 AM and depart before or after the weekday peak hours of 4:00 to 6:00 PM. Deliveries of construction materials will be coordinated to non-peak travel periods, to the extent

possible and occur from the parking lane along the Project's La Mirada Avenue and Lexington Avenue frontages.

For off-site activities, Worksite Traffic Control Plans would be prepared for any temporary traffic lane or sidewalk closures in accordance with City guidelines. These worksite plans will require a formal review and approval by the City prior to the issuance of any construction permits. In addition, the City will require a Truck Haul Route plan including permitted hauling hours and a haul route to and from the landfill.

No detours around the construction site are expected; however, flagmen would be used to control traffic movement during the ingress and egress of construction trucks.

Since Project construction would not substantially interfere with pedestrian, bicycle or vehicle mobility, the construction impacts would be less than significant.

1. Temporary Loss of Access

Vehicular access to the adjacent properties will be maintained. Safe pedestrian circulation paths adjacent to or around the work areas will be provided by covered pedestrian walkways if necessary and will be maintained as required by City-approved Work Area Traffic Control Plans.

Since Project construction would not result in complete loss of vehicular or pedestrian access, the construction impacts on loss of access would be less than significant.

2. Temporary Loss of Bus Stops or Rerouting of Bus Lines

No bus stops are located within the work zone adjacent to the Project Site that would need to be temporarily relocated. There will be no loss of pedestrian access to transit stops.

Since Project construction would not require relocation of bus stops or bus lines, the construction impacts on transit operations would be less than significant.

The Project applicant will be required to submit formal Work Area Traffic Control Plans for review and approval by the City prior to the issuance of any construction permits.

RESIDENTIAL STREET CUT-THROUGH ANALYSIS

A neighborhood street impact analysis method is included in the LADOT TAG. The objective of the residential street impact analysis is to determine potential increases in average daily traffic associated with cut-through traffic that can result from a project and impact residential streets. Cut-through trips are defined by the TAG as those which feature travel along a street classified as a Local Street in the City's General Plan, with residential land-use frontage, as an alternative to a higher classification street segment (e.g., Collector, Avenue, or Boulevard as designated in the City's General Plan) to access a destination that is not within the neighborhood within which the Local Street is located.

Due to the Project's location between North Cahuenga Boulevard and Vine Street, a pedestrian only traffic signal on Lexington Avenue and North Cahuenga Boulevard, and the lack of traffic signals on La Mirada Avenue on Vine Street or La Mirada Avenue there is small likelihood for cut through traffic on La Mirada Avenue or Lexington Avenue. No adjacent residential street segments would likely be used for cut-through trips as a viable alternative route. A residential cut-through analysis is not required.

APPENDIX A

LADOT Approved MOU

Transportation Assessment Memorandum of Understanding (MOU)

This MOU acknowledges that the Transportation Assessment for the following Project will be prepared in accordance with the latest version of LADOT's Transportation Assessment Guidelines:

I. PROJECT INFORMATION

Project Name: 1200 Cahuenga Bl

Project Address: 1200-1210 N.Cahuenga Bl, 6337-6357W.Lexington Av, 6332-6356W.LaMiranda Av.

Project Description: Removal of portion of 200 student private school buildings (retain & renovate 19,448sf as creative office), construct new 55,814sf creative office & 500sf retail

LADOT Project Case Number: _____ Project Site Plan attached? (Required) ☐ Yes ☐ No

II. TRANSPORTATION DEMAND MANAGEMENT (TDM) MEASURES

Select any of the following TDM measures, which may be eligible as a Project Design Feature¹, that are being considered for this project:

Reduced Parking Supply ²	☒	Bicycle Parking and Amenities	☐	Parking Cash Out
-------------------------------------	-------------------------------------	-------------------------------	--------------------------	------------------

List any other TDM measures (e.g. bike share kiosks, unbundled parking, microtransit service, etc.) below that are also being considered and would require LADOT staff's determination of its eligibility as a TDM measure. LADOT staff will make the final determination of the TDM measure's eligibility for this project.

- | | |
|---------|---------|
| 1 _____ | 4 _____ |
| 2 _____ | 5 _____ |
| 3 _____ | 6 _____ |

III. TRIP GENERATION

(ITE Manual Sheets attached)

Trip Generation Rate(s) Source: ITE 10th Edition / Other 11th Edition ITE

Trip Generation Adjustment (Exact amount of credit subject to approval by LADOT)	Yes	No
Transit Usage	☒	☐
Existing Active or Previous Land Use	☒	☐
Internal Trip	☒	☐
Pass-By Trip	☐	☒
Transportation Demand Management (See above)	☒	☐

Trip generation table including a description of the existing and proposed land uses, rates, estimated morning and afternoon peak hour volumes (ins/outs/totals), proposed trip credits, etc. attached? (Required) ☒ Yes ☐ No

	IN	OUT	TOTAL
AM Trips	<u>6</u>	<u>-31</u>	<u>-25</u>
PM Trips	<u>5</u>	<u>62</u>	<u>67</u>

NET Daily Vehicle Trips (DVT)	
<u>344</u>	DVT (ITE11th Ed.)
<u>259</u>	DVT (VMT Calculator ver. 1.3)

¹ At this time Project Design Features are only those measures that are also shown to be needed to comply with a local ordinance, affordable housing incentive program, or State law.

²Select if reduced parking supply is pursued as a result of a parking incentive as permitted by the City's Bicycle Parking Ordinance, State Density Bonus Law, or the City's Transit Oriented Community Guidelines.

IV. STUDY AREA AND ASSUMPTIONS

Project Buildout Year: 2024 Ambient Growth Rate: 1 % Per Yr.

Related Projects List, researched by the consultant and approved by LADOT, attached? (Required) ☐ Yes ☐ No

STUDY INTERSECTIONS and/or STREET SEGMENTS:

(May be subject to LADOT revision after access, safety, and circulation evaluation.)

- | | |
|---|--|
| 1 CAHUENGA BOULEVARD & FOUNTAIN AVENUE | 4. LEXINGTON AVENUE & VINE STREET |
| 2 CAHUENGA BOULEVARD & LEXINGTON AVENUE | a-b 2 PROJECT DRIVEWAYS ON LEXINTON AVENUE |
| 3 FOUNTAIN AVENUE & VINE STREET | c 1 PROJECT DRIVEWAY ON LA MIRADA AVENUE |

Provide a separate list if more than six study intersections and/or street segments.

Is this Project located on a street within the High Injury Network? ☐ Yes ☒ No

If a study intersection is located within a ¼-mile of an adjacent municipality's jurisdiction, signature approval from said municipality is required prior to MOU approval.

V. ACCESS ASSESSMENT

- Does the project exceed 1,000 net DVT? ☐ Yes ☒ No
- Is the project's frontage 250 linear feet or more along an Avenue or Boulevard as classified by the City's General Plan? ☐ Yes ☒ No
- Is the project's building frontage encompassing an entire block along an Avenue or Boulevard as classified by the City's General Plan? ☐ Yes ☒ No

VI. ACCESS ASSESSMENT CRITERIA

If Yes to any of the above questions a., b., or c., complete **Attachment C.1: Access Assessment Criteria**.

ANSWER TO ABOVE a., b. and c. no - ATTACHMENT C.1 NOT ATTACHED

VII. SITE PLAN AND MAP OF STUDY AREA

Please note that the site plan should also be submitted to the Department of City Planning for cursory review.

Does the attached site plan and/or map of study area show	Yes	No	Not Applicable
Each study intersection and/or street segment	☒	☐	☐
*Project Vehicle Peak Hour trips at each study intersection	☒	☐	☐
*Project Vehicle Peak Hour trips at each project access point	☒	☐	☐
*Project trip distribution percentages at each study intersection	☒	☐	☐
Project driveways designed per LADOT MPP 321 (show widths and directions or lane assignment)	☒	☐	☐
Pedestrian access points and any pedestrian paths	☒	☐	☐
Pedestrian loading zones	☐	☐	☒
Delivery loading zone or area	☐	☐	☒
Bicycle parking onsite	☒	☐	☐
Bicycle parking offsite (in public right-of-way)	☐	☐	☒

*For mixed-use projects, also show the project trips and project trip distribution by land use category.

VIII. FREEWAY SAFETY ANALYSIS SCREENING

Will the project add 25 or more trips to any freeway off-ramp in either the AM or PM peak hour? ☐ YES ☒ NO

Provide a brief explanation or graphic identifying the number of project trips expected to be added to the nearby freeway off-ramps serving the project site. If Yes to the question above, a freeway ramp analysis is required.

IX. CONTACT INFORMATION

CONSULTANT

DEVELOPER

Name: Liz Fleming - Overland Traffic Consultants

BARDAS Investment Group

Address: 952 Manhattan Bch Bl, #100, M.B.

c/o Matthew Nichols, DLA Piper

Phone Number: 310 545-1235

550 S Hope Street, Suite 2400

E-Mail: liz@overlandtraffic.com

Los Angeles, CA 90071

Approved by: x _____ x  12/7/2021
Consultant's Representative Date LADOT Representative **Date

Adjacent Municipality: _____ Approved by: _____
(if applicable) Representative Date

****MOUs are generally valid for two years after signing. If after two years a transportation assessment has not been submitted to LADOT, the developer's representative shall check with the appropriate LADOT office to determine if the terms of this MOU are still valid or if a new MOU is needed.**

11th Edition ITE Manual Trip Rates

<u>Description</u>	<u>ITE CODE</u>	<u>Daily Traffic</u>	<u>AM Peak Hour</u>			<u>PM Peak Hour</u>		
			<u>Total</u>	<u>In</u>	<u>Out</u>	<u>Total</u>	<u>In</u>	<u>Out</u>
Private School	532	2.48	0.79	63%	37%	0.17	43%	57%
Office	710	10.84	1.52	88%	12%	1.44	17%	83%
Coffee/Donut Shop wo Drive Thru	936	626.85	93.08	51%	49%	32.29	50%	50%

General office rate used for Creative Office, no small Retail/Restaurant; used coffee/donut shop (no daily rate used 5XAM+PM)

Rate per 1,000 sf for Office & Restaurant

Project Trip Generation

ITE Code	Description	Size	Daily Traffic	AM Peak Hour			PM Peak Hour		
				Total	In	Out	Total	In	Out
710	Proposed Project								
	Creative Office	74,762 sf	810	114	100	14	108	19	89
	Transit Trips	15%	(122)	(17)	(15)	(2)	(16)	(3)	(13)
	Subtotal Creative Office		688	97	85	12	92	16	76
936	Small Retail/Restaurant*	500 sf	313	47	24	23	16	8	8
	Internal Trips	75%	(235)	(35)	(18)	(17)	(12)	(6)	(6)
	Subtotal Small Retail/Restaurant		78	12	6	6	4	2	2
	Subtotal Proposed (Office + Retail)		75,262 sf	766	109	91	18	96	18
532	Existing to be removed								
	Private School	200 students	496	158	100	58	34	15	19
	Transit Trips	15%	(74)	(24)	(15)	(9)	(5)	(2)	(3)
	Subtotal Existing		422	134	85	49	29	13	16
NET TRIPS (PROPOSED-EXISTING)			344	(25)	6	(31)	67	5	62

* Small Retail is for the primary use of the office employees/visitors, 75% internal conservatively estimated

Santa Monica & Vine (1100' SE of site has bus stops for Metro Rapid Route 704 & Route 4

Bus stop on Santa Monica & Wilcox for Route 4 approximately 1,230 SW of site

Bus stop on NE & SW Corner of Fountain & Cahuenga for DASH Hollywood 420' from site

CITY OF LOS ANGELES VMT CALCULATOR Version 1.3



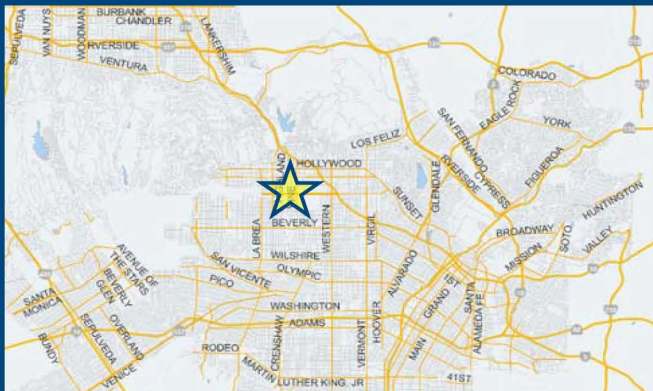
Project Screening Criteria: Is this project required to conduct a vehicle miles traveled analysis?

Project Information

Project:

Scenario:

Address:



Is the project replacing an existing number of residential units with a smaller number of residential units AND is located within one-half mile of a fixed-rail or fixed-guideway transit station?

☒ Yes ☐ No

Existing Land Use

Land Use Type	Value	Unit
School Private School (K-12)		Students +
School Private School (K-12)	200	Students

[Click here to add a single custom land use type \(will be included in the above list\)](#)

Proposed Project Land Use

Land Use Type	Value	Unit
Office General Office	74.762	ksf +
Retail General Retail	0.5	ksf
Office General Office	74.762	ksf

[Click here to add a single custom land use type \(will be included in the above list\)](#)

Project Screening Summary

Existing Land Use	Proposed Project
313 Daily Vehicle Trips	572 Daily Vehicle Trips
1,919 Daily VMT	4,190 Daily VMT

Tier 1 Screening Criteria

Project will have less residential units compared to existing residential units & is within one-half mile of a fixed-rail station. ☐

Tier 2 Screening Criteria

The net increase in daily trips < 250 trips 259
Net Daily Trips

The net increase in daily VMT ≤ 0 2,271
Net Daily VMT

The proposed project consists of only retail land uses ≤ 50,000 square feet total. 0.500
ksf

The proposed project is required to perform VMT analysis.

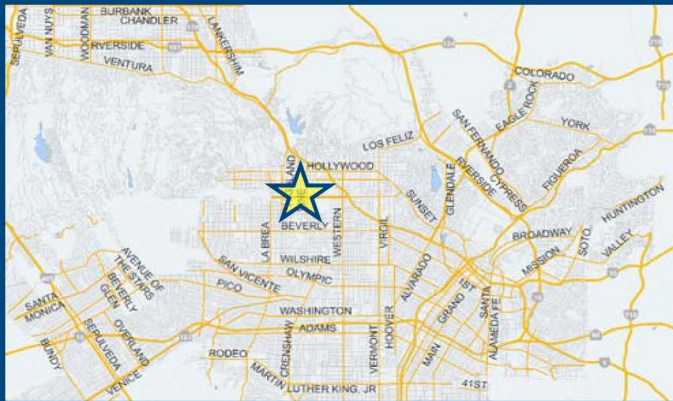


CITY OF LOS ANGELES VMT CALCULATOR Version 1.3



Project Information

Project: Creative Office
Scenario:
Address: 1200 N CAHUENGA BLVD, 90038



Proposed Project Land Use Type	Value	Unit
Retail General Retail	0.5	ksf
Office General Office	74.762	ksf

TDM Strategies

Select each section to show individual strategies
 Use ☒ to denote if the TDM strategy is part of the proposed project or is a mitigation strategy

	Proposed Project	With Mitigation
Max Home Based TDM Achieved?	No	No
Max Work Based TDM Achieved?	No	No
(A) Parking		
(B) Transit		
(C) Education & Encouragement		
(D) Commute Trip Reductions		
(E) Shared Mobility		
(F) Bicycle Infrastructure		
Implement/Improve On-street Bicycle Facility Select Proposed Prj or Mitigation to include this strategy ☐ Proposed Prj ☐ Mitigation		
Include Bike Parking Per LAMC Select Proposed Prj or Mitigation to include this strategy ☒ Proposed Prj ☐ Mitigation		
Include Secure Bike Parking and Showers Select Proposed Prj or Mitigation to include this strategy ☒ Proposed Prj ☐ Mitigation		
(G) Neighborhood Enhancement		

Analysis Results

Proposed Project	With Mitigation
566 Daily Vehicle Trips	566 Daily Vehicle Trips
4,138 Daily VMT	4,138 Daily VMT
0.0 Household VMT per Capita	0.0 Household VMT per Capita
7.6 Work VMT per Employee	7.6 Work VMT per Employee

Significant VMT Impact?

Household: No Threshold = 6.0 15% Below APC	Household: No Threshold = 6.0 15% Below APC
Work: No Threshold = 7.6 15% Below APC	Work: No Threshold = 7.6 15% Below APC



CITY OF LOS ANGELES VMT CALCULATOR

Report 1: Project & Analysis Overview

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

Project Information			
Land Use Type		Value	Units
Housing	Single Family	0	DU
	Multi Family	0	DU
	Townhouse	0	DU
	Hotel	0	Rooms
	Motel	0	Rooms
Affordable Housing	Family	0	DU
	Senior	0	DU
	Special Needs	0	DU
	Permanent Supportive	0	DU
Retail	General Retail	0.500	ksf
	Furniture Store	0.000	ksf
	Pharmacy/Drugstore	0.000	ksf
	Supermarket	0.000	ksf
	Bank	0.000	ksf
	Health Club	0.000	ksf
	High-Turnover Sit-Down	0.000	ksf
	Restaurant	0.000	ksf
	Fast-Food Restaurant	0.000	ksf
	Quality Restaurant	0.000	ksf
	Auto Repair	0.000	ksf
	Home Improvement	0.000	ksf
	Free-Standing Discount	0.000	ksf
	Movie Theater	0	Seats
Office	General Office	74.762	ksf
	Medical Office	0.000	ksf
Industrial	Light Industrial	0.000	ksf
	Manufacturing	0.000	ksf
	Warehousing/Self-Storage	0.000	ksf
School	University	0	Students
	High School	0	Students
	Middle School	0	Students
	Elementary	0	Students
	Private School (K-12)	0	Students
Other		0	Trips

CITY OF LOS ANGELES VMT CALCULATOR

Report 1: Project & Analysis Overview

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

Analysis Results			
Total Employees: 300			
Total Population: 0			
Proposed Project		With Mitigation	
566	Daily Vehicle Trips	566	Daily Vehicle Trips
4,138	Daily VMT	4,138	Daily VMT
0	Household VMT per Capita	0	Household VMT per Capita
7.6	Work VMT per Employee	7.6	Work VMT per Employee
Significant VMT Impact?			
APC: Central			
Impact Threshold: 15% Below APC Average			
Household = 6.0			
Work = 7.6			
Proposed Project		With Mitigation	
VMT Threshold	Impact	VMT Threshold	Impact
Household > 6.0	No	Household > 6.0	No
Work > 7.6	No	Work > 7.6	No

CITY OF LOS ANGELES VMT CALCULATOR

Report 2: TDM Inputs

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

TDM Strategy Inputs				
Strategy Type		Description	Proposed Project	Mitigations
Parking	Reduce parking supply	City code parking provision (spaces)	0	0
		Actual parking provision (spaces)	0	0
	Unbundle parking	Monthly cost for parking (\$)	\$0	\$0
	Parking cash-out	Employees eligible (%)	0%	0%
	Price workplace parking	Daily parking charge (\$)	\$0.00	\$0.00
		Employees subject to priced parking (%)	0%	0%
	Residential area parking permits	Cost of annual permit (\$)	\$0	\$0
(cont. on following page)				

CITY OF LOS ANGELES VMT CALCULATOR

Report 2: TDM Inputs

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

TDM Strategy Inputs, Cont.				
Strategy Type		Description	Proposed Project	Mitigations
Transit	Reduce transit headways	Reduction in headways (increase in frequency) (%)	0%	0%
		Existing transit mode share (as a percent of total daily trips) (%)	0%	0%
		Lines within project site improved (<50%, >=50%)	0	0
	Implement neighborhood shuttle	Degree of implementation (low, medium, high)	0	0
		Employees and residents eligible (%)	0%	0%
	Transit subsidies	Employees and residents eligible (%)	0%	0%
Amount of transit subsidy per passenger (daily equivalent) (\$)		\$0.00	\$0.00	
Education & Encouragement	Voluntary travel behavior change program	Employees and residents participating (%)	0%	0%
	Promotions and marketing	Employees and residents participating (%)	0%	0%
(cont. on following page)				

CITY OF LOS ANGELES VMT CALCULATOR

Report 2: TDM Inputs

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

TDM Strategy Inputs, Cont.				
Strategy Type		Description	Proposed Project	Mitigations
Commute Trip Reductions	Required commute trip reduction program	Employees participating (%)	0%	0%
	Alternative Work Schedules and Telecommute	Employees participating (%)	0%	0%
		Type of program	0	0
		Degree of implementation (low, medium, high)	0	0
	Employer sponsored vanpool or shuttle	Employees eligible (%)	0%	0%
		Employer size (small, medium, large)	0	0
	Ride-share program	Employees eligible (%)	0%	0%
Shared Mobility	Car share	Car share project setting (Urban, Suburban, All Other)	0	0
	Bike share	Within 600 feet of existing bike share station - OR- implementing new bike share station (Yes/No)	0	0
	School carpool program	Level of implementation (Low, Medium, High)	0	0
(cont. on following page)				

CITY OF LOS ANGELES VMT CALCULATOR

Report 2: TDM Inputs

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

TDM Strategy Inputs, Cont.				
Strategy Type		Description	Proposed Project	Mitigations
Bicycle Infrastructure	<i>Implement/Improve on-street bicycle facility</i>	<i>Provide bicycle facility along site (Yes/No)</i>	0	0
	Include Bike parking per LAMC	Meets City Bike Parking Code (Yes/No)	Yes	Yes
	Include secure bike parking and showers	Includes indoor bike parking/lockers, showers, & repair station (Yes/No)	Yes	Yes
Neighborhood Enhancement	<i>Traffic calming improvements</i>	<i>Streets with traffic calming improvements (%)</i>	0%	0%
		<i>Intersections with traffic calming improvements (%)</i>	0%	0%
	<i>Pedestrian network improvements</i>	<i>Included (within project and connecting off-site/within project only)</i>	0	0

CITY OF LOS ANGELES VMT CALCULATOR

Report 3: TDM Outputs

Date: November 4, 2021
 Project Name: Creative Office
 Project Scenario:
 Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

TDM Adjustments by Trip Purpose & Strategy

Place type: Urban

		Home Based Work Production		Home Based Work Attraction		Home Based Other Production		Home Based Other Attraction		Non-Home Based Other Production		Non-Home Based Other Attraction		Source
		Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	
Parking	Reduce parking supply	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	TDM Strategy Appendix, Parking sections 1 - 5
	Unbundle parking	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
	Parking cash-out	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
	Price workplace parking	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
	Residential area parking permits	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	
Transit	Reduce transit headways	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	TDM Strategy Appendix, Transit sections 1 - 3
	Implement neighborhood shuttle	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
	Transit subsidies	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
Education & Encouragement	Voluntary travel behavior change program	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	TDM Strategy Appendix, Education & Encouragement sections 1 - 2
	Promotions and marketing	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
Commute Trip Reductions	Required commute trip reduction program	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	TDM Strategy Appendix, Commute Trip Reductions sections 1 - 4
	Alternative Work Schedules and Telecommute Program	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
	Employer sponsored vanpool or shuttle	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
	Ride-share program	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
Shared Mobility	Car-share	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	TDM Strategy Appendix, Shared Mobility sections 1 - 3
	Bike share	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	
	School carpool program	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	

CITY OF LOS ANGELES VMT CALCULATOR

Report 3: TDM Outputs

Date: November 4, 2021
 Project Name: Creative Office
 Project Scenario:
 Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

TDM Adjustments by Trip Purpose & Strategy, Cont.

Place type: Urban

		Home Based Work Production		Home Based Work Attraction		Home Based Other Production		Home Based Other Attraction		Non-Home Based Other Production		Non-Home Based Other Attraction		Source
		Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	
Bicycle Infrastructure	Implement/ Improve on-street bicycle facility	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	TDM Strategy Appendix, Bicycle Infrastructure sections 1 - 3
	Include Bike parking per LAMC	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	
	Include secure bike parking and showers	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	
Neighborhood Enhancement	Traffic calming improvements	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	TDM Strategy Appendix, Neighborhood Enhancement sections 1 - 2
	Pedestrian network improvements	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	

Final Combined & Maximum TDM Effect

		Home Based Work Production		Home Based Work Attraction		Home Based Other Production		Home Based Other Attraction		Non-Home Based Other Production		Non-Home Based Other Attraction	
		Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated
COMBINED TOTAL		1%	1%	1%	1%	1%	1%	1%	1%	1%	1%	1%	1%
MAX. TDM EFFECT		1%	1%	1%	1%	1%	1%	1%	1%	1%	1%	1%	1%

$$= \text{Minimum}(X\%, 1 - [(1-A) * (1-B) \dots])$$

where X%=

PLACE	urban	75%
TYPE	compact infill	40%
MAX:	suburban center	20%
	suburban	15%

Note: $(1 - [(1-A) * (1-B) \dots])$ reflects the dampened combined effectiveness of TDM Strategies (e.g., A, B, ...). See the TDM Strategy Appendix (*Transportation Assessment Guidelines Attachment G*) for further discussion of dampening.

CITY OF LOS ANGELES VMT CALCULATOR

Report 4: MXD Methodology

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

MXD Methodology - Project Without TDM

	Unadjusted Trips	MXD Adjustment	MXD Trips	Average Trip Length	Unadjusted VMT	MXD VMT
Home Based Work Production	0	0.0%	0	7.1	0	0
Home Based Other Production	0	0.0%	0	4.4	0	0
Non-Home Based Other Production	102	-7.8%	94	6.7	683	630
Home-Based Work Attraction	435	-38.9%	266	8.7	3,785	2,314
Home-Based Other Attraction	206	-42.7%	118	5.7	1,174	673
Non-Home Based Other Attraction	102	-7.8%	94	6.1	622	573

MXD Methodology with TDM Measures

	Proposed Project			Project with Mitigation Measures		
	TDM Adjustment	Project Trips	Project VMT	TDM Adjustment	Mitigated Trips	Mitigated VMT
Home Based Work Production	-1.2%	0	0	-1.2%	0	0
Home Based Other Production	-1.2%	0	0	-1.2%	0	0
Non-Home Based Other Production	-1.2%	93	622	-1.2%	93	622
Home-Based Work Attraction	-1.2%	263	2,285	-1.2%	263	2,285
Home-Based Other Attraction	-1.2%	117	665	-1.2%	117	665
Non-Home Based Other Attraction	-1.2%	93	566	-1.2%	93	566

MXD VMT Methodology Per Capita & Per Employee

Total Population: 0

Total Employees: 300

APC: Central

	Proposed Project	Project with Mitigation Measures
Total Home Based Production VMT	0	0
Total Home Based Work Attraction VMT	2,285	2,285
Total Home Based VMT Per Capita	0.0	0.0
Total Work Based VMT Per Employee	7.6	7.6

VMT Calculator User Agreement

The Los Angeles Department of Transportation (LADOT), in partnership with the Department of City Planning and Fehr & Peers, has developed the City of Los Angeles Vehicle Miles Traveled (VMT) Calculator to estimate project-specific daily household VMT per capita and daily work VMT per employee for land use development projects. This application, the VMT Calculator, has been provided to You, the User, to assess vehicle miles traveled (VMT) outcomes of land use projects within the City of Los Angeles. The term “City” as used below shall refer to the City of Los Angeles. The terms “City” and “Fehr & Peers” as used below shall include their respective affiliates, subconsultants, employees, and representatives.

The City is pleased to be able to provide this information to the public. The City believes that the public is most effectively served when they are provided access to the technical tools that inform the public review process of private and public land use investments. However, in using the VMT Calculator, You agree to be bound by this VMT Calculator User Agreement (this Agreement).

VMT Calculator Application for the City of Los Angeles. The City’s consultant calibrated the VMT Calculator’s parameters in 2018 to estimate travel patterns of locations in the City, and validated those outcomes against empirical data. However, this calibration process is limited to locations within the City, and practitioners applying the VMT Calculator outside of the City boundaries should not apply these estimates without further calibration and validation of travel patterns to verify the VMT Calculator’s accuracy in estimating VMT in such other locations.

Limited License to Use. This Agreement gives You a limited, non-transferrable, non-assignable, and non-exclusive license to use and execute a copy of the VMT Calculator on a computer system owned, leased or otherwise controlled by You in Your own facilities, as set out below, provided You do not use the VMT Calculator in an unauthorized manner, and that You do not republish, copy, distribute, reverse-engineer, modify, decompile, disassemble, transfer, or sell any part of the VMT Calculator, and provided that You know and follow the terms of this Agreement. Your failure to follow the terms of this Agreement shall automatically terminate this license and Your right to use the VMT Calculator.

Ownership. You understand and acknowledge that the City owns the VMT Calculator, and shall continue to own it through Your use of it, and that no transfer of ownership of any kind is intended in allowing You to use the VMT Calculator.

Warranty Disclaimer. In spite of the efforts of the City and Fehr & Peers, some information on the VMT Calculator may not be accurate. The VMT Calculator, OUTPUTS AND ASSOCIATED DATA ARE PROVIDED “as is” WITHOUT WARRANTY OF ANY KIND, whether expressed, implied, statutory, or otherwise including but not limited to, the implied warranties of merchantability and fitness for a particular purpose.

Limitation of Liability. It is understood that the VMT Calculator is provided without charge. Neither the City nor Fehr & Peers can be responsible or liable for any information derived from its use, or for any delays, inaccuracies, incompleteness, errors or omissions arising out of your use of the VMT Calculator or with respect to the material contained in the VMT Calculator. You understand and agree that Your sole remedy against the City or Fehr & Peers for loss or damage caused by any defect or failure of the

VMT Calculator, regardless of the form of action, whether in contract, tort, including negligence, strict liability or otherwise, shall be the repair or replacement of the VMT Calculator to the extent feasible as determined solely by the City. In no event shall the City or Fehr & Peers be responsible to You or anyone else for, or have liability for any special, indirect, incidental or consequential damages (including, without limitation, damages for loss of business profits or changes to businesses costs) or lost data or downtime, however caused, and on any theory of liability from the use of, or the inability to use, the VMT Calculator, whether the data, and/or formulas contained in the VMT Calculator are provided by the City or Fehr & Peers, or another third party, even if the City or Fehr & Peers have been advised of the possibility of such damages.

This Agreement and License shall be governed by the laws of the State of California without regard to their conflicts of law provisions, and shall be effective as of the date set forth below and, unless terminated in accordance with the above or extended by written amendment to this Agreement, shall terminate on the earlier of the date that You are not making use of the VMT Calculator or one year after the beginning of Your use of the VMT Calculator.

By using the VMT Calculator, You hereby waive and release all claims, responsibilities, liabilities, actions, damages, costs, and losses, known and unknown, against the City and Fehr & Peers for Your use of the VMT Calculator.

Before making decisions using the information provided in this application, contact City LADOT staff to confirm the validity of the data provided.

Print and sign below, and submit to LADOT along with the transportation assessment Memorandum of Understanding (MOU).

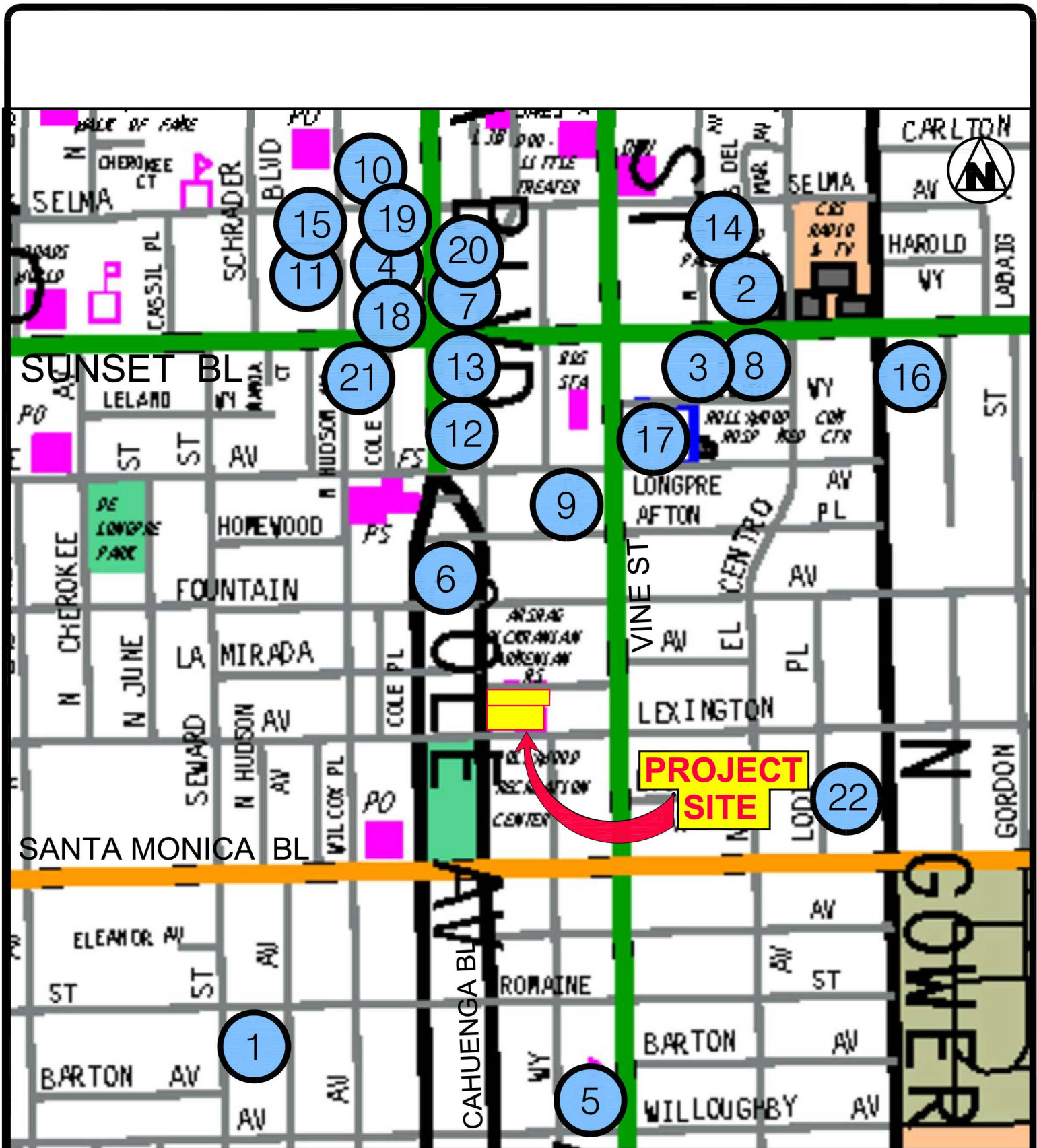
You, the User	
By:	_____
Print Name:	<u>Liz Fleming</u>
Title:	<u>V.P.</u>
Company:	<u>OVERLAND TRAFFIC CONSULTANTS</u>
Address:	<u>952 MANHATTAN BCH BL #100</u>
Phone:	<u>310-545-1235</u>
Email Address:	<u>LIZ@OVERLANDTRAFFIC.COM</u>
Date:	<u>11-4-21</u>

RELATED PROJECT LIST
1200 Cahuenga Boulevard

#	Project	Size	Location	Daily Traffic	AM Peak Hour			PM Peak Hours		
					In	Out	Total	In	Out	Total
1	Office	130,000 sf	956 N. Seward Street							
2	Palladium Residences		6201 W. Sunset Boulevard	4913	128	228	356	234	169	403
	Apartments/Condos	731 units								
	OR Apartments/Condos	598 units								
	with Hotel	250 rooms								
	Retail	21,000 sf								
	Restaurant	7,000 sf								
3	Apartments	200 units	6230 W. Sunset Boulevard	1473	52	80	132	71	50	121
	Office	32,100 sf								
	Retail	4,700 sf								
4	Hotel	69 rooms	1525 N Cahuenga Boulevard	469	10	12	22	20	14	34
5	Apartments	85 units	901 N. Vine Street	-32	4	26	30	-5	1	-4
	Restaurant	4,000 sf								
	Retail	4,000 sf								
6	Apartments	375 units	1310 N. Cole Avenue	224	24	6	30	7	23	30
	Creative Office	2,800 sf								
7	Hotel	275 rooms	6409 W. Sunset Boulevard	1285	51	26	77	53	60	113
	Retail	1,900 sf								
8	Apartments	270 units	6200 W. Sunset Boulevard	1243	-2	76	74	73	23	96
	Restaurant	1,750 sf								
	Retail	8,070 sf								
	Pharmacy	2,300 sf								
9	Academy Square		6332 W. De Longpre Avenue	3981	282	91	373	118	208	326
	Apartments	200 units								
	Office	298,000 sf								
	Quality Restaurant	11,900 sf								
	High Turnover Restaurant	4,200 sf								
10	Hotel	114 rooms	6421 W. Selma Avenue	1277	43	27	70	56	44	100
	Restaurant	5,041 sf								
	Retail	1,809 sf								

RELATED PROJECT LIST
1200 Cahuenga Boulevard

#	Project	Size	Location	Daily Traffic	AM Peak Hour			PM Peak Hours		
					In	Out	Total	In	Out	Total
11	Hotel	190 rooms	1541 N. Wilcox Avenue	2058	76	57	133	82	75	157
	Restaurant	4,463 sf								
	Meeting Room	1,382 sf								
12	Hotel	220 rooms	1400 N. Cahuenga Boulevard	1875	55	47	102	78	60	138
	Restaurant	2,723 sf								
	Rooftop lounge/bar	1,440 sf								
13	Apartments	200 units	6400 W. Sunset Boulevard	-59	14	76	90	24	-26	-2
	Retail	7,000 sf								
14	Apartments	276 units	1546 N. Argyle Avenue	2073	43	127	170	128	51	179
	Retail	9,000 sf								
	Restaurant	15,000 sf								
15	Retail/Restaurant/Bar	14,800 sf	1545 N. Wilcox Avenue	2341	36	50	86	128	47	175
	Office	16,100 sf								
16	Sunset Gower Studios		6050 W. Sunset Boulevard	4108	424	68	492	77	409	486
	Sound Stage/Office	859,350 sf								
17	Apartments	170 units	1400 N. Vine Street	1446	70	93	163	97	56	153
	Affordable Apartments	19 units								
	Retail	16,000 sf								
18	Hotel	175 rooms	6445 W. Sunset Boulevard	1409	77	58	135	80	61	141
	Restaurant/Bar	11,400 sf								
19	Apartments	45 units	6422 W. Selma Avenue	126	-3	10	7	9	-1	8
20	Apartments	243 units	1520 N. Cahuenga Boulevard	1143	34	75	109	82	40	122
	Affordable Apartments	27 units								
	High Turnover Restaurant	6,805 sf								
21	Office	431,032 sf	6450 W. Sunset Boulevard	2,836	311	50	361	93	319	412
	Restaurant	12,386 sf								
22	Apartments	155 units	1125 N Gower Street	667	16	39	55	38	25	63
	Affordable Apartments	14 units								



FIGURE

7/2021

RELATED PROJECT LOCATION MAP



Overland Traffic Consultants, Inc.

952 Manhattan Beach Bl, #100, Manhattan Beach, CA 90266
(310) 545-1235, liz@overlandtraffic.com

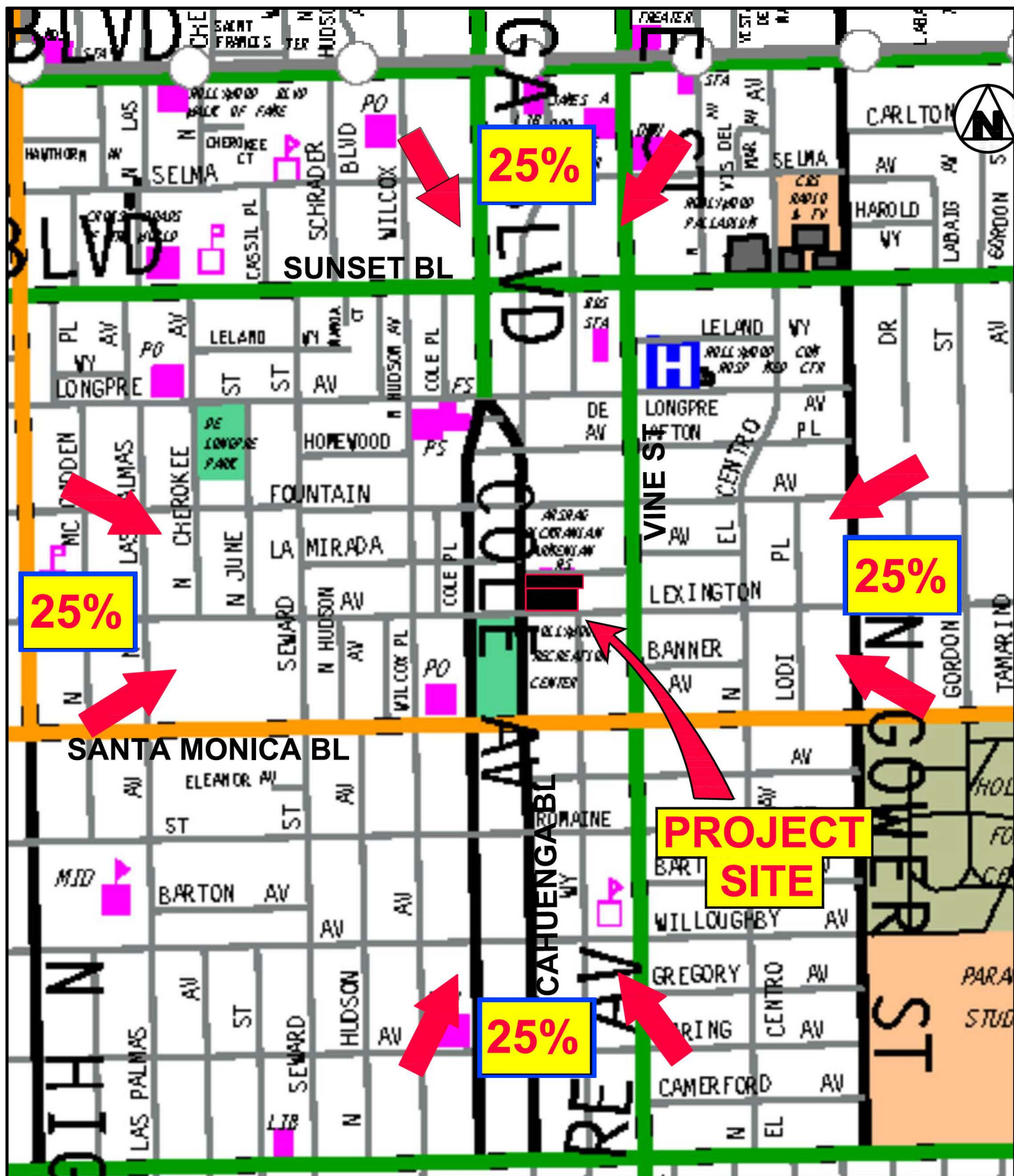


FIGURE 4

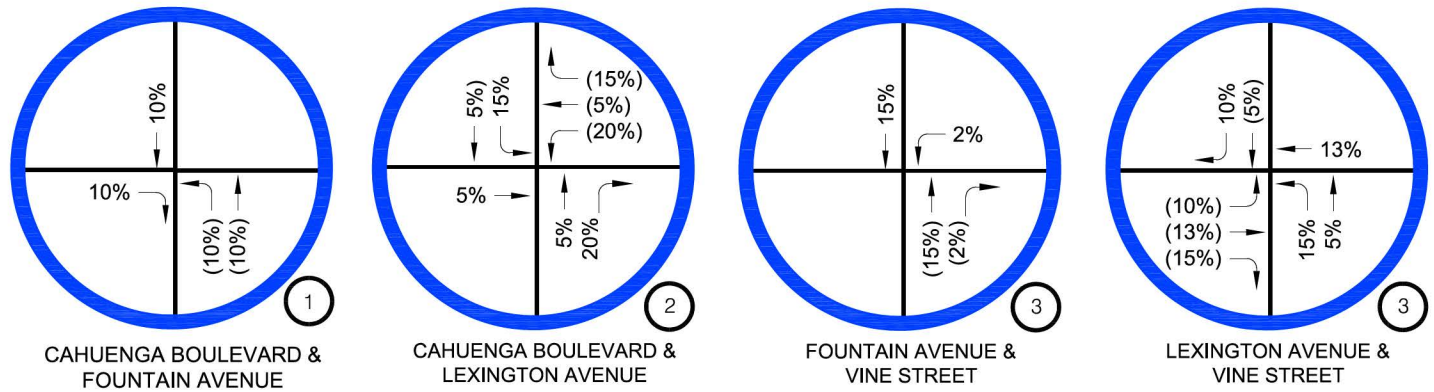
7/2021

OVERALL PROJECT TRIP DISTRIBUTION

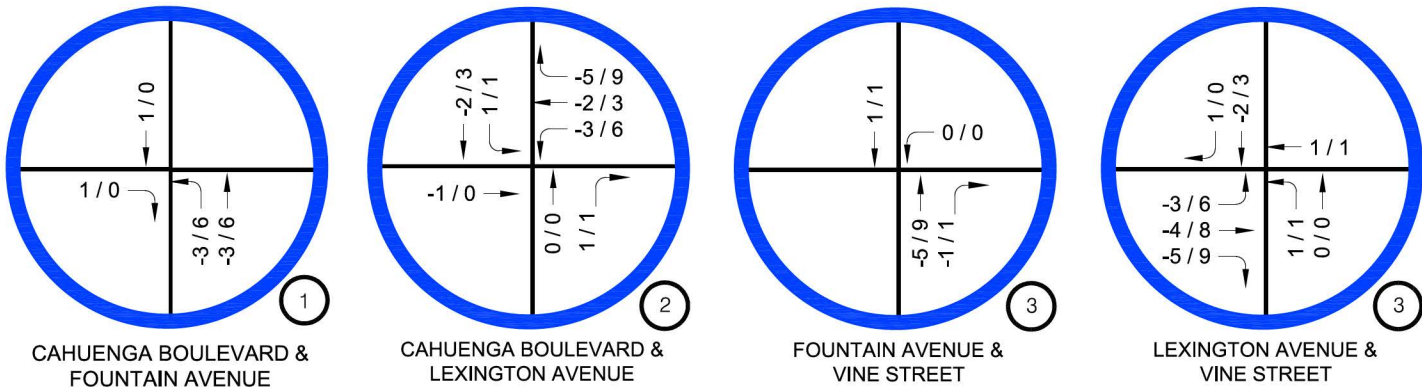
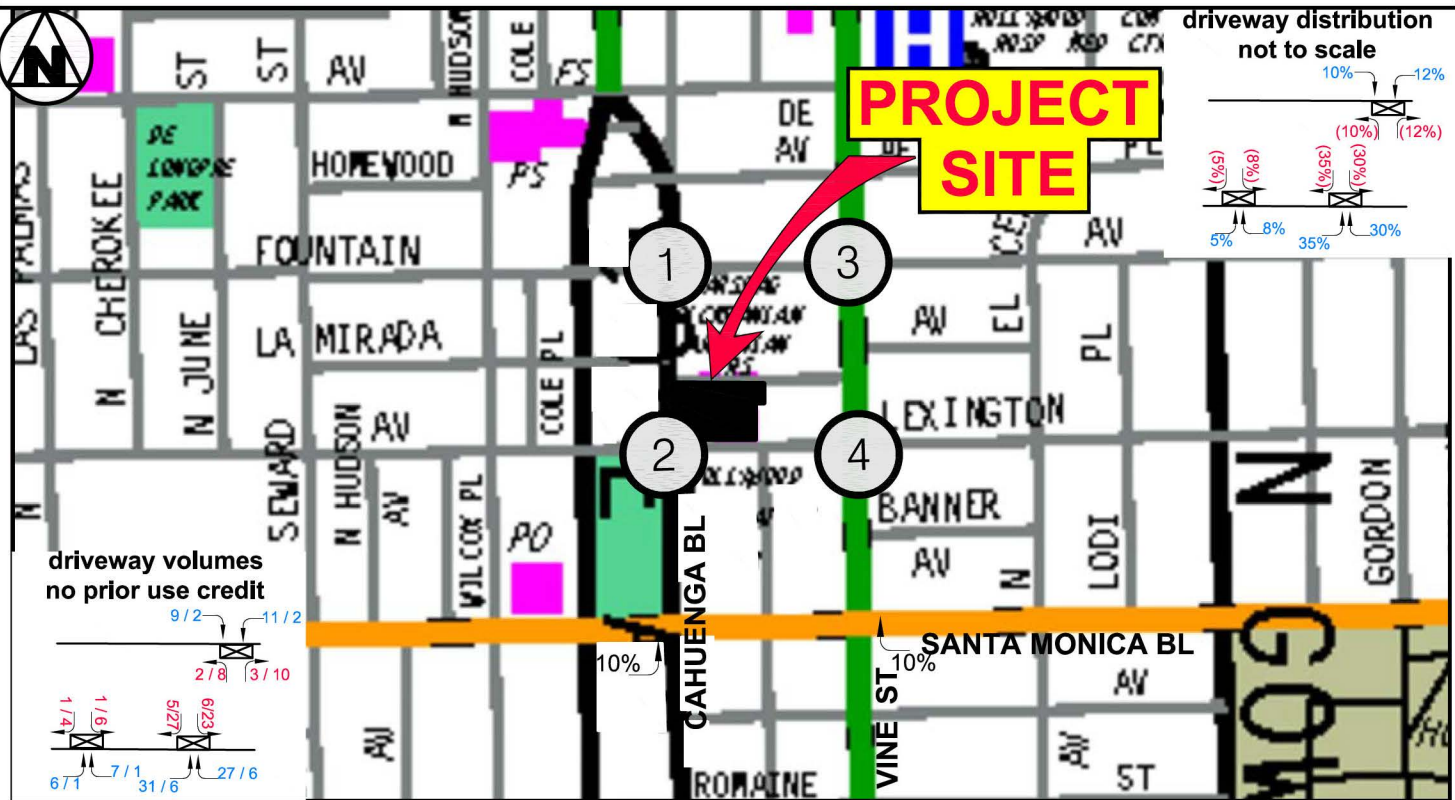


Overland Traffic Consultants, Inc.

952 Manhattan Beach Bl, #100, Manhattan Beach, CA 90266
(310) 545-1235, liz@overlandtraffic.com



PROJECT TRAFFIC ASSIGNMENT DISTRIBUTION IN / (OUT)



PROJECT VOLUMES AM PEAK HOUR/PM PEAK HOUR

11/ 2021

FIGURE 5

**PROJECT TRAFFIC ASSIGNMENT DISTRIBUTION
& PROJECT VOLUMES**



Overland Traffic Consultants, Inc.

952 Manhattan Beach Bl #100, Manhattan Beach Ca 90266
(310)545-1235, (661)799-8423, liz@overlandtraffic.com

Private School (K-12) (532)

Vehicle Trip Ends vs: Students
On a: Weekday

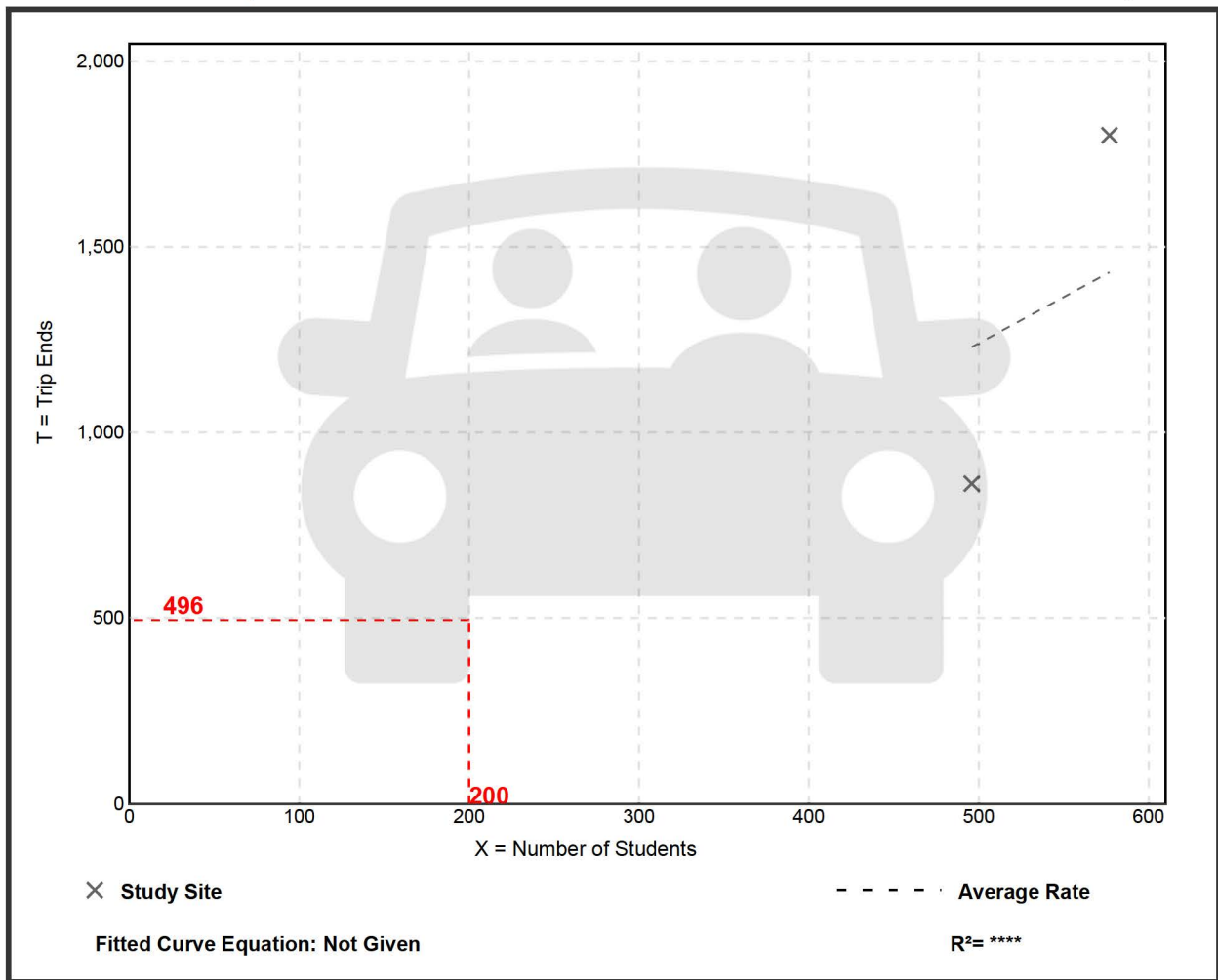
Setting/Location: General Urban/Suburban
Number of Studies: 2
Avg. Num. of Students: 537
Directional Distribution: 50% entering, 50% exiting

Vehicle Trip Generation per Student

Average Rate	Range of Rates	Standard Deviation
2.48	1.74 - 3.12	*

Data Plot and Equation

Caution – Small Sample Size



Private School (K-12)

(532)

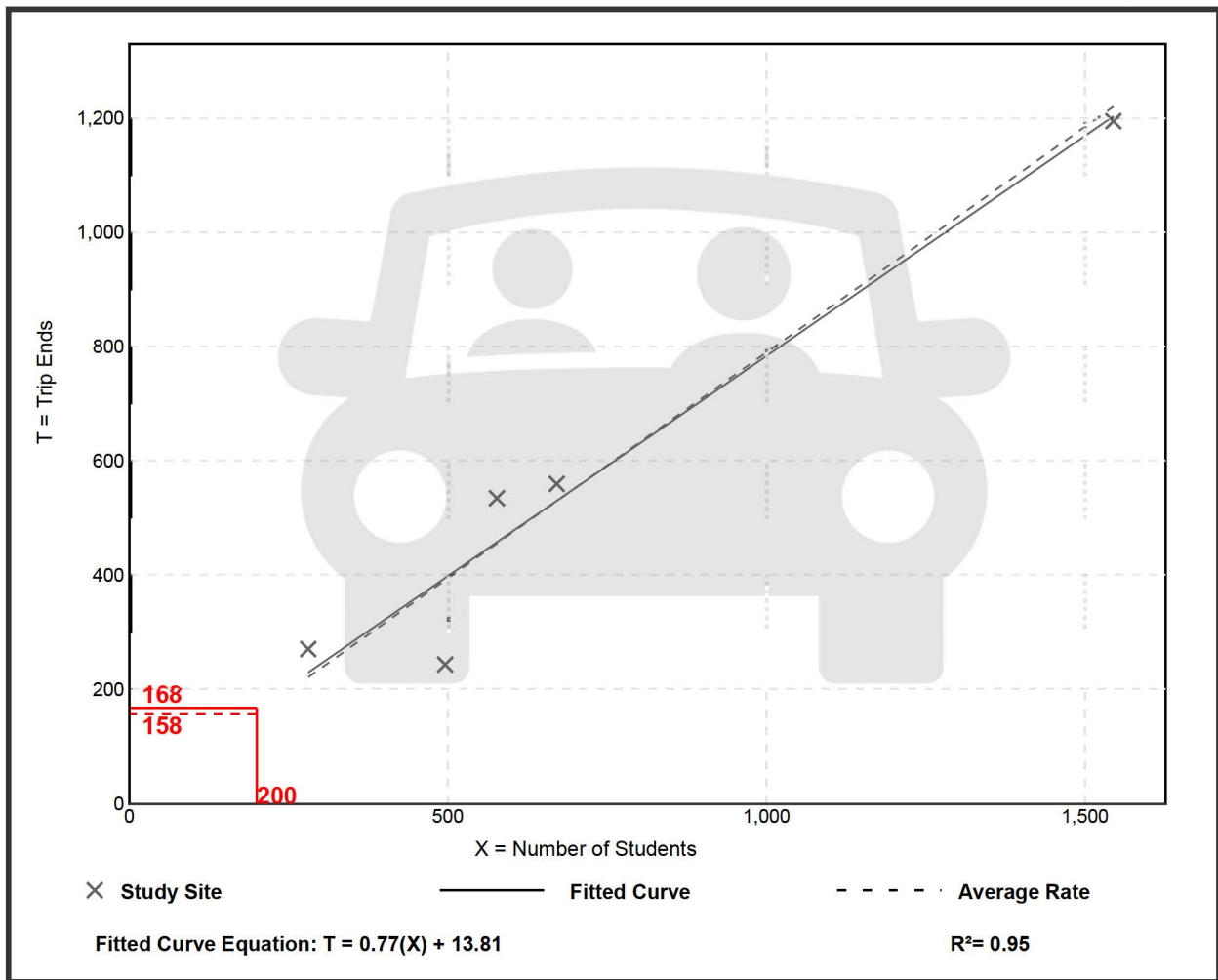
Vehicle Trip Ends vs: Students
 On a: Weekday,
 Peak Hour of Adjacent Street Traffic,
 One Hour Between 7 and 9 a.m.
 Setting/Location: General Urban/Suburban
 Number of Studies: 5
 Avg. Num. of Students: 714
 Directional Distribution: 63% entering, 37% exiting

Vehicle Trip Generation per Student

Average Rate	Range of Rates	Standard Deviation
0.79	0.49 - 0.96	0.15

Data Plot and Equation

Caution – Small Sample Size



Private School (K-12) (532)

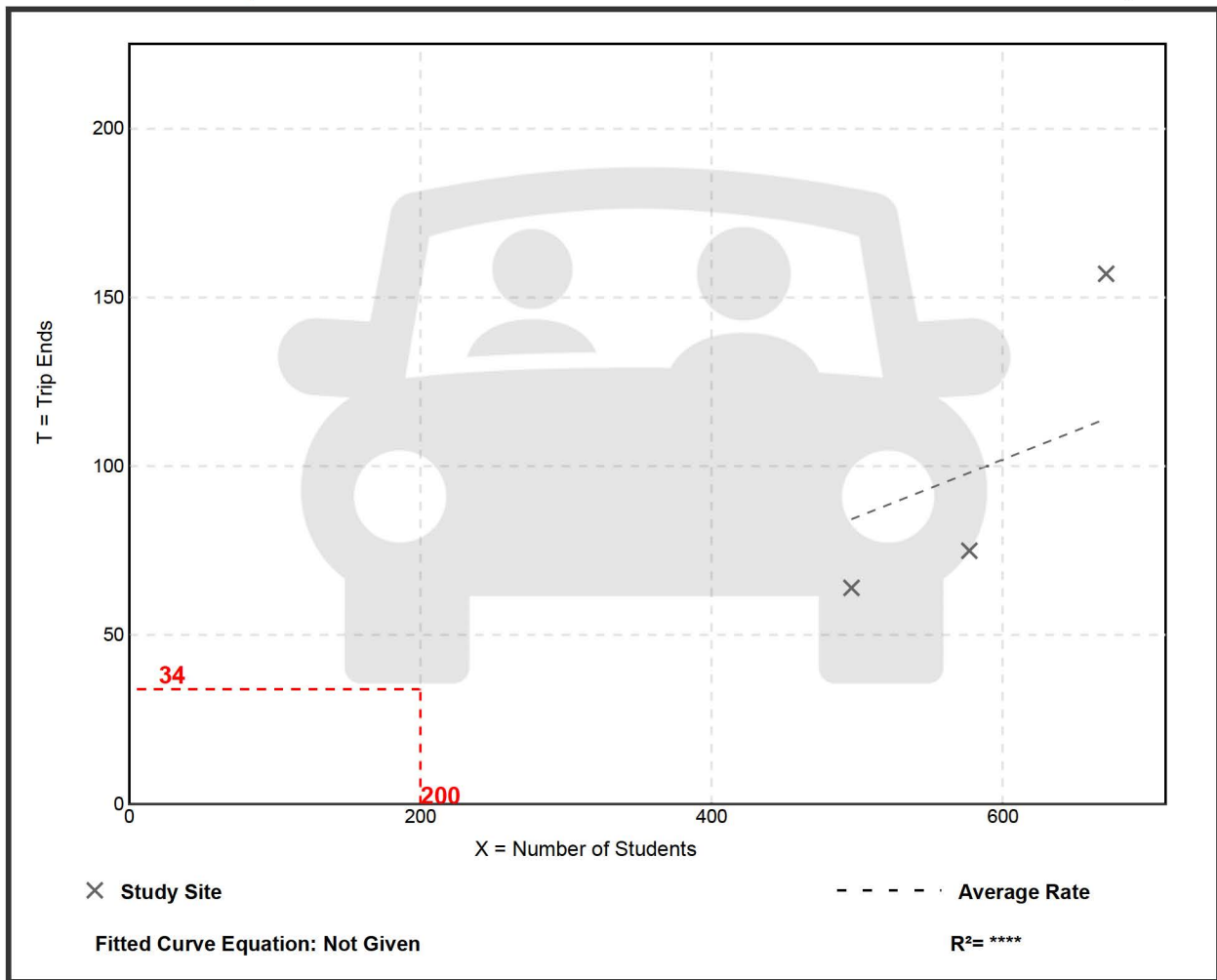
Vehicle Trip Ends vs: Students
 On a: Weekday,
 Peak Hour of Adjacent Street Traffic,
 One Hour Between 4 and 6 p.m.
 Setting/Location: General Urban/Suburban
 Number of Studies: 3
 Avg. Num. of Students: 581
 Directional Distribution: 43% entering, 57% exiting

Vehicle Trip Generation per Student

Average Rate	Range of Rates	Standard Deviation
0.17	0.13 - 0.23	0.06

Data Plot and Equation

Caution – Small Sample Size



General Office Building (710)

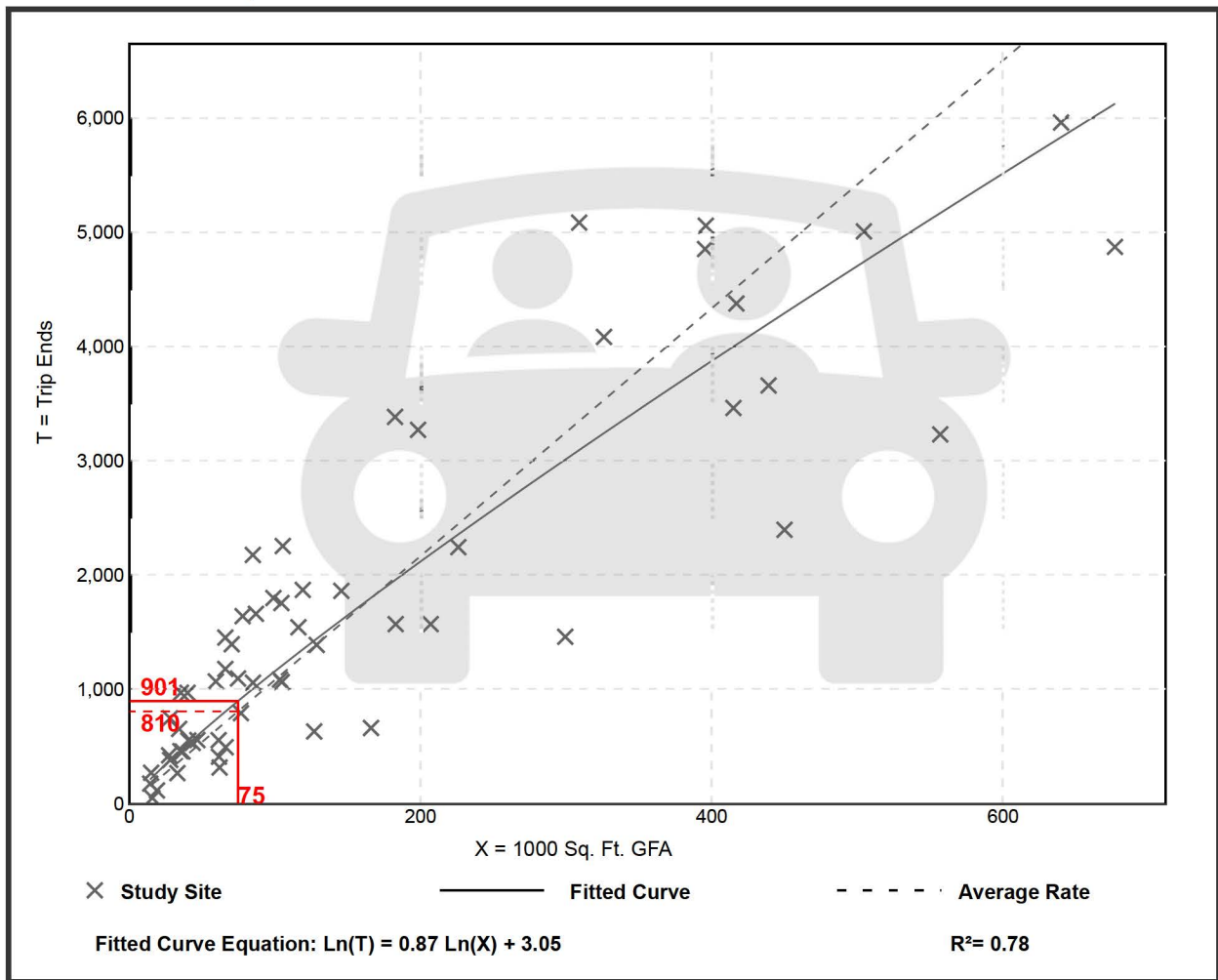
Vehicle Trip Ends vs: 1000 Sq. Ft. GFA
On a: Weekday

Setting/Location: General Urban/Suburban
Number of Studies: 59
Avg. 1000 Sq. Ft. GFA: 163
Directional Distribution: 50% entering, 50% exiting

Vehicle Trip Generation per 1000 Sq. Ft. GFA

Average Rate	Range of Rates	Standard Deviation
10.84	3.27 - 27.56	4.76

Data Plot and Equation



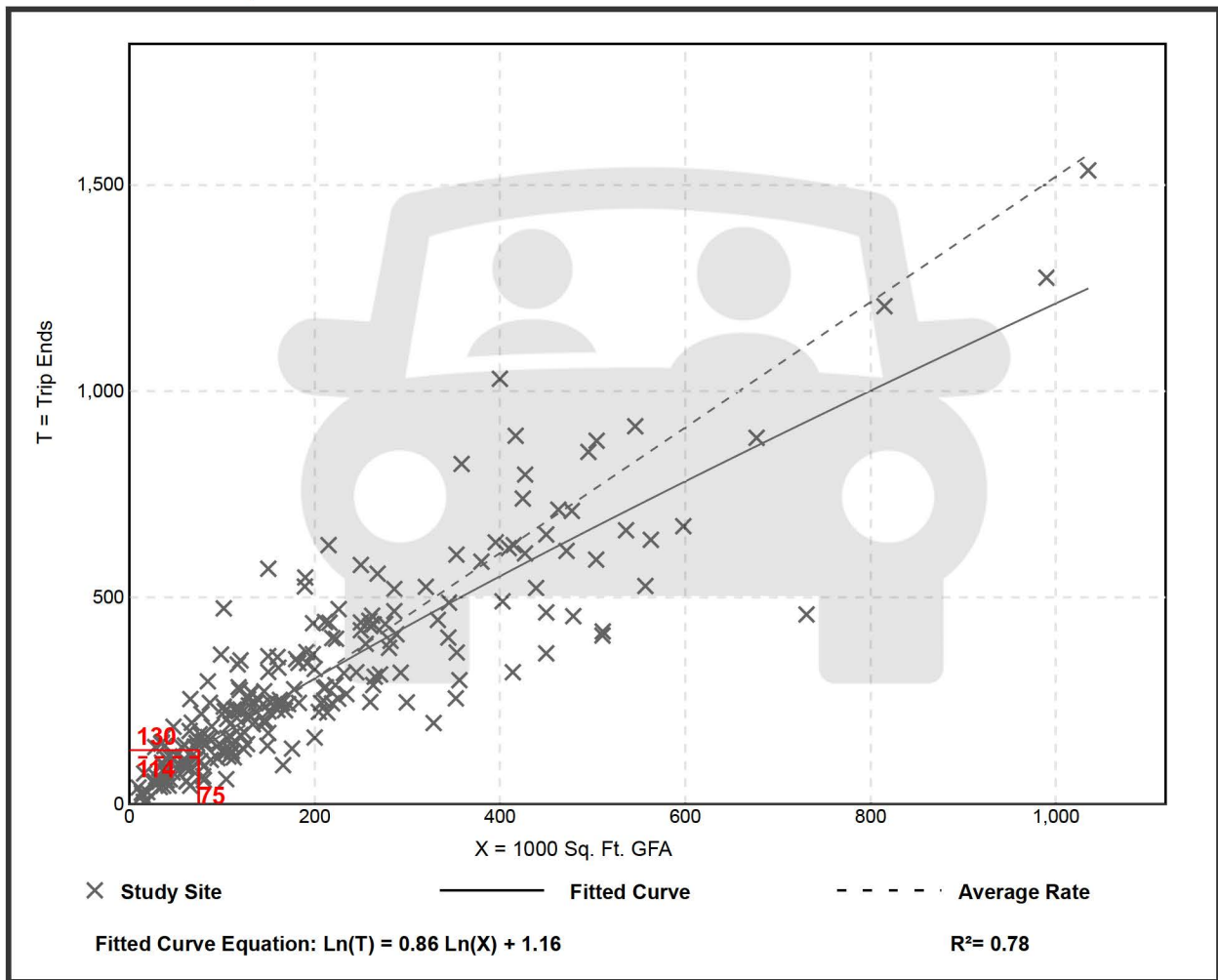
General Office Building (710)

Vehicle Trip Ends vs: 1000 Sq. Ft. GFA
 On a: Weekday,
 Peak Hour of Adjacent Street Traffic,
 One Hour Between 7 and 9 a.m.
 Setting/Location: General Urban/Suburban
 Number of Studies: 221
 Avg. 1000 Sq. Ft. GFA: 201
 Directional Distribution: 88% entering, 12% exiting

Vehicle Trip Generation per 1000 Sq. Ft. GFA

Average Rate	Range of Rates	Standard Deviation
1.52	0.32 - 4.93	0.58

Data Plot and Equation



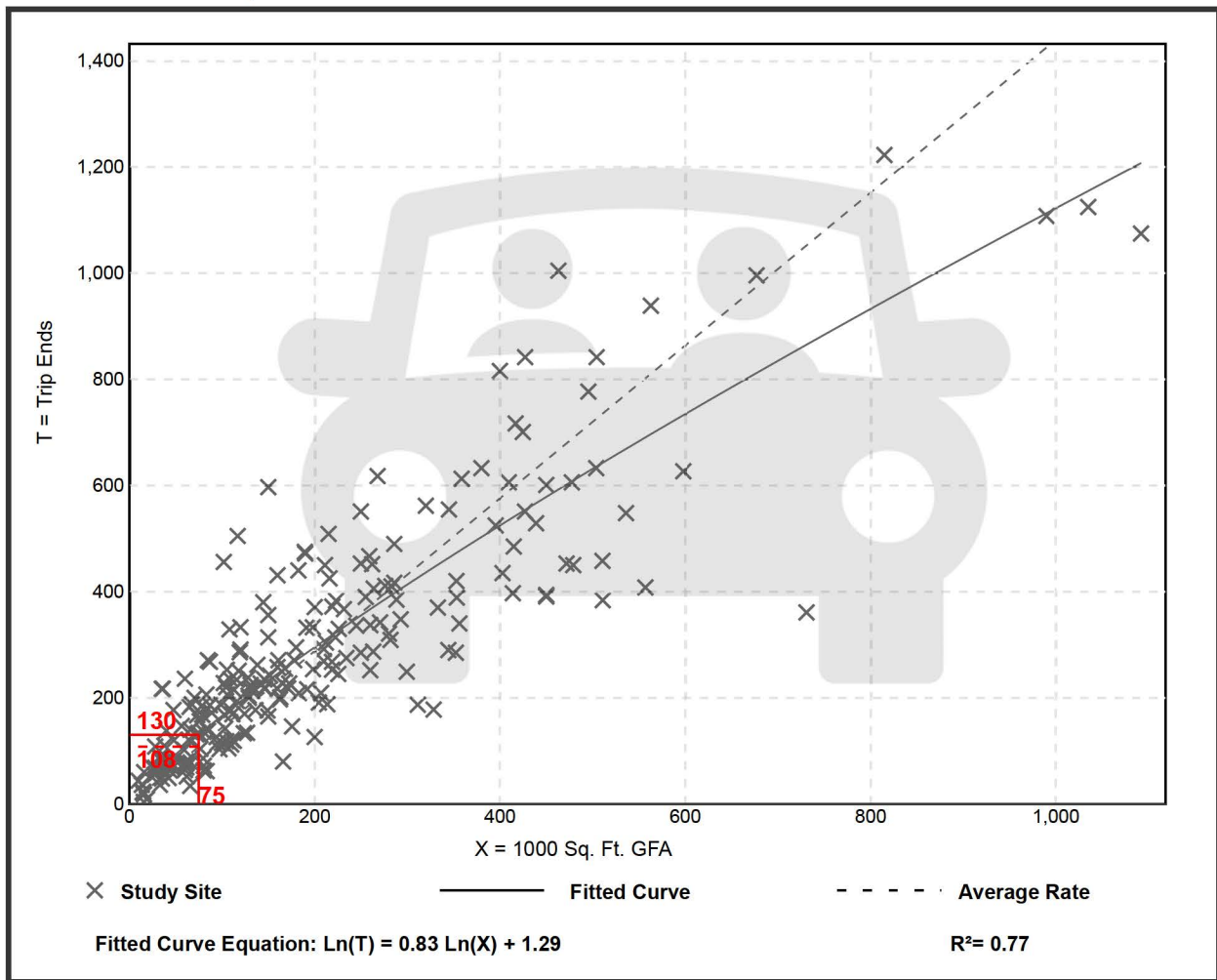
General Office Building (710)

Vehicle Trip Ends vs: 1000 Sq. Ft. GFA
 On a: Weekday,
 Peak Hour of Adjacent Street Traffic,
 One Hour Between 4 and 6 p.m.
 Setting/Location: General Urban/Suburban
 Number of Studies: 232
 Avg. 1000 Sq. Ft. GFA: 199
 Directional Distribution: 17% entering, 83% exiting

Vehicle Trip Generation per 1000 Sq. Ft. GFA

Average Rate	Range of Rates	Standard Deviation
1.44	0.26 - 6.20	0.60

Data Plot and Equation



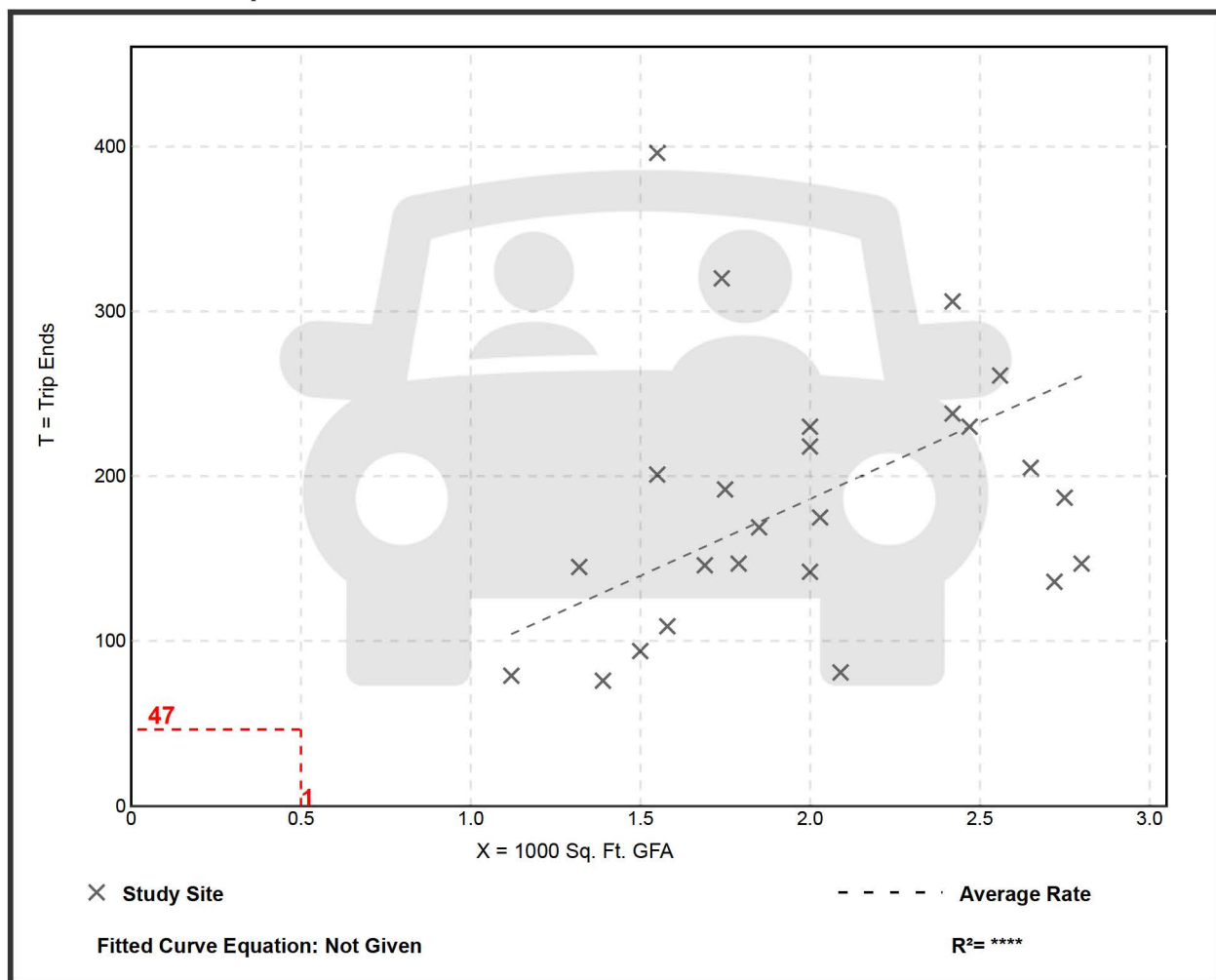
Coffee/Donut Shop without Drive-Through Window (936)

Vehicle Trip Ends vs: 1000 Sq. Ft. GFA
 On a: Weekday,
 Peak Hour of Adjacent Street Traffic,
 One Hour Between 7 and 9 a.m.
 Setting/Location: General Urban/Suburban
 Number of Studies: 25
 Avg. 1000 Sq. Ft. GFA: 2
 Directional Distribution: 51% entering, 49% exiting

Vehicle Trip Generation per 1000 Sq. Ft. GFA

Average Rate	Range of Rates	Standard Deviation
93.08	38.76 - 255.48	42.71

Data Plot and Equation



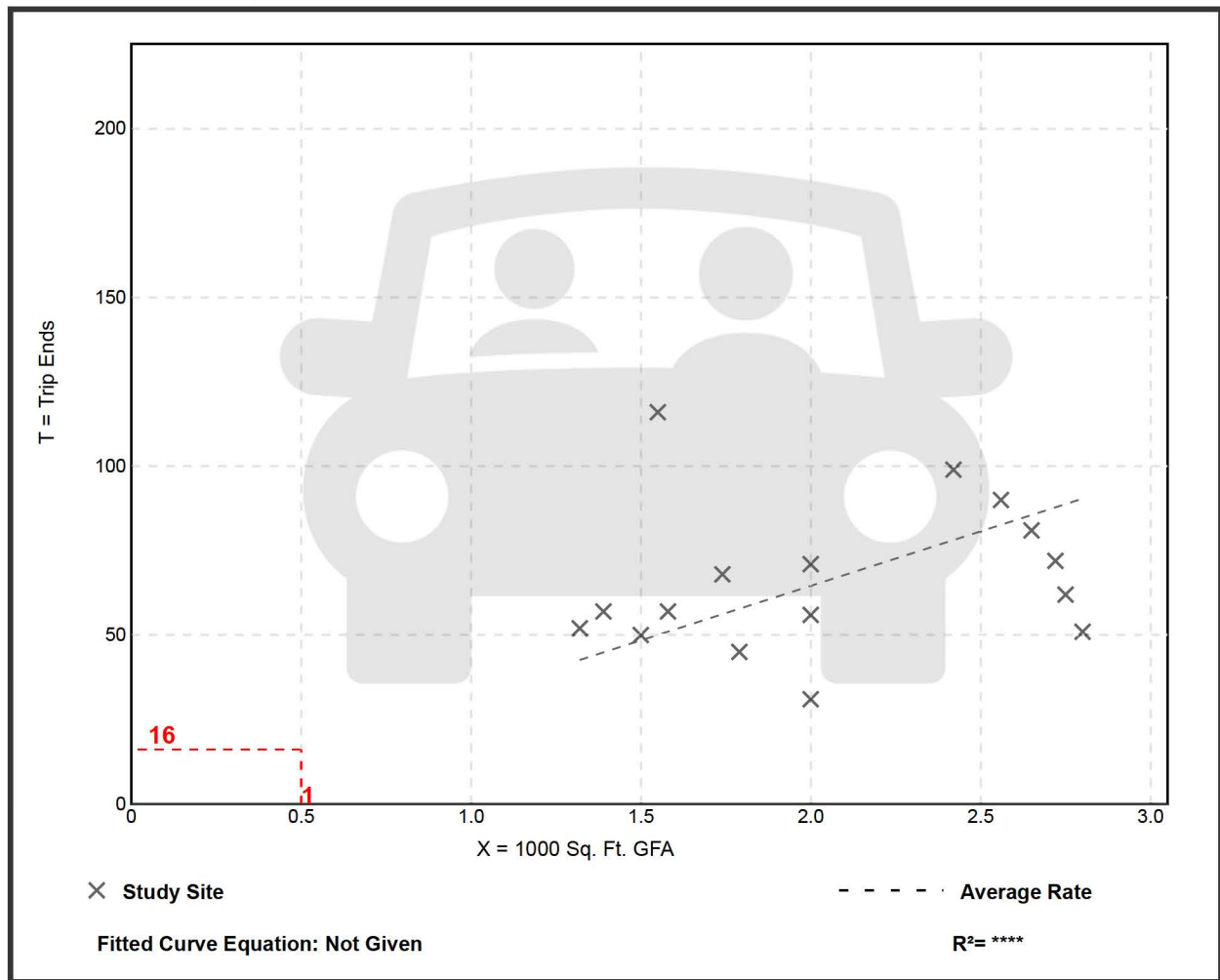
Coffee/Donut Shop without Drive-Through Window (936)

Vehicle Trip Ends vs: 1000 Sq. Ft. GFA
 On a: Weekday,
 Peak Hour of Adjacent Street Traffic,
 One Hour Between 4 and 6 p.m.
 Setting/Location: General Urban/Suburban
 Number of Studies: 16
 Avg. 1000 Sq. Ft. GFA: 2
 Directional Distribution: 50% entering, 50% exiting

Vehicle Trip Generation per 1000 Sq. Ft. GFA

Average Rate	Range of Rates	Standard Deviation
32.29	15.50 - 74.84	12.64

Data Plot and Equation



APPENDIX B

SCREENING CRITERIA



TAG SCREENING CRITERIA

If the answer is yes to any of the following threshold questions, further analysis will be required for that question to assess whether the proposed Project would negatively affect the transportation system for all travel modes including pedestrian, bicycle, or transit facilities.

Screening Criteria	Determination
Threshold T-1 Conflicting with Plans, Programs, Ordinances, or Policies	
Does the project require a discretionary action that requires the decision maker to find that the decision substantially conforms to the purpose, intent, and provisions of the General Plan?	Yes , Project is requesting Zone Change and Height District change, Site Plan Review, and Zoning Administrators Adjustment.
Is the project known to directly conflict with a transportation plan, policy, or program adopted to support multimodal transportation options or public safety?	Yes , the Project will inconsistent be with the Mobility Plan 2035. A waiver to dedicate and improve will be requested for La Mirada Av & Lexington Avenue and waiver to improve requested for Cahuenga Boulevard.
Is the Project proposing to, or required to, make any voluntary or required, modifications to the public right-of-way (i.e. street dedications, reconfigurations of curb lines, etc.)?	Yes , according to the BOE PCRF & Mobility Element street dedication and improvements are shown below. • La Mirada Avenue – 5-foot dedication and 3-foot widening; • Lexington Avenue – variable dedication and 3-foot widening; • Cahuenga Boulevard – 1-foot widening; and, • Southeast Corner of Cahuenga Boulevard & La Mirada Avenue – Construction of 15-foot by 15-foot corner cut or 20-foot radius dedication. A WDI will be requested.
Threshold T-2.1 Causing Substantial Vehicle Miles Traveled – Would the project conflict or would it be inconsistent with California Environmental Quality Act (CEQA) Guidelines section 15064.3 subdivision (b)(1)?	
Would the Project generate a net increase of 250 or more daily vehicle trips?	Yes , using the LADOT VMT calculator (version 1.3) for screening purposes, the Project will generate an increase of 259 more daily vehicle trips without any Transportation Demand Management (TDM) strategies. TDM strategies are not considered in the screening criteria.



Would the project generate a net increase in daily VMT?	Yes , using the LADOT VMT calculator, the Project would generate 2,271 daily VMT. TDM strategies are not considered in the screening criteria.
If the project includes retail uses, does the retail portion of the project exceed a net 50,000 square feet?	No , the Project will provide 500 square feet of Retail/Restaurant.
Would the Project located within a one-half mile of a fixed-rail or fixed-guideway transit station replace an existing number of residential units with a smaller number of residential units?	No , the location of the Project is not within a half mile of a fixed rail or fixed guideway transit station.
Threshold T- 3.1: Substantially Increasing Hazards Due to a Geometric Design Feature or Incompatible Use	
Is the Project proposing new driveways, or introducing new vehicle access to the property from the public right-of-way?	Yes , the Project will provide access with one new driveway on La Mirada Av, one new driveway Lexington Av and use of an existing on Lexington Av. Two driveways on Lexington Av and one on La Mirada Av will be removed. This will provide one fewer driveway than now exists. No driveway is proposed from North Cahuenga Bl.
Is the Project proposing to, or required to make any voluntary or required, modifications to the public right-of-way (i.e., street dedications, reconfigurations of curb line, etc.)?	Yes , according to the BOE PCRF & Mobility Element street dedication and improvements are shown below. • La Mirada Avenue – 5-foot dedication and 3-foot widening; • Lexington Avenue – variable dedication and 3-foot widening; • Cahuenga Boulevard – 1-foot widening; and, • Southeast Corner of Cahuenga Boulevard & La Mirada Avenue – Construction of 15-foot by 15-foot corner cut or 20-foot radius dedication. A WDI will be requested.
Pedestrian, Bicycle and Transit Access Assessment (Non-CEQA Transportation Analysis)	
Does the land use project involve a discretionary action that would be	Yes , Project is requesting General Plan Amendment and Zone Change.



Overland Traffic Consultants, Inc.

under review by the Department of City Planning?	
Does the land use project include the construction, 50 dwelling units or guest rooms or combination thereof or 50,000 square feet of non-residential space?	Yes , the Project will include retention of 19,448 square feet of existing school space for a total 74,762 square feet of new office and 500 square feet of new retail/restaurant.
Would the Project generate a net increase of 1,000 or more daily vehicle trips? Is the Project's frontage along an Avenue, Boulevard or Collector (as designated in the City's General Plan) 250 linear feet or more, or is the Project's frontage encompassing an entire block along an Avenue or Boulevard (as designated in the City's General Plan)?	No , using the LADOT VMT calculator (version 1.3) for screening purposes, the Project will generate an increase of 259 more daily vehicle trips without any Transportation Demand Management (TDM) strategies.). The portion of Cahuenga Boulevard adjacent to the Project Site is designated as a Modified Avenue II roadway. The Project's Cahuenga Boulevard frontage is approximately 195 in length.
Project Access, Safety and Circulation Evaluation (Non-CEQA Transportation Analysis)	
Does the land use project involve a discretionary action that would be under review by the Department of Planning?	Yes , Project is requesting Zone Change and Height District change, Site Plan Review, and Zoning Administrators Adjustment.
Would the Project generate a net increase of 250 or more daily vehicle trips?	Yes , using the LADOT VMT calculator (version 1.3) for screening purposes, the Project will generate an increase of 259 more daily vehicle trips (572 Project trips minus 313 prior trips) without any Transportation Demand Management (TDM) strategies

APPENDIX C

PLANS, PROGRAMS, ORDINANCE AND POLICY CONSISTENCY Threshold Question T-1

Plans, Policies and Programs Consistency Worksheet

The worksheet provides a structured approach to evaluate the threshold T-1 question below that asks whether a project conflicts with a program, plan, ordinance, or policy addressing the circulation system. The intention of the worksheet is to streamline the project review by highlighting the most relevant plans, policies and programs when assessing potential impacts to the City's circulation system.

Threshold T-1: Would the project conflict with a program, plan, ordinance, or policy addressing the circulation system, including transit, roadways, bicycle, and pedestrian facilities?

I. SCREENING CRITERIA FOR POLICY ANALYSIS

If the answer is 'yes' to any of the following questions, further analysis will be required:

Does the project require a discretionary action that requires the decision maker to find that the project would substantially conform to the purpose, intent, and provisions of the General Plan?

Yes

Is the project known to directly conflict with a transportation plan, policy, or program adopted to support multimodal transportation options or public safety?

Yes

Is the project required to, or proposing to, make any voluntary modifications to the public right-of-way (i.e., dedications and/or improvements in the right-of-way, reconfigurations of curb line, etc.)?

Yes, a
WDI will be requested

II. PLAN CONSISTENCY ANALYSIS

A. Mobility Plan 2035 Classification Standards for Dedications and Improvements

A.1 Does the project include additions or new construction along a street designated as a Boulevard I, and II, and/or Avenue I, II, or III on property zoned for R3 or less restrictive zone?

No

A.2 Is the project required to make additional dedications or improvements to the Public Right of Way as demonstrated by the street designation?

Yes
a WDI will be requested

A.3 Is the project making the dedications and improvements as necessary to meet the designated dimensions of the fronting street (Boulevard I, and II, or Avenue I, II, or III)?



No, a
WDI will be requested

A.4 Is the project applicant asking to waive from the dedication standards?

Yes

Lists any streets subject to dedications or voluntary dedications and include existing roadway and sidewalk widths, required roadway and sidewalk widths, and proposed roadway and sidewalk width or waivers.

1. La Mirada Avenue – Local Street – Required 60' ROW and 36' Street (half 30' ROW & 18' half Street), Current: 25' half street ROW & 15' half street
Per BOE PCRf: 5' dedication and 3' roadway improvement required
2. Lexington Avenue – Local Street - Required 60' ROW and 36' Street (half 30' ROW & 18' half Street), Current: 25' half street ROW & 15' half street
Per BOE PCRf: variable dedication and 3' roadway improvement required
3. Cahuenga Boulevard – Modified Avenue II – Required 80' ROW and 56' Street (half 40' ROW & 28' half Street), Current: 40' -43' half street ROW & 27' half street,
Per BOE PCRf: 1' roadway improvement required

Is the project within the service area of Metro Bike Share, or is there demonstrated demand for micro- mobility services?

No

B. Mobility Plan 2035 Policy Alignment with Project-Initiated Changes

B.1 Does the project physically modify the curb placement or turning radius and/or physically alter the sidewalk and parkways space that changes how people access a property?

Yes

Examples of physical changes to the public right-of-way include:

- widening the roadway,
- narrowing the sidewalk,
- adding space for vehicle turn outs or loading areas,
- removing bicycle lanes, bike share stations, or bicycle parking
- modifying existing bus stop, transit shelter, or another street furniture
- paving, narrowing, shifting, or removing an existing parkway or tree well

Driveway Access

Mobility Plan 2035 Program PL.1. Driveway Access. Require driveway access to buildings from non-arterial streets or alleys (where feasible) to minimize interference with pedestrian access and vehicular movement.

Project is following PL-1 Driveway Access



Citywide Design Guidelines - Guideline 2: Carefully incorporate vehicular access such that it does not degrade the pedestrian experience.

Project is following Design Guideline 2

Site Planning Best Practices:

- Prioritize pedestrian access first and automobile access second. Orient parking and driveways toward the rear or side of buildings and away from the public right-of-way. On corner lots, parking should be oriented as far from the corner as possible.
- Minimize both the number of driveway entrances and overall driveway widths.
- Do not locate drop-off/pick-up areas between principal building entrances and the adjoining sidewalks.
- Orient vehicular access as far from street intersections as possible.
- Place drive-thru elements away from intersections and avoid placing them so that they create a barrier between the sidewalks and building entrance(s).
- Ensure that loading areas do not interfere with on-site pedestrian and vehicular circulation by separating loading areas and larger commercial vehicles from areas that are used for public parking and public entrances.

Project is following Site Planning Best Practices

B.2 Does the project add new driveways along a street designated as an Avenue or a Boulevard that conflict with LADOT's Driveway Design Guidelines (See Sec. 321 in the Manual of Policies and Procedures) by any of the following?

- Locating new driveways for residential properties on an Avenue or Boulevard, and access is otherwise possible using an alley or a collector/local street, or
- Locating new driveways for industrial or commercial properties on an Avenue or Boulevard and access is possible along a collector/local street, or
- The total number of new driveways exceeds 1 driveway per every 200 feet along on the Avenue or Boulevard frontage, or
- Locating new driveways on an Avenue or Boulevard within 150 feet from the intersecting street, or
- Locating new driveways on a collector or local street within 75 feet from the intersecting street, or
- Locating new driveways near mid-block crosswalks, requiring relocation of the mid-block crosswalk

Project is following Driveway Design Guidelines

Impact Analysis

Once the project is reviewed relevant to plans and policies, and existing facilities that may be impacted by the project, the analysis will need to answer the following two questions in concluding if there is an impact due to plan inconsistency.

B.2.1 Would the physical changes in the public right of way or new driveways that

conflict with LADOT's Driveway Design Guidelines degrade the experience of vulnerable roadway users such as modify, remove, or otherwise negatively impact existing bicycle, transit, and/or pedestrian infrastructure?

No

B.2.2 Would the physical modifications or new driveways that conflict with LADOT's Driveway Design Guidelines preclude the City from advancing the safety of vulnerable roadway users?

No

C. Network Access

C. 1 Alley, Street and Stairway Access

C.1.1 Does the project propose to vacate or otherwise restrict public access to a street, alley, or public stairway?

No

C.2 New Cul-de-sacs

C.2.1 Does the project create a cul-de-sac or is the project located adjacent to an existing cul-de-sac?

No

C.2.2 If yes, will the cul-de-sac maintain convenient and direct public access to people walking and biking to the adjoining street network?

N/A

D. Parking Supply and Transportation Demand Management

D.1 Would the project propose a supply of onsite parking that exceeds the baseline amount as required in the Los Angeles Municipal Code or a Specific plan, whichever requirement prevails?

No

D.2 Would the project propose to actively manage the demand of parking by independently pricing the supply to all users (e.g. parking cash-out), or for residential properties, unbundle the supply from the lease or sale of residential units?

No

D.3. Would the project provide the minimum on and off-site bicycle parking spaces as required by Section 12.21 A.16 of the LAMC?

Yes

D.4. Does the Project include more than 25,000 square feet of gross floor area construction of new non- residential gross floor?

Yes

D.5 Does the project comply with the City's TDM Ordinance in Section 12.26 J of the LAMC?

Yes

E. Consistency with Regional Plans

This section addresses potential inconsistencies with greenhouse gas (GHG) reduction

targets forecasted in the Southern California Association of Governments (SCAG) Regional Transportation Plan (RTP) / Sustainable Communities Strategy (SCS).

- E.1 Does the Project apply one the City's efficiency-based impact thresholds (i.e. VMT per capita, VMT per employee, or VMT per service population) as discussed in Section 2.2.3 of the TAG? Yes
- E.2 Does the Project or Plan result in a significant VMT impact? No
- E.3 Does the Project result in a net increase in VMT? Yes

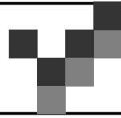
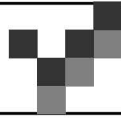
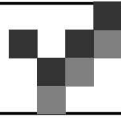


Table 2.1-2 Questions to Determine Project Applicability to Plans, Policies and Programs

1.	Does the project include additions or new construction along a street designated as a Boulevard I, II and/or Avenue I, II or III on property zoned for R3 or less restrictive zone?	LAMC Section 12.37 Highway and Collector Street Dedication and Improvement		No, the site is to be developed along North Cahuenga Boulevard, a Modified Avenue II roadway, but the site is not zoned R3
2.	Is project site along any network identified in the City's Mobility Plan?	MP 2.3 through 2.7		Yes
		MP 2.3 Pedestrian Infrastructure (Map F)		North Cahuenga Boulevard, along the Project frontage, is part of the PED Network. The Project has been designed to improve the landscaping and disrepair of pedestrian sidewalk providing a safe walkable sidewalk on this portion of the roadway.
		MP 2.4 Neighborhood Enhanced Network (Map C4)		No Project street frontages are part of the NEN. The Project is not proposing any changes along any streets that would prevent the City from installing additional features as part of the NEN, nor does the Project propose to modify any streets that would increase travel speeds on the neighborhood network.
		MP 2.5 Transit Network (Map B)		The Project is not located on any TEN roadways. The Project does not propose to remove or modify transit facilities in a manner that would negatively impact the reliability of existing transit service.
		MP 2.6 Bicycle Network (Map D2)		No, however Vine Street to the east is designated a Tier 2 BEN.
		MP 2.7 Vehicle Network (Map E)		The Project street frontages are not part of the VEN
3.	Are dedications or improvements needed to serve long-term mobility needs identified in the Mobility Plan 2035?	MP - Street Classifications; MP- Street Designations & Standard Roadway Dimensions	MP - 2.17 Street Widening	Yes, according to the BOE PCRF & Mobility Element street dedication and improvements are shown below. • La Mirada Avenue – 5-foot dedication and 3-foot widening; • Lexington Avenue – variable dedication and 3-foot widening; • Cahuenga Boulevard – 1-foot widening; and, • Southeast Corner of Cahuenga Boulevard & La Mirada Avenue – Construction of 15-foot by 15-foot corner cut or 20-foot radius dedication. A WDI will be requested.



4.	Does the project require placement of transit furniture in accordance with City's Coordinated Street Furniture and Bus Bench Program?			No
5.	Is project site in an identified Transit Oriented Community (TOC)?	MP - TEN; MP - PED; MP - BEN; TOC Guidelines		Yes
6.	Is project site on a roadway identified in City's High Injury Network?	Vision Zero	Mobility Plan 2035	No
7.	Does project propose repurposing existing curb space? (Bike corral, car-sharing, parklet, electric vehicle charging, loading zone, curb extension, etc.)	MP – 2.1 Adaptive Reuse of Streets; MP – 2.10 Loading Areas; MP – 3.5 Multi-Modal Features; MP – 3.8 Bicycle Parking; MP – 4.13 Parking & Land Use Management; MP – 5.4 Clean Fuels & Vehicles	MP – 2.3 Pedestrian Infrastructure; MP – 2.4 Neighborhood Enhanced Network; MP – 3.2 People with Disabilities; MP -4.1 New Technologies; MP 5.1 Substantial Transportation; MP – 5.5 Green Streets	No
8.	Does project propose paving, narrowing, shifting, or removing an existing parkway?	MP - 5.5 Green Streets; Sustainability Plan		No
9.	Does project propose modifying, removing or otherwise affect existing bicycle infrastructure? (ex: driveway proposed along street with bicycle facility)	MP- BEN; MP - 4.15 Public Hearing Process	Vision Zero	No
10.	Is project site adjacent to an alley? If yes, will project make use of, modify, or restrict alley access?	MP - 3.9 Increased Network Access; MP - ENG.9; MP - PL.1; MP - PL.13; MP - PS.3		No
11.	Does project create a cul-de-sac or is project site located adjacent to existing cul-de-sac? If yes, is cul-de-sac consistent with design goal in Mobility Plan 2035 (maintain through bicycle and pedestrian access)?	MP - 3.10 Cul-de-sacs		No, Not applicable
ACCESS: DRIVEWAYS AND LOADING				
12.	Does project site introduce a new driveway or loading access along an arterial (Avenue or Boulevard)?	MO - PL.1; MP - PK.10, CDG 4.1.02	Vision Zero	No
13.	If yes to 13, Is a non-arterial frontage or alley access available to serve the	MP - PL.1; MPP 321	Vision Zero	Not applicable



	driveway or loading access needs?			
14.	Does project site include a corner lot? (avoid driveways too close to intersections)	CDG 4.1.01		Yes. No driveways will be close to the intersections per MP&P
15.	Does project propose driveway width more than City standard?	MPP Sec. 321	Vision Zero; Sustainability Plan, MP - PED, MP - BEN; CDG 4.1.04	No
16.	Does project propose more driveways than permitted by the City maximum standard?	MPP - Sec No. 321 Driveway Design	Vision Zero; Healthy LA	No
17.	Are loading zones proposed as part of the project?	MP - 2.1 Loading Areas; MP - PK.1; MP - PK.7; MP - PK.8; MPP 321		No
18.	Does project include "drop-off" zones or areas? If yes, are such areas located to the side or rear of the buildings?	MP - 2.10 Loading Areas		No
19.	Does project propose modifying, limiting/restricting, or removing public access to a public right-of-way (e.g. vacating public right-of-way?)	MP - 2.3 Pedestrian Infrastructure; MP - 3.9 Increased Network Access		No

ATTACHMENT D.1: CITY PLAN, POLICIES AND GUIDELINES

The Transportation Element of the City's General Plan, Mobility Plan 2035, established the "Complete Streets Design Guide" as the City's document to guide the operations and design of streets and other public rights-of-way. It lays out a vision for designing safer, more vibrant streets that are accessible to people, no matter what their mode choice. As a living document, it is intended to be frequently updated as City departments identify and implement street standards and experiment with different configurations to promote complete streets. The guide is meant to be a toolkit that provides numerous examples of what is possible in the public right-of-way and that provides guidance on context-sensitive design.

The Plan for A Healthy Los Angeles (March 2015) includes policies directing several City departments to develop plans that promote active transportation and safety.

The City of Los Angeles Community Plans, which make up the Land Use Element of the City's General Plan, guide the physical development of neighborhoods by establishing the goals and policies for land use. The 35 Community Plans provide specific, neighborhood-level detail for land uses and the transportation network, relevant policies, and implementation strategies necessary to achieve General Plan and community-specific objectives.

The stated goal of Vision Zero is to eliminate traffic-related deaths in Los Angeles by 2025 through several strategies, including modifying the design of streets to increase the safety of vulnerable road users. Extensive crash data analysis is conducted on an ongoing basis to prioritize intersections and corridors for implementation of projects that will have the greatest effect on overall fatality reduction. The City designs and deploys Vision Zero Corridor Plans as part of the implementation of Vision Zero. If a project is proposed whose site lies on the High Injury Network (HIN), the applicant should consult with LADOT to inform the project's site plan and to determine appropriate improvements, whether by funding their implementation in full or by making a contribution toward their implementation.

The Citywide Design Guidelines (October 24, 2019) includes sections relevant to development projects where improvements are proposed within the public realm. Specifically, Guidelines one through three provide building design strategies that support the pedestrian experience. The Guidelines provide best practices in designing that apply in three spatial categories of site planning, building design and public right of way. The Guidelines should be followed to ensure that the project design supports pedestrian safety, access, and comfort as they access to and from the building and the immediate public right of way.

The City's Transportation Demand Management (TDM) Ordinance (LA Municipal Code 12.26.J) requires certain projects to incorporate strategies that reduce drive-alone vehicle trips and improve access to destinations and services. The ordinance is revised and updated periodically and should be reviewed for application to specific projects as they are reviewed.

The City's LAMC Section 12.37 (Waivers of Dedication and Improvement) requires certain



projects to dedicate and/or implement improvements within the public right-of-way to meet the street designation standards of the Mobility Plan 2035.

The Bureau of Engineering (BOE) Street Standard Dimensions S-470-1 provides the specific street widths and public right of way dimensions associated with the City's street standards.



APPENDIX D

VMT ANALYSIS WORKSHEETS

CITY OF LOS ANGELES VMT CALCULATOR Version 1.3



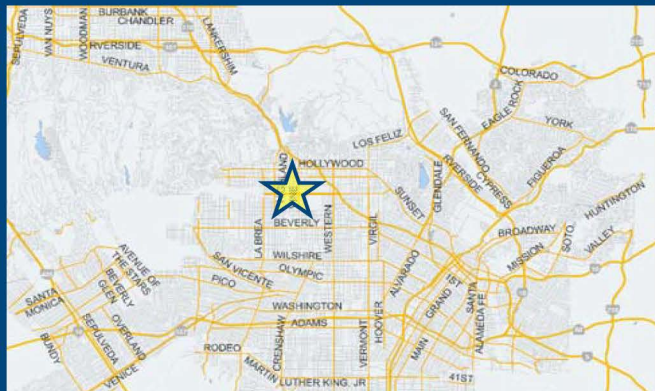
Project Screening Criteria: Is this project required to conduct a vehicle miles traveled analysis?

Project Information

Project:

Scenario:

Address:



Is the project replacing an existing number of residential units with a smaller number of residential units AND is located within one-half mile of a fixed-rail or fixed-guideway transit station?

☒ Yes ☐ No

Existing Land Use

Land Use Type	Value	Unit
School Private School (K-12)		Students +
School Private School (K-12)	200	Students

☐ Click here to add a single custom land use type (will be included in the above list)

Proposed Project Land Use

Land Use Type	Value	Unit
Office General Office	74.762	ksf +
Retail General Retail	0.5	ksf
Office General Office	74.762	ksf

☐ Click here to add a single custom land use type (will be included in the above list)

Project Screening Summary

Existing Land Use	Proposed Project
313 Daily Vehicle Trips	572 Daily Vehicle Trips
1,919 Daily VMT	4,190 Daily VMT

Tier 1 Screening Criteria

Project will have less residential units compared to existing residential units & is within one-half mile of a fixed-rail station. ☐

Tier 2 Screening Criteria

The net increase in daily trips < 250 trips 259
Net Daily Trips

The net increase in daily VMT ≤ 0 2,271
Net Daily VMT

The proposed project consists of only retail land uses ≤ 50,000 square feet total. 0.500
ksf

The proposed project is required to perform VMT analysis.



CITY OF LOS ANGELES VMT CALCULATOR Version 1.3

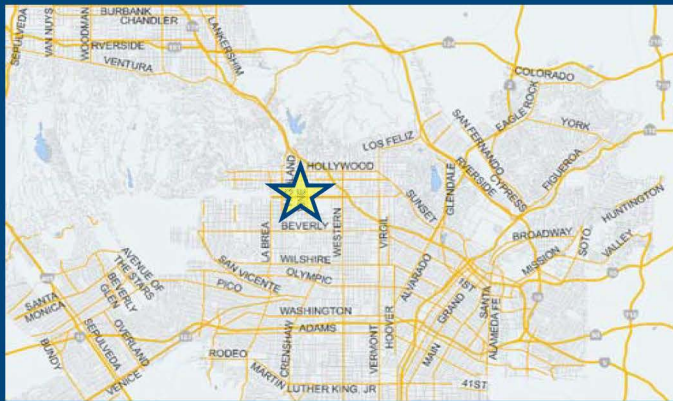


Project Information

Project:

Scenario:

Address:



Proposed Project Land Use Type	Value	Unit
Retail General Retail	0.5	ksf
Office General Office	74.762	ksf

TDM Strategies

Select each section to show individual strategies
Use ☒ to denote if the TDM strategy is part of the proposed project or is a mitigation strategy

	Proposed Project	With Mitigation
Max Home Based TDM Achieved?	No	No
Max Work Based TDM Achieved?	No	No
A Parking		
B Transit		
C Education & Encouragement		
D Commute Trip Reductions		
E Shared Mobility		
F Bicycle Infrastructure		
Implement/Improve On-street Bicycle Facility Select Proposed Prj or Mitigation to include this strategy		
☐ Proposed Prj ☐ Mitigation		
Include Bike Parking Per LAMC Select Proposed Prj or Mitigation to include this strategy		
☒ Proposed Prj ☐ Mitigation		
Include Secure Bike Parking and Showers Select Proposed Prj or Mitigation to include this strategy		
☒ Proposed Prj ☐ Mitigation		
G Neighborhood Enhancement		

Analysis Results

Proposed Project	With Mitigation
566 Daily Vehicle Trips	566 Daily Vehicle Trips
4,138 Daily VMT	4,138 Daily VMT
0.0 Household VMT per Capita	0.0 Household VMT per Capita
7.6 Work VMT per Employee	7.6 Work VMT per Employee

Significant VMT Impact?

Household: No Threshold = 6.0 15% Below APC	Household: No Threshold = 6.0 15% Below APC
Work: No Threshold = 7.6 15% Below APC	Work: No Threshold = 7.6 15% Below APC



CITY OF LOS ANGELES VMT CALCULATOR

Report 1: Project & Analysis Overview

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

Project Information			
Land Use Type		Value	Units
Housing	Single Family	0	DU
	Multi Family	0	DU
	Townhouse	0	DU
	Hotel	0	Rooms
	Motel	0	Rooms
Affordable Housing	Family	0	DU
	Senior	0	DU
	Special Needs	0	DU
	Permanent Supportive	0	DU
Retail	General Retail	0.500	ksf
	Furniture Store	0.000	ksf
	Pharmacy/Drugstore	0.000	ksf
	Supermarket	0.000	ksf
	Bank	0.000	ksf
	Health Club	0.000	ksf
	High-Turnover Sit-Down	0.000	ksf
	Restaurant	0.000	ksf
	Fast-Food Restaurant	0.000	ksf
	Quality Restaurant	0.000	ksf
	Auto Repair	0.000	ksf
	Home Improvement	0.000	ksf
	Free-Standing Discount	0.000	ksf
	Movie Theater	0	Seats
Office	General Office	74.762	ksf
	Medical Office	0.000	ksf
Industrial	Light Industrial	0.000	ksf
	Manufacturing	0.000	ksf
	Warehousing/Self-Storage	0.000	ksf
School	University	0	Students
	High School	0	Students
	Middle School	0	Students
	Elementary	0	Students
	Private School (K-12)	0	Students
Other		0	Trips

Project and Analysis Overview

CITY OF LOS ANGELES VMT CALCULATOR

Report 1: Project & Analysis Overview

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

Analysis Results			
Total Employees: 300			
Total Population: 0			
Proposed Project		With Mitigation	
566	Daily Vehicle Trips	566	Daily Vehicle Trips
4,138	Daily VMT	4,138	Daily VMT
0	Household VMT per Capita	0	Household VMT per Capita
7.6	Work VMT per Employee	7.6	Work VMT per Employee
Significant VMT Impact?			
APC: Central			
Impact Threshold: 15% Below APC Average			
Household = 6.0			
Work = 7.6			
Proposed Project		With Mitigation	
VMT Threshold	Impact	VMT Threshold	Impact
Household > 6.0	No	Household > 6.0	No
Work > 7.6	No	Work > 7.6	No

CITY OF LOS ANGELES VMT CALCULATOR

Report 2: TDM Inputs

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

TDM Strategy Inputs				
Strategy Type		Description	Proposed Project	Mitigations
Parking	Reduce parking supply	City code parking provision (spaces)	0	0
		Actual parking provision (spaces)	0	0
	Unbundle parking	Monthly cost for parking (\$)	\$0	\$0
	Parking cash-out	Employees eligible (%)	0%	0%
	Price workplace parking	Daily parking charge (\$)	\$0.00	\$0.00
		Employees subject to priced parking (%)	0%	0%
	Residential area parking permits	Cost of annual permit (\$)	\$0	\$0
(cont. on following page)				

CITY OF LOS ANGELES VMT CALCULATOR

Report 2: TDM Inputs

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

TDM Strategy Inputs, Cont.				
Strategy Type		Description	Proposed Project	Mitigations
Transit	Reduce transit headways	Reduction in headways (increase in frequency) (%)	0%	0%
		Existing transit mode share (as a percent of total daily trips) (%)	0%	0%
		Lines within project site improved (<50%, >=50%)	0	0
	Implement neighborhood shuttle	Degree of implementation (low, medium, high)	0	0
		Employees and residents eligible (%)	0%	0%
	Transit subsidies	Employees and residents eligible (%)	0%	0%
Amount of transit subsidy per passenger (daily equivalent) (\$)		\$0.00	\$0.00	
Education & Encouragement	Voluntary travel behavior change program	Employees and residents participating (%)	0%	0%
	Promotions and marketing	Employees and residents participating (%)	0%	0%
(cont. on following page)				

CITY OF LOS ANGELES VMT CALCULATOR

Report 2: TDM Inputs

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

TDM Strategy Inputs, Cont.				
Strategy Type		Description	Proposed Project	Mitigations
Commute Trip Reductions	Required commute trip reduction program	Employees participating (%)	0%	0%
	Alternative Work Schedules and Telecommute	Employees participating (%)	0%	0%
		Type of program	0	0
		Degree of implementation (low, medium, high)	0	0
	Employer sponsored vanpool or shuttle	Employees eligible (%)	0%	0%
		Employer size (small, medium, large)	0	0
	Ride-share program	Employees eligible (%)	0%	0%
Shared Mobility	Car share	Car share project setting (Urban, Suburban, All Other)	0	0
	Bike share	Within 600 feet of existing bike share station - OR- implementing new bike share station (Yes/No)	0	0
	School carpool program	Level of implementation (Low, Medium, High)	0	0
(cont. on following page)				

CITY OF LOS ANGELES VMT CALCULATOR

Report 2: TDM Inputs

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

TDM Strategy Inputs, Cont.				
Strategy Type		Description	Proposed Project	Mitigations
Bicycle Infrastructure	<i>Implement/Improve on-street bicycle facility</i>	<i>Provide bicycle facility along site (Yes/No)</i>	0	0
	Include Bike parking per LAMC	Meets City Bike Parking Code (Yes/No)	Yes	Yes
	Include secure bike parking and showers	Includes indoor bike parking/lockers, showers, & repair station (Yes/No)	Yes	Yes
Neighborhood Enhancement	<i>Traffic calming improvements</i>	<i>Streets with traffic calming improvements (%)</i>	0%	0%
		<i>Intersections with traffic calming improvements (%)</i>	0%	0%
	<i>Pedestrian network improvements</i>	<i>Included (within project and connecting off-site/within project only)</i>	0	0

CITY OF LOS ANGELES VMT CALCULATOR

Report 3: TDM Outputs

Date: November 4, 2021
 Project Name: Creative Office
 Project Scenario:
 Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

TDM Adjustments by Trip Purpose & Strategy

Place type: Urban

		Home Based Work Production		Home Based Work Attraction		Home Based Other Production		Home Based Other Attraction		Non-Home Based Other Production		Non-Home Based Other Attraction		Source
		Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	
Parking	Reduce parking supply	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	TDM Strategy Appendix, Parking sections 1 - 5
	Unbundle parking	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
	Parking cash-out	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
	Price workplace parking	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
	Residential area parking permits	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	
Transit	Reduce transit headways	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	TDM Strategy Appendix, Transit sections 1 - 3
	Implement neighborhood shuttle	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
	Transit subsidies	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
Education & Encouragement	Voluntary travel behavior change program	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	TDM Strategy Appendix, Education & Encouragement sections 1 - 2
	Promotions and marketing	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
Commute Trip Reductions	Required commute trip reduction program	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	TDM Strategy Appendix, Commute Trip Reductions sections 1 - 4
	Alternative Work Schedules and Telecommute Program	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
	Employer sponsored vanpool or shuttle	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
	Ride-share program	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
Shared Mobility	Car-share	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	TDM Strategy Appendix, Shared Mobility sections 1 - 3
	Bike share	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	
	School carpool program	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	

CITY OF LOS ANGELES VMT CALCULATOR

Report 3: TDM Outputs

Date: November 4, 2021
 Project Name: Creative Office
 Project Scenario:
 Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

TDM Adjustments by Trip Purpose & Strategy, Cont.

Place type: Urban

		Home Based Work Production		Home Based Work Attraction		Home Based Other Production		Home Based Other Attraction		Non-Home Based Other Production		Non-Home Based Other Attraction		Source
		Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	
Bicycle Infrastructure	Implement/ Improve on-street bicycle facility	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	TDM Strategy Appendix, Bicycle Infrastructure sections 1 - 3
	Include Bike parking per LAMC	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	
	Include secure bike parking and showers	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	
Neighborhood Enhancement	Traffic calming improvements	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	TDM Strategy Appendix, Neighborhood Enhancement sections 1 - 2
	Pedestrian network improvements	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	

Final Combined & Maximum TDM Effect

		Home Based Work Production		Home Based Work Attraction		Home Based Other Production		Home Based Other Attraction		Non-Home Based Other Production		Non-Home Based Other Attraction	
		Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated	Proposed	Mitigated
COMBINED TOTAL		1%	1%	1%	1%	1%	1%	1%	1%	1%	1%	1%	1%
MAX. TDM EFFECT		1%	1%	1%	1%	1%	1%	1%	1%	1%	1%	1%	1%

$$= \text{Minimum}(X\%, 1 - [(1-A) * (1-B) \dots])$$

where X%=

PLACE	urban	75%
TYPE	compact infill	40%
MAX:	suburban center	20%
	suburban	15%

Note: $(1 - [(1-A) * (1-B) \dots])$ reflects the dampened combined effectiveness of TDM Strategies (e.g., A, B, ...). See the TDM Strategy Appendix (*Transportation Assessment Guidelines Attachment G*) for further discussion of dampening.

CITY OF LOS ANGELES VMT CALCULATOR

Report 4: MXD Methodology

Date: November 4, 2021

Project Name: Creative Office

Project Scenario:

Project Address: 1200 N CAHUENGA BLVD, 90038



Version 1.3

MXD Methodology - Project Without TDM

	Unadjusted Trips	MXD Adjustment	MXD Trips	Average Trip Length	Unadjusted VMT	MXD VMT
Home Based Work Production	0	0.0%	0	7.1	0	0
Home Based Other Production	0	0.0%	0	4.4	0	0
Non-Home Based Other Production	102	-7.8%	94	6.7	683	630
Home-Based Work Attraction	435	-38.9%	266	8.7	3,785	2,314
Home-Based Other Attraction	206	-42.7%	118	5.7	1,174	673
Non-Home Based Other Attraction	102	-7.8%	94	6.1	622	573

MXD Methodology with TDM Measures

	Proposed Project			Project with Mitigation Measures		
	TDM Adjustment	Project Trips	Project VMT	TDM Adjustment	Mitigated Trips	Mitigated VMT
Home Based Work Production	-1.2%	0	0	-1.2%	0	0
Home Based Other Production	-1.2%	0	0	-1.2%	0	0
Non-Home Based Other Production	-1.2%	93	622	-1.2%	93	622
Home-Based Work Attraction	-1.2%	263	2,285	-1.2%	263	2,285
Home-Based Other Attraction	-1.2%	117	665	-1.2%	117	665
Non-Home Based Other Attraction	-1.2%	93	566	-1.2%	93	566

MXD VMT Methodology Per Capita & Per Employee

Total Population: 0

Total Employees: 300

APC: Central

	Proposed Project	Project with Mitigation Measures
Total Home Based Production VMT	0	0
Total Home Based Work Attraction VMT	2,285	2,285
Total Home Based VMT Per Capita	0.0	0.0
Total Work Based VMT Per Employee	7.6	7.6

VMT Calculator User Agreement

The Los Angeles Department of Transportation (LADOT), in partnership with the Department of City Planning and Fehr & Peers, has developed the City of Los Angeles Vehicle Miles Traveled (VMT) Calculator to estimate project-specific daily household VMT per capita and daily work VMT per employee for land use development projects. This application, the VMT Calculator, has been provided to You, the User, to assess vehicle miles traveled (VMT) outcomes of land use projects within the City of Los Angeles. The term “City” as used below shall refer to the City of Los Angeles. The terms “City” and “Fehr & Peers” as used below shall include their respective affiliates, subconsultants, employees, and representatives.

The City is pleased to be able to provide this information to the public. The City believes that the public is most effectively served when they are provided access to the technical tools that inform the public review process of private and public land use investments. However, in using the VMT Calculator, You agree to be bound by this VMT Calculator User Agreement (this Agreement).

VMT Calculator Application for the City of Los Angeles. The City’s consultant calibrated the VMT Calculator’s parameters in 2018 to estimate travel patterns of locations in the City, and validated those outcomes against empirical data. However, this calibration process is limited to locations within the City, and practitioners applying the VMT Calculator outside of the City boundaries should not apply these estimates without further calibration and validation of travel patterns to verify the VMT Calculator’s accuracy in estimating VMT in such other locations.

Limited License to Use. This Agreement gives You a limited, non-transferrable, non-assignable, and non-exclusive license to use and execute a copy of the VMT Calculator on a computer system owned, leased or otherwise controlled by You in Your own facilities, as set out below, provided You do not use the VMT Calculator in an unauthorized manner, and that You do not republish, copy, distribute, reverse-engineer, modify, decompile, disassemble, transfer, or sell any part of the VMT Calculator, and provided that You know and follow the terms of this Agreement. Your failure to follow the terms of this Agreement shall automatically terminate this license and Your right to use the VMT Calculator.

Ownership. You understand and acknowledge that the City owns the VMT Calculator, and shall continue to own it through Your use of it, and that no transfer of ownership of any kind is intended in allowing You to use the VMT Calculator.

Warranty Disclaimer. In spite of the efforts of the City and Fehr & Peers, some information on the VMT Calculator may not be accurate. The VMT Calculator, OUTPUTS AND ASSOCIATED DATA ARE PROVIDED “as is” WITHOUT WARRANTY OF ANY KIND, whether expressed, implied, statutory, or otherwise including but not limited to, the implied warranties of merchantability and fitness for a particular purpose.

Limitation of Liability. It is understood that the VMT Calculator is provided without charge. Neither the City nor Fehr & Peers can be responsible or liable for any information derived from its use, or for any delays, inaccuracies, incompleteness, errors or omissions arising out of your use of the VMT Calculator or with respect to the material contained in the VMT Calculator. You understand and agree that Your sole remedy against the City or Fehr & Peers for loss or damage caused by any defect or failure of the

VMT Calculator, regardless of the form of action, whether in contract, tort, including negligence, strict liability or otherwise, shall be the repair or replacement of the VMT Calculator to the extent feasible as determined solely by the City. In no event shall the City or Fehr & Peers be responsible to You or anyone else for, or have liability for any special, indirect, incidental or consequential damages (including, without limitation, damages for loss of business profits or changes to businesses costs) or lost data or downtime, however caused, and on any theory of liability from the use of, or the inability to use, the VMT Calculator, whether the data, and/or formulas contained in the VMT Calculator are provided by the City or Fehr & Peers, or another third party, even if the City or Fehr & Peers have been advised of the possibility of such damages.

This Agreement and License shall be governed by the laws of the State of California without regard to their conflicts of law provisions, and shall be effective as of the date set forth below and, unless terminated in accordance with the above or extended by written amendment to this Agreement, shall terminate on the earlier of the date that You are not making use of the VMT Calculator or one year after the beginning of Your use of the VMT Calculator.

By using the VMT Calculator, You hereby waive and release all claims, responsibilities, liabilities, actions, damages, costs, and losses, known and unknown, against the City and Fehr & Peers for Your use of the VMT Calculator.

Before making decisions using the information provided in this application, contact City LADOT staff to confirm the validity of the data provided.

Print and sign below, and submit to LADOT along with the transportation assessment Memorandum of Understanding (MOU).

You, the User	
By:	<u>Liz Fleming</u>
Print Name:	<u></u>
Title:	<u>V.P.</u>
Company:	<u>OVERLAND TRAFFIC CONSULTANTS</u>
Address:	<u>952 MANHATTAN BCH BL #100</u>
Phone:	<u>310-545-1235</u>
Email Address:	<u>LIZ@OVERLANDTRAFFIC.COM</u>
Date:	<u>11-4-21</u>



APPENDIX E

COMMUNITY PLAN LAND USE MAPS

Hollywood Community Plan

General Plan Land Use Map

A Part of the General Plan of the City of Los Angeles

Land Use ¹⁸	Corresponding Zones ¹	Land Use ¹⁸	Corresponding Zones ¹
Low Density¹⁷		Commercial¹⁷	
Minimum RE40		Limited Commercial ¹⁸	CR,C1,C1.5,P, RAS3,RAS4
Very Low II RE15,RE11		Highway Oriented Commercial ^{18,19,20}	C1,C2,P, RAS3,RAS4
Low I RE9		General Commercial ¹⁸	C1,C2,P, RAS3,RAS4
Low II RS,R1		Neighborhood Office Commercial ¹⁸	C1,C2,C4,P, RAS3,RAS4
Multiple Family¹⁷		Community Commercial ¹⁸	CR,C2,C4,PPB, RAS3,RAS4
Low Medium I ² R2,RD5,RD4,RD3		Regional Center Commercial ¹⁸	C2,C4,PPB, RAS3,RAS4
Low Medium II ³ RD2,RD1.5		Industrial¹⁸	
Medium ⁴ R3		Commercial Manufacturing ¹⁸ CM,P	
High Medium ⁵ QJ,R4		Limited Manufacturing ¹⁸ MR1,M1,PPB	
High RA,QJ,R5 ¹³		Open Space/Public Facilities^{18,19,20}	
		Open Space OS,A1	
		Public Facilities PF	

Service Systems	
Public Elementary School	
Public Junior High	
Public Senior High	
Junior College	
Private Elementary School	
Private Senior High	
Private Junior College	
Community Park	
Neighborhood Park	
Regional Park	
Public Golf Course	
Branch Administration Center	
Fire Station	
Police Station	
Community Library	
Regional Library	
Cultural/Historical Site	
Maintenance Yard	
Power Distribution Station	
House of Worship	
Health Center/Hospital	
DWP Property	

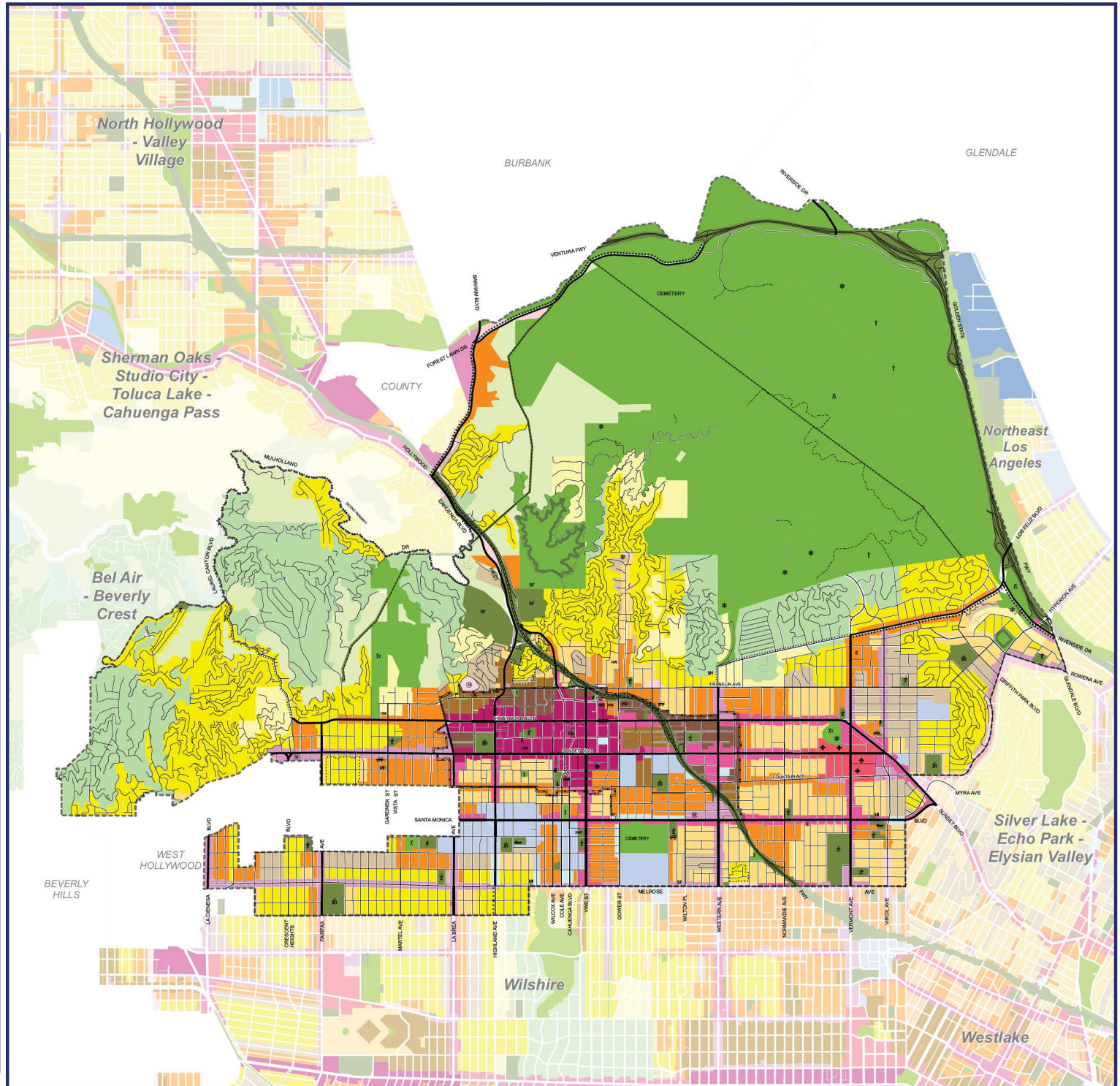
Circulation	
Freeway	
Scenic Freeway	
Major Highway I	
Scenic Major Highway II	
Scenic Divided Major Highway II	
Secondary Highway	
Scenic Secondary Highway	
Scenic Divided Secondary Highway	
Scenic Arterial Mountain	
Scenic Parkway	
Collector Street	
Local Street	
County Road	
Park Road	
Private Street	
Other Line Symbols	
Community Boundary	
DWP Lines	
Historic Preservation	
Redevelopment Project Area	
Reservoir Line	



Scale: 0 to 4,000 Feet
 Copyright © 2014 Department of City Planning. All Rights Reserved.
 Source: Los Angeles Department of City Planning

- Notes:**
- The text of the Community Plan can be accessed on the City of Los Angeles' Web Page (cityplanning.lacounty.gov).
 - Other Special Area Maps may not be included on this document.
 - For all level information (plan designation and zoning) can be found on the City of Los Angeles Department of City Planning Zone Information & Map Access System (ZIMAS) web site (zimas.lacounty.gov).

Disclaimer:
 The City of Los Angeles is neither responsible nor liable for any inaccuracies, errors or omissions with respect to the material contained on this map. This map and all materials contained on it are distributed and transmitted "as is" without warranties of any kind, either express or implied, including without limitation, warranties of title or implied warranties of merchantability or fitness for a particular purpose. The City of Los Angeles is not responsible for any special, indirect, incidental, or consequential damages that may arise from the use of, or the inability to use, the map and/or the materials contained on the map whether the materials contained on the map are provided by the City of Los Angeles, or a third party.



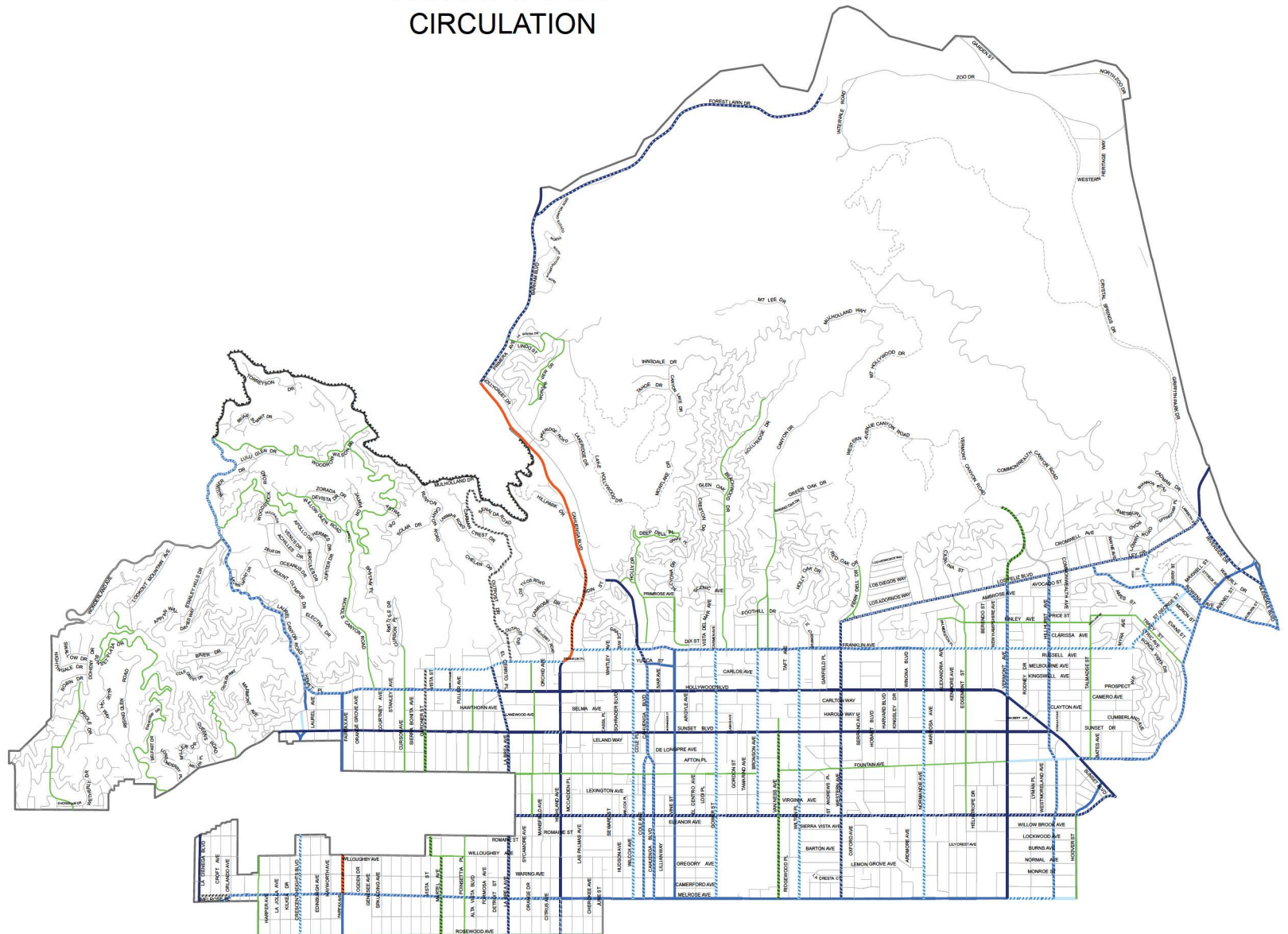
APPENDIX F

ROADWAY DESIGNATION MAP, STREET STANDARDS & INTERSECTION AERIALS

HOLLYWOOD CIRCULATION

Legend

- Boulevard II
- - - Boulevard II Modified
- Avenue I
- - - Avenue I Modified
- . - . - Avenue I Modified Divided Scenic
- . - . - Avenue I Modified Scenic
- . - . - Avenue I Scenic
- Avenue II
- - - Avenue II Divided Scenic
- - - Avenue II Modified
- . - . - Avenue II Modified Scenic
- . - . - Avenue II Scenic
- Avenue III
- - - Avenue III Modified
- Collector
- - - Collector Modified
- Local
- - - Local Modified
- . - . - Scenic Highway
- - - Private Street
- Community Plan Area Boundary

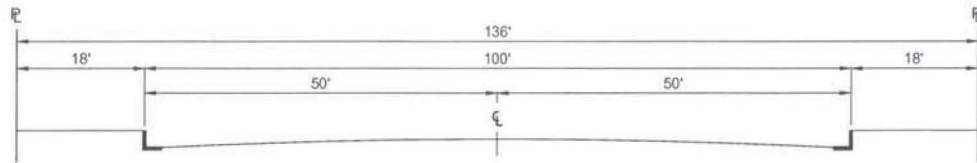


Date: 2/2/2017
DEPARTMENT OF CITY PLANNING
INFORMATION TECHNOLOGIES DIVISION

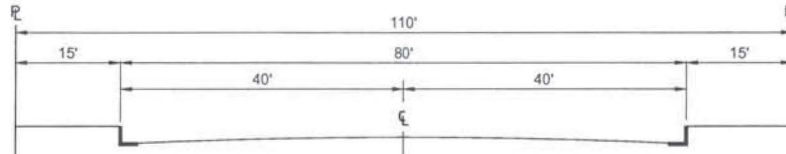
Disclaimer:
The City of Los Angeles is neither responsible nor liable for any inaccuracies, errors or omissions with respect to the material contained on this map. The map and all materials contained on it are distributed and transmitted "as is" without warranties of any kind, either express or implied, including without limitations, warranties of title or implied warranties of merchantability or fitness for a particular purpose. The City of Los Angeles is not responsible for any special, indirect, incidental, or consequential damages that may arise from the use of, or the inability to use, the map and/or the materials contained on the map whether the materials contained on the map are provided by the City of Los Angeles, or a third party.



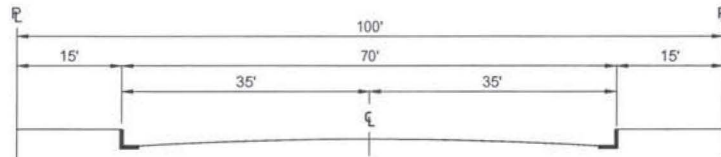
ARTERIAL STREETS



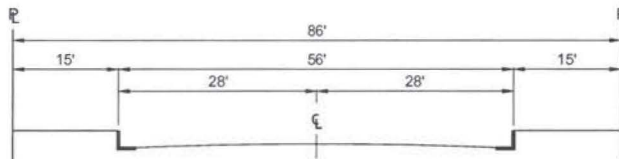
BOULEVARD I (MAJOR HIGHWAY CLASS I)



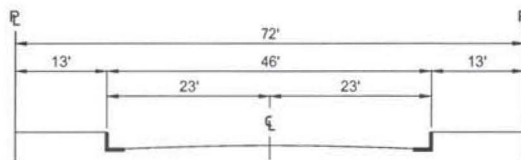
BOULEVARD II (MAJOR HIGHWAY CLASS II)



AVENUE I (SECONDARY HIGHWAY)



AVENUE II (SECONDARY HIGHWAY)

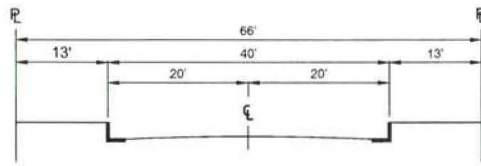


AVENUE III (SECONDARY HIGHWAY)

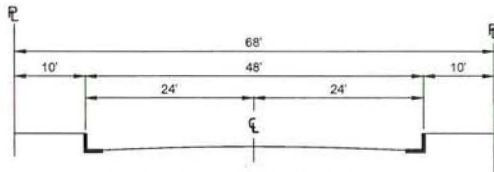
THIS STANDARD PLAN BECOMES EFFECTIVE CONCURRENT WITH THE ADOPTION OF THE MOBILITY PLAN 2035.

BUREAU OF ENGINEERING		DEPARTMENT OF PUBLIC WORKS		CITY OF LOS ANGELES	
--- DRAFT --- STANDARD STREET DIMENSIONS				STANDARD PLAN S-470-1	
PREPARED HAMID MADANI, P.E. BUREAU OF ENGINEERING	SUBMITTED SAMARA ALI-AHMAD, P.E. DATE ENGINEER OF DESIGN BUREAU OF ENGINEERING	APPROVED GARY LEE MOORE, P.E., ENV. SP. DATE CITY ENGINEER		SUPERSEDES D-22549 S-470-0	REFERENCES
CHECKED RAFFI MASSABKI, P.E. BUREAU OF ENGINEERING	KENNETH REDD, P.E. DATE DEPUTY CITY ENGINEER	DEPARTMENT OF TRANSPORTATION DATE GENERAL MANAGER		VAULT INDEX NUMBER:	
				SHEET 1 OF 4 SHEETS	

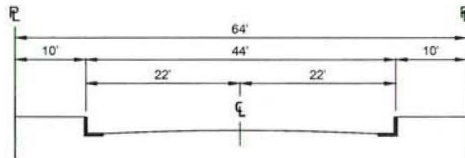
NON-ARTERIAL STREETS



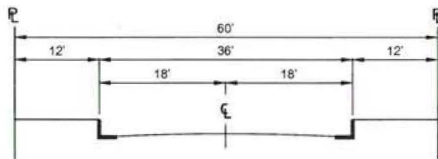
COLLECTOR STREET



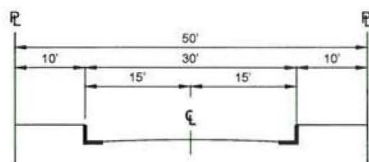
INDUSTRIAL COLLECTOR STREET



INDUSTRIAL LOCAL STREET

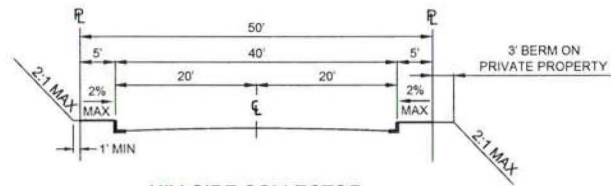


LOCAL STREET - STANDARD

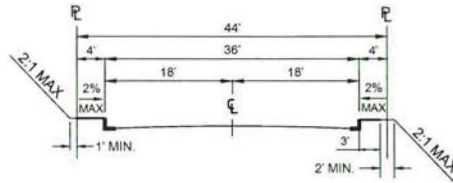


LOCAL STREET - LIMITED

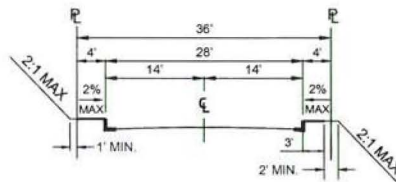
HILLSIDE STREETS



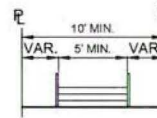
HILLSIDE COLLECTOR



HILLSIDE LOCAL



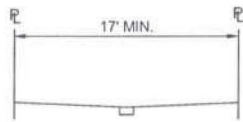
HILLSIDE LIMITED STANDARD



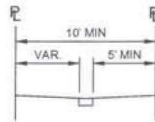
PUBLIC STAIRWAY

CONSTRUCTED IN ACCORDANCE WITH
BUREAU OF ENGINEERING STANDARD PLANS

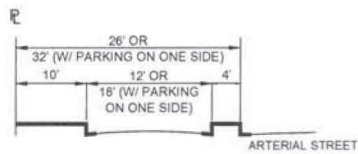
OTHER PUBLIC RIGHTS-OF-WAY



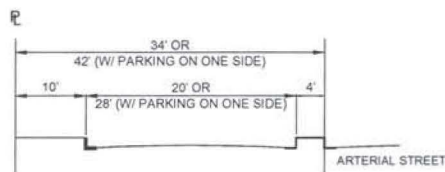
SHARED STREET



PEDESTRIAN WALKWAY

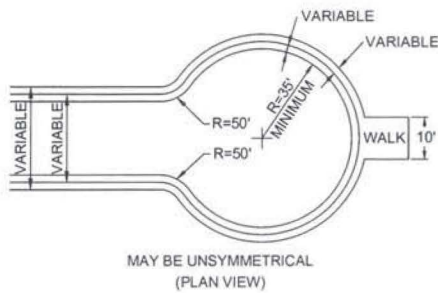


ONE-WAY SERVICE ROAD



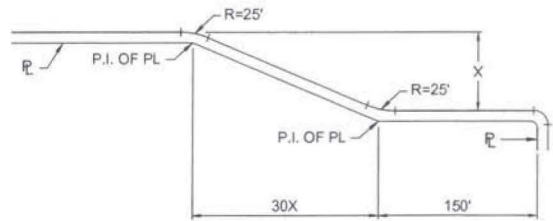
BI-DIRECTIONAL SERVICE ROAD

CUL-DE-SAC



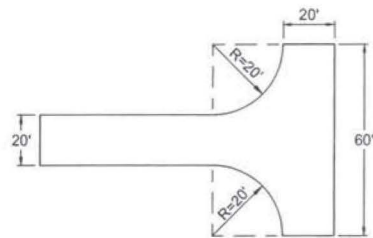
NOTE: FOR FIRE TRUCK CLEARANCE, NO OBSTRUCTION TALLER THAN 6" SHALL BE PERMITTED WITHIN 3FT. OF THE CURB. ON-STREET PARKING SHALL BE PROHIBITED.

TRANSITIONAL EXTENSIONS

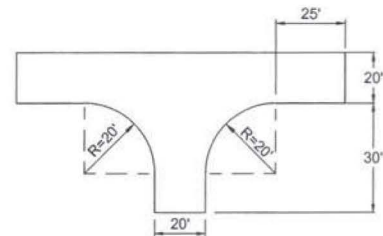


STANDARD FLARE SECTION
(PLAN VIEW)

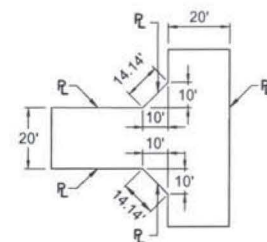
ALLEYS



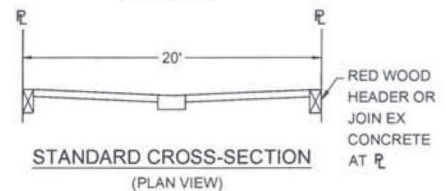
STANDARD TURNING AREA
(PLAN VIEW)



MINIMUM TURNING AREA
(PLAN VIEW)



STANDARD CUT CORNERS
FOR 90° INTERSECTION
(PLAN VIEW)



STANDARD CROSS-SECTION
(PLAN VIEW)

NOTES

1. CITY COUNCIL MAY, BY ORDINANCE, ADOPT SPECIFIC STANDARDS FOR INDIVIDUAL STREETS THAT DIFFER FROM THESE OFFICIAL STANDARD STREET DIMENSIONS. COMMUNITY PLANS AND SPECIFIC PLANS SHOULD BE REVIEWED FOR FOOTNOTES, INSTRUCTIONS AND/OR MODIFIED STREET DIMENSIONS THAT WOULD REQUIRE STANDARDS DIFFERENT THAN THOSE INDICATED ON THIS STANDARD PLAN.
2. FOR ADDITIONAL GUIDANCE AS TO THE USE OF THE ROADWAY AND SIDEWALK AREA, PLEASE REFER TO THE COMPLETE STREET DESIGN GUIDE AND MANUALS.
3. FOR DISCRETIONARY PROJECTS REQUIRING ACTION FROM THE DEPARTMENT OF CITY PLANNING (PLANNING), PLANNING MAY INCLUDE SPECIFIC INFORMATION AS TO THE DESIGN AND UTILIZATION OF THE SIDEWALK AREA.
4. WHERE A DESIGNATED ARTERIAL CROSSES ANOTHER DESIGNATED ARTERIAL STREET AND THEN CHANGES IN DESIGNATION TO A STREET OF LESSER STANDARD WIDTH, THE ARTERIAL SHALL BE TAPERED IN A STANDARD FLARE SECTION ON BOTH SIDES, AS ON SHEET 3, TO MEET THE WIDTH OF LESSER DESIGNATION AND PROVIDE AN ORDERLY TRANSITION.
5. PRIVATE STREET DEVELOPMENT SHOULD CONFORM TO THE STANDARD PUBLIC STREET DIMENSIONS SHOWN ON THE SHEET, WHERE APPROPRIATE. VARIATIONS MAY BE APPROVED ON A CASE-BY-CASE BASIS BY THE CITY.
6. FIFTY-FOOT CURB RADIUS (INSTEAD OF THE STANDARD 35' CURB RADIUS) SHALL BE PROVIDED FOR CUL-DE-SACS IN INDUSTRIAL AREAS. SEE CUL-DE-SAC ILLUSTRATION FOR FURTHER DESIGN STANDARDS.
7. ALLEYS SHALL BE A MINIMUM OF 20' IN WIDTH AND INTERSECTIONS AND/OR DEAD-END TERMINUSES SHALL BE DESIGNED TO CONFORM TO THE ALLEY ILLUSTRATIONS INCLUDED HEREIN.
8. FOR INTERSECTIONS OF STREETS, THE FOLLOWING DEDICATIONS SHALL APPLY;
 - A. INTERSECTIONS OF ARTERIAL STREETS WITH ANY OTHER STREET: 15' X 15' CUT CORNER OR 20' CURVED CORNER RADIUS.
 - B. INTERSECTIONS ON NON-ARTERIAL AND/OR HILLSIDE STREETS: 10' X 10' CUT CORNER OR 15' CURVED CORNER RADIUS.
9. STREETS THAT ARE ACCOMPANIED BY A PARALLEL FRONTAGE AND/OR SERVICE ROAD ARE DEEMED TO MEET THE STREET STANDARDS SET FORTH HEREIN AND THE DEDICATION REQUIREMENT SHALL BE NO MORE THAN IS NECESSARY TO BRING THE ABUTTING SIDEWALK DIMENSION INTO COMPLIANCE WITH THE STREET STANDARD.
10. DUE TO THEIR UNIQUE CHARACTER AND DIMENSIONS ALL STREETS DESIGNATED AS DIVIDED ARE CONSIDERED TO HAVE MET THEIR STREET STANDARD AND THE DEDICATION SHALL BE NO MORE THAN IS NECESSARY TO BRING THE ABUTTING SIDEWALK DIMENSION COMPLIANT WITH THE STREET STANDARD.
11. THE DIMENSION OF ANY MEDIAN, DIVIDED STRIP AND/OR TRANSIT WAY SHALL BE INCLUDED WHEN DETERMINING THE RIGHT-OF-WAY DIMENSION.
12. THE LOCATION OF THE DRAINAGE GUTTER IS NOT RESTRICTED TO THE CENTER OF THE SHARED STREET AND CAN BE PLACED WHERE NECESSARY AS APPROVED BY THE CITY.
13. A SHARED STREET SHALL PROVIDE A DEDICATED PEDESTRIAN ACCESS ROUTE.

Cahuenga Bl & Fountain Av



Cahuenga Bl & Lexington Av



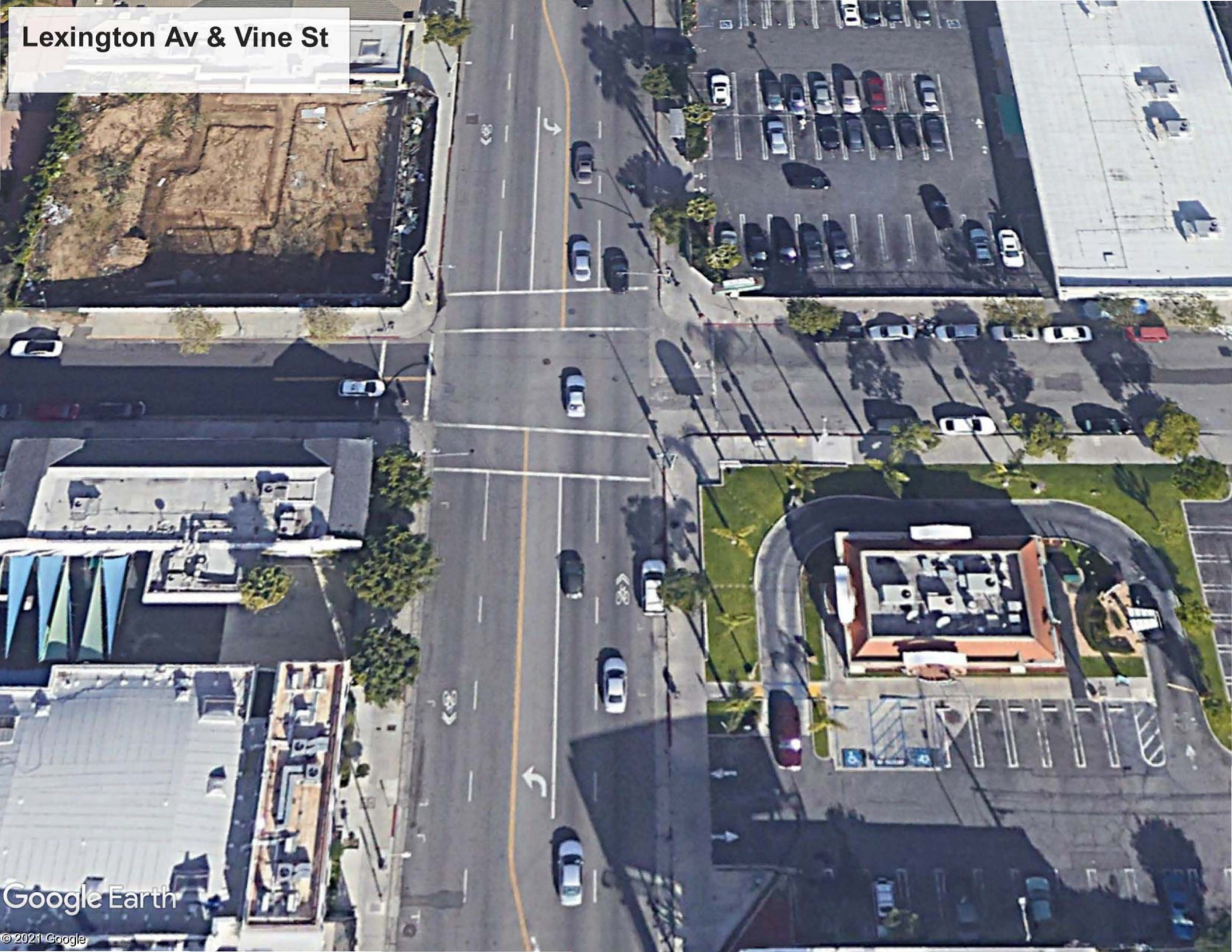
Fountain Av & Vine St



Google Earth

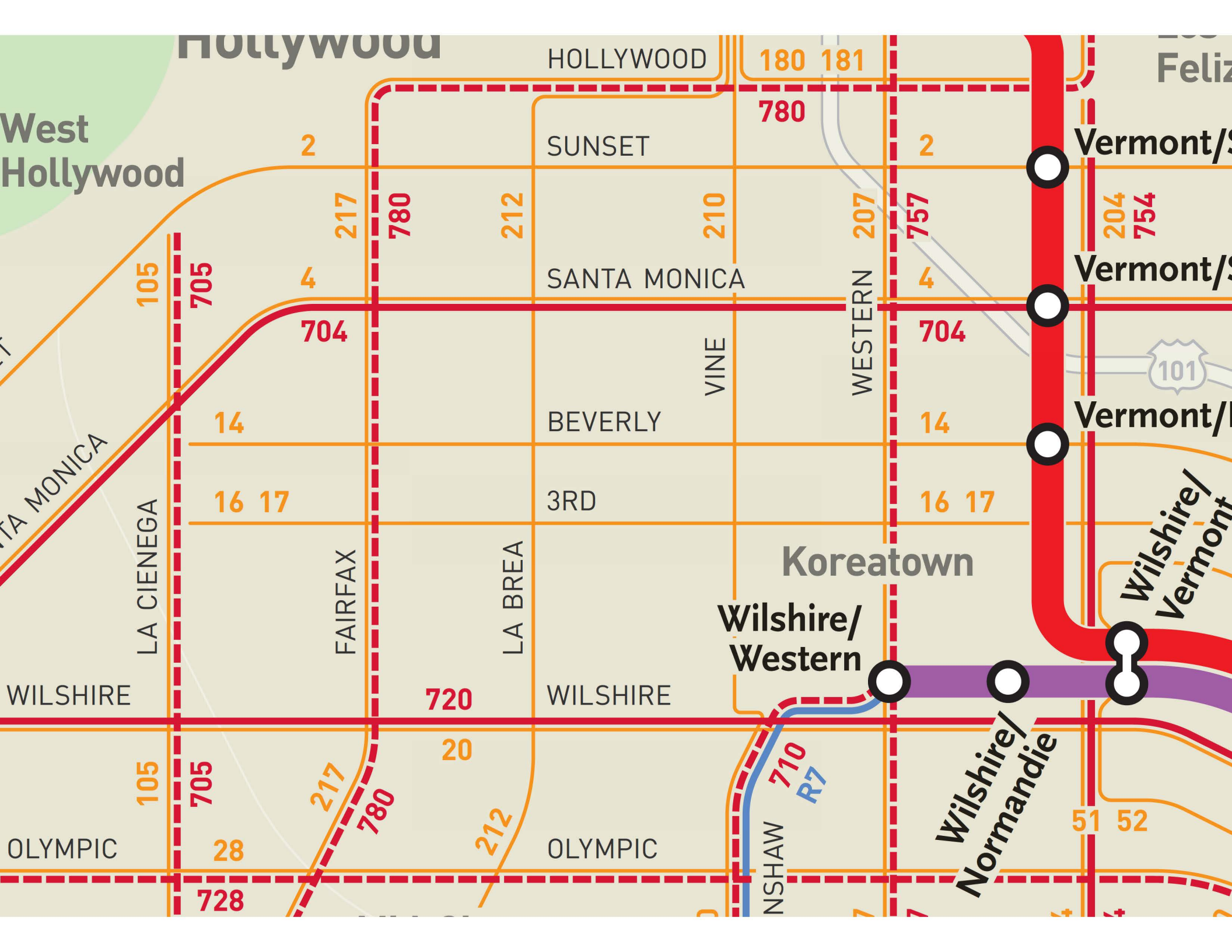
© 2021 Google

Lexington Av & Vine St



APPENDIX G

TRANSIT ROUTES



Monday through Friday

Effective Sep 12, 2021

B & D Lines (Red & Purple)

Eastbound Al Este (Approximate Times/Tiempos Aproximados)

B Line (Red) Stations										D Line (Purple) Stations									
North Hollywood	Universal City	Hollywood/Highland	Hollywood/Vine	Hollywood/Western	Vermont/Sunset	Vermont/Santa Monica	Vermont/Beverly	Wilshire/Western	Wilshire/Normandie	Wilshire/Vermont	Wilshire/Neighborhood Park	7th St/Metro Center	Pershing Square	Civic Center/Grand Park	Civic Center/Grand Park	Union Station			
4:32A	4:36A	4:40A	4:42A	4:44A	4:46A	4:47A	4:49A	4:51A	4:53A	4:54A	4:56A	4:58A	4:59A	5:00A	5:01A	5:02A			
4:50	4:54	4:58	5:00	5:02	5:04	5:05	5:07	5:09	5:11	5:12	5:13	5:14	5:15	5:16	5:17	5:18			
5:05	5:09	5:13	5:15	5:17	5:19	5:20	5:22	5:24	5:26	5:27	5:28	5:29	5:30	5:31	5:32	5:33			
5:21	5:25	5:29	5:31	5:33	5:35	5:36	5:38	5:40	5:42	5:43	5:44	5:45	5:46	5:47	5:48	5:49			
5:36	5:40	5:44	5:46	5:48	5:50	5:51	5:53	5:55	5:57	5:58	5:59	6:00	6:01	6:02	6:03	6:04			
5:45	5:49	5:53	5:55	5:57	5:59	6:00	6:02	6:04	6:06	6:07	6:08	6:09	6:10	6:11	6:12	6:13			
5:59	6:03	6:07	6:09	6:11	6:13	6:14	6:16	6:18	6:20	6:21	6:22	6:23	6:24	6:25	6:26	6:27			
6:09	6:13	6:17	6:19	6:21	6:23	6:24	6:26	6:28	6:30	6:31	6:32	6:33	6:34	6:35	6:36	6:37			
Trains Scheduled Every: 10 minutes										10 minutes									
8:19	8:23	8:27	8:29	8:31	8:33	8:34	8:36	8:38	8:40	8:41	8:42	8:43	8:44	8:45	8:46	8:47			
8:29	8:33	8:37	8:39	8:41	8:43	8:44	8:46	8:48	8:50	8:51	8:52	8:53	8:54	8:55	8:56	8:57			
8:38	8:42	8:46	8:48	8:50	8:52	8:53	8:55	8:57	8:59	9:00	9:01	9:02	9:03	9:04	9:05	9:06			
8:49	8:53	8:57	8:59	9:01	9:03	9:04	9:06	9:08	9:10	9:11	9:12	9:13	9:14	9:15	9:16	9:17			
8:59	9:03	9:07	9:09	9:11	9:13	9:14	9:16	9:18	9:20	9:21	9:22	9:23	9:24	9:25	9:26	9:27			
9:11	9:15	9:19	9:21	9:23	9:25	9:26	9:28	9:30	9:32	9:33	9:34	9:35	9:36	9:37	9:38	9:39			
9:23	9:27	9:31	9:33	9:35	9:37	9:38	9:40	9:42	9:44	9:45	9:46	9:47	9:48	9:49	9:50	9:51			
9:35	9:39	9:43	9:45	9:47	9:49	9:50	9:52	9:54	9:56	9:57	9:58	9:59	10:00	10:01	10:02	10:03			
9:47	9:51	9:55	9:57	9:59	10:01	10:02	10:04	10:06	10:08	10:09	10:10	10:11	10:12	10:13	10:14	10:15			
9:59	10:03	10:07	10:09	10:11	10:13	10:14	10:16	10:18	10:20	10:21	10:22	10:23	10:24	10:25	10:26	10:27			
10:11	10:15	10:19	10:21	10:23	10:25	10:26	10:28	10:30	10:32	10:33	10:34	10:35	10:36	10:37	10:38	10:39			
10:23	10:27	10:31	10:33	10:35	10:37	10:38	10:40	10:42	10:44	10:45	10:46	10:47	10:48	10:49	10:50	10:51			
10:35	10:39	10:43	10:45	10:47	10:49	10:50	10:52	10:54	10:56	10:57	10:58	10:59	11:00	11:01	11:02	11:03			
10:47	10:51	10:55	10:57	10:59	11:01	11:02	11:04	11:06	11:08	11:09	11:10	11:11	11:12	11:13	11:14	11:15			
10:59	11:03	11:07	11:09	11:11	11:13	11:14	11:16	11:18	11:20	11:21	11:22	11:23	11:24	11:25	11:26	11:27			
11:11	11:15	11:19	11:21	11:23	11:25	11:26	11:28	11:30	11:32	11:33	11:34	11:35	11:36	11:37	11:38	11:39			
11:23	11:27	11:31	11:33	11:35	11:37	11:38	11:40	11:42	11:44	11:45	11:46	11:47	11:48	11:49	11:50	11:51			
11:35	11:39	11:43	11:45	11:47	11:49	11:50	11:52	11:54	11:56	11:57	11:58	11:59	12:00	12:01	12:02	12:03			
11:47	11:51	11:55	11:57	11:59	12:01	12:02	12:04	12:06	12:08	12:09	12:10	12:11	12:12	12:13	12:14	12:15			
11:59	12:03	12:07	12:09	12:11	12:13	12:14	12:16	12:18	12:20	12:21	12:22	12:23	12:24	12:25	12:26	12:27			
12:11	12:15	12:19	12:21	12:23	12:25	12:26	12:28	12:30	12:32	12:33	12:34	12:35	12:36	12:37	12:38	12:39			
12:23	12:27	12:31	12:33	12:35	12:37	12:38	12:40	12:42	12:44	12:45	12:46	12:47	12:48	12:49	12:50	12:51			
12:35	12:39	12:43	12:45	12:47	12:49	12:50	12:52	12:54	12:56	12:57	12:58	12:59	13:00	13:01	13:02	13:03			
12:47	12:51	12:55	12:57	12:59	13:01	13:02	13:04	13:06	13:08	13:09	13:10	13:11	13:12	13:13	13:14	13:15			
12:59	13:03	13:07	13:09	13:11	13:13	13:14	13:16	13:18	13:20	13:21	13:22	13:23	13:24	13:25	13:26	13:27			
13:11	13:15	13:19	13:21	13:23	13:25	13:26	13:28	13:30	13:32	13:33	13:34	13:35	13:36	13:37	13:38	13:39			
13:23	13:27	13:31	13:33	13:35	13:37	13:38	13:40	13:42	13:44	13:45	13:46	13:47	13:48	13:49	13:50	13:51			
13:35	13:39	13:43	13:45	13:47	13:49	13:50	13:52	13:54	13:56	13:57	13:58	13:59	14:00	14:01	14:02	14:03			
13:47	13:51	13:55	13:57	13:59	14:01	14:02	14:04	14:06	14:08	14:09	14:10	14:11	14:12	14:13	14:14	14:15			
13:59	14:03	14:07	14:09	14:11	14:13	14:14	14:16	14:18	14:20	14:21	14:22	14:23	14:24	14:25	14:26	14:27			
14:11	14:15	14:19	14:21	14:23	14:25	14:26	14:28	14:30	14:32	14:33	14:34	14:35	14:36	14:37	14:38	14:39			
14:23	14:27	14:31	14:33	14:35	14:37	14:38	14:40	14:42	14:44	14:45	14:46	14:47	14:48	14:49	14:50	14:51			
14:35	14:39	14:43	14:45	14:47	14:49	14:50	14:52	14:54	14:56	14:57	14:58	14:59	15:00	15:01	15:02	15:03			
14:47	14:51	14:55	14:57	14:59	15:01	15:02	15:04	15:06	15:08	15:09	15:10	15:11	15:12	15:13	15:14	15:15			
14:59	15:03	15:07	15:09	15:11	15:13	15:14	15:16	15:18	15:20	15:21	15:22	15:23	15:24	15:25	15:26	15:27			
15:11	15:15	15:19	15:21	15:23	15:25	15:26	15:28	15:30	15:32	15:33	15:34	15:35	15:36	15:37	15:38	15:39			
15:23	15:27	15:31	15:33	15:35	15:37	15:38	15:40	15:42	15:44	15:45	15:46	15:47	15:48	15:49	15:50	15:51			
15:35	15:39	15:43	15:45	15:47	15:49	15:50	15:52	15:54	15:56	15:57	15:58	15:59	16:00	16:01	16:02	16:03			
15:47	15:51	15:55	15:57	15:59	16:01	16:02	16:04	16:06	16:08	16:09	16:10	16:11	16:12	16:13	16:14	16:15			
15:59	16:03	16:07	16:09	16:11	16:13	16:14	16:16	16:18	16:20	16:21	16:22	16:23	16:24	16:25	16:26	16:27			
16:11	16:15	16:19	16:21	16:23	16:25	16:26	16:28	16:30	16:32	16:33	16:34	16:35	16:36	16:37	16:38	16:39			
16:23	16:27	16:31	16:33	16:35	16:37	16:38	16:40	16:42	16:44	16:45	16:46	16:47	16:48	16:49	16:50	16:51			
16:35	16:39	16:43	16:45	16:47	16:49	16:50	16:52	16:54	16:56	16:57	16:58	16:59	17:00	17:01	17:02	17:03			
16:47	16:51	16:55	16:57	16:59	17:01	17:02	17:04	17:06	17:08	17:09	17:10	17:11	17:12	17:13	17:14	17:15			
16:59	17:03	17:07	17:09	17:11	17:13	17:14	17:16	17:18	17:20	17:21	17:22	17:23	17:24	17:25	17:26	17:27			
17:11	17:15	17:19	17:21	17:23	17:25	17:26	17:28	17:30	17:32	17:33	17:34	17:35	17:36	17:37	17:38	17:39			
17:23	17:27	17:31	17:33	17:35	17:37	17:38	17:40	17:42	17:44	17:45	17:46	17:47	17:48	17:49	17:50	17:51			
17:35	17:39	17:43	17:45	17:47	17:49	17:50	17:52	17:54	17:56	17:57	17:58	17:59	18:00	18:01	18:02	18:03			
17:47	17:51	17:55	17:57	17:59	18:01	18:02	18:04	18:06	18:08	18:09	18:10	18:11	18:12	18:13	18:14	18:15			
17:59	18:03	18:07	18:09	18:11	18:13	18:14	18:16	18:18	18:20	18:21	18:22	18:23	18:24	18:25	18:26	18:27			
18:11	18:15	18:19	18:21	18:23	18:25	18:26	18:28	18:30	18:32	18:33	18:34	18:35	18:36	18:37	18:38	18:39			
18:23	18:27	18:31	18:33	18:35	18:37	18:38	18:40	18:42	18:44	18:45	18:46	18:47	18:48	18:49	18:50	18:51			
18:35	18:39	18:43	18:45	18:47	18:49	18:50	18:52	18:54	18:56	18:57	18:58	18:59	19:00	19:01	19:02	19:03			
18:47	18:51	18:55	18:57	18:59	19:01	19:02	19:04	19:06	19:08	19:09	19:10	19:11	19:12	19:13	19:14	19:15			
18:59	19:03	19:07	19:09	19:11	19:13	19:14	19:16	19:18	19:20	19:21	19:22	19:23	19:24	19:25	19:26	19:27			
19:11	19:15	19:19	19:21	19:23	19:25	19:26	19:28	19:30	19:32	19:33	19:34	19:35	19:36	19:37	19:38	19:39			
19:23	19:27	19:31	19:33	19:35	19:37	19:38	19:40	19:42	19:44	19:45	19:46	19:47	19:48	19:49	19:50	19:51			
19:35	19:39	19:43	19:45	19:47	19:49	19:50	19:52	19:54	19:56	19:57	19:58	19:59	20:00	20:01	20:02	20:03			
19:47	19:51	19:55	19:57	19:59	20:01	20:02	20:04	20:06	20:08	20:09	20:10	20:11	20:12	20:13	20:14	20:15			
19:59	20:03	20:07	20:09	20:11	20:13	20:14	20:16	20:18	20:20	20:21	20:22	20:23	20:24	20:25	20:26	20:27			
20:11	20:15	20:19	20:21	20:23	20:2														

Saturday, Sunday & Holiday

Effective Sep 12 2021

B & D Lines (Red & Purple)

Eastbound Al Este (Approximate Times/Tiempos Aproximados)

STATION	UNIVERSAL CITY	LOS ANGELES	LOS ANGELES	UNIVERSAL CITY	STATION	LOS ANGELES	LOS ANGELES	UNIVERSAL CITY	STATION
8 Line (Red) Stations					D Line (Purple) Stations				
North Hollywood	Universal/Studio City	Hollywood/Vine	Hollywood/Vine	Hollywood/Vine	North Hollywood	Universal/Studio City	Hollywood/Vine	Hollywood/Vine	North Hollywood
4:32A	4:36A	4:40A	4:42A	4:44A	4:46A	4:47A	4:49A	4:51A	4:53A
4:52	4:56	5:00	5:02	5:04	5:06	5:07	5:09	5:11	5:13
5:12	5:16	5:20	5:22	5:24	5:26	5:27	5:29	5:31	5:33
5:32	5:36	5:40	5:42	5:44	5:46	5:47	5:49	5:51	5:53
5:52	5:56	6:00	6:02	6:04	6:06	6:07	6:09	6:11	6:13
6:12	6:16	6:20	6:22	6:24	6:26	6:27	6:29	6:31	6:33
6:32	6:36	6:40	6:42	6:44	6:46	6:47	6:49	6:51	6:53
6:52	6:56	7:00	7:02	7:04	7:06	7:07	7:09	7:11	7:13
7:12	7:16	7:20	7:22	7:24	7:26	7:27	7:29	7:31	7:33
7:32	7:36	7:40	7:42	7:44	7:46	7:47	7:49	7:51	7:53
7:52	7:56	8:00	8:02	8:04	8:06	8:07	8:09	8:11	8:13
8:11	8:15	8:19	8:21	8:23	8:25	8:26	8:28	8:30	8:32
8:29	8:33	8:37	8:39	8:41	8:43	8:44	8:46	8:48	8:50
8:44	8:48	8:52	8:54	8:56	8:58	8:59	9:01	9:03	9:05
8:57	9:01	9:05	9:07	9:09	9:11	9:12	9:14	9:16	9:18
9:12	9:16	9:20	9:22	9:24	9:26	9:27	9:29	9:31	9:33
9:27	9:31	9:35	9:37	9:39	9:41	9:42	9:44	9:46	9:48
9:42	9:46	9:50	9:52	9:54	9:56	9:57	9:59	10:01	10:03
9:56	10:00	10:04	10:06	10:08	10:10	10:11	10:13	10:15	10:17
10:10	10:14	10:18	10:20	10:22	10:24	10:25	10:27	10:29	10:31
10:24	10:28	10:32	10:34	10:36	10:38	10:39	10:41	10:43	10:45
10:36	10:40	10:44	10:46	10:48	10:50	10:51	10:53	10:55	10:57
12 minutes									
5:40P	5:44P	5:48P	5:50P	5:52P	5:54P	5:55P	5:57P	5:59P	6:01P
6:00	6:04	6:08	6:10	6:12	6:14	6:15	6:17	6:19	6:21
6:12	6:16	6:20	6:22	6:24	6:26	6:27	6:29	6:31	6:33
6:24	6:28	6:32	6:34	6:36	6:38	6:39	6:41	6:43	6:45
6:36	6:40	6:44	6:46	6:48	6:50	6:51	6:53	6:55	6:57
6:49	6:53	6:57	6:59	7:01	7:03	7:04	7:06	7:08	7:10
7:03	7:07	7:11	7:13	7:15	7:17	7:18	7:20	7:22	7:24
7:17	7:21	7:25	7:27	7:29	7:31	7:32	7:34	7:36	7:38
7:31	7:35	7:39	7:41	7:43	7:45	7:46	7:48	7:50	7:52
7:43	7:47	7:51	7:53	7:55	7:57	7:58	8:00	8:02	8:04
7:55	7:59	8:03	8:05	8:07	8:09	8:10	8:12	8:14	8:16
8:02	8:06	8:10	8:12	8:14	8:16	8:17	8:19	8:21	8:23
8:09	8:13	8:17	8:19	8:21	8:23	8:24	8:26	8:28	8:30
8:22	8:26	8:30	8:32	8:34	8:36	8:37	8:39	8:41	8:43
8:42	8:46	8:50	8:52	8:54	8:56	8:57	8:59	9:01	9:03
9:02	9:06	9:10	9:12	9:14	9:16	9:17	9:19	9:21	9:23
12 minutes									
11:42	11:46	11:50	11:52	11:54	11:56	11:57	11:59	12:01	12:03
12:02A	12:06A	12:10A	12:12A	12:14A	12:16A	12:17A	12:19A	12:21A	12:23A

Saturday, Sunday & Holiday

Effective Sep 12 2021

B & D Lines (Red & Purple)

Westbound Al Oeste (Approximate Times/Tiempos Aproximados)

STATION	UNIVERSAL CITY	LOS ANGELES	LOS ANGELES	UNIVERSAL CITY	STATION	LOS ANGELES	LOS ANGELES	UNIVERSAL CITY	STATION
8 Line (Red) Stations					D Line (Purple) Stations				
North Hollywood	Universal/Studio City	Hollywood/Vine	Hollywood/Vine	Hollywood/Vine	North Hollywood	Universal/Studio City	Hollywood/Vine	Hollywood/Vine	North Hollywood
4:10A	4:12A	4:13A	4:15A	4:17A	4:19A	4:20A	4:22A	4:24A	4:26A
4:20	4:23	4:24	4:26	4:28	4:30	4:31	4:33	4:35	4:37
4:31	4:33	4:34	4:36	4:38	4:40	4:41	4:43	4:45	4:47
4:41	4:43	4:44	4:46	4:48	4:50	4:51	4:53	4:55	4:57
4:51	4:53	4:54	4:56	4:58	5:00	5:01	5:03	5:05	5:07
5:01	5:03	5:04	5:06	5:08	5:10	5:11	5:13	5:15	5:17
5:11	5:13	5:14	5:16	5:18	5:20	5:21	5:23	5:25	5:27
5:21	5:23	5:24	5:26	5:28	5:30	5:31	5:33	5:35	5:37
5:31	5:33	5:34	5:36	5:38	5:40	5:41	5:43	5:45	5:47
5:41	5:43	5:44	5:46	5:48	5:50	5:51	5:53	5:55	5:57
5:51	5:53	5:54	5:56	5:58	6:00	6:01	6:03	6:05	6:07
6:01	6:03	6:04	6:06	6:08	6:10	6:11	6:13	6:15	6:17
6:11	6:13	6:14	6:16	6:18	6:20	6:21	6:23	6:25	6:27
6:21	6:23	6:24	6:26	6:28	6:30	6:31	6:33	6:35	6:37
6:31	6:33	6:34	6:36	6:38	6:40	6:41	6:43	6:45	6:47
6:41	6:43	6:44	6:46	6:48	6:50	6:51	6:53	6:55	6:57
6:51	6:53	6:54	6:56	6:58	7:00	7:01	7:03	7:05	7:07
7:01	7:03	7:04	7:06	7:08	7:10	7:11	7:13	7:15	7:17
7:11	7:13	7:14	7:16	7:18	7:20	7:21	7:23	7:25	7:27
7:21	7:23	7:24	7:26	7:28	7:30	7:31	7:33	7:35	7:37
7:31	7:33	7:34	7:36	7:38	7:40	7:41	7:43	7:45	7:47
7:41	7:43	7:44	7:46	7:48	7:50	7:51	7:53	7:55	7:57
7:51	7:53	7:54	7:56	7:58	8:00	8:01	8:03	8:05	8:07
8:01	8:03	8:04	8:06	8:08	8:10	8:11	8:13	8:15	8:17
8:11	8:13	8:14	8:16	8:18	8:20	8:21	8:23	8:25	8:27
8:21	8:23	8:24	8:26	8:28	8:30	8:31	8:33	8:35	8:37
8:31	8:33	8:34	8:36	8:38	8:40	8:41	8:43	8:45	8:47
8:41	8:43	8:44	8:46	8:48	8:50	8:51	8:53	8:55	8:57
8:51	8:53	8:54	8:56	8:58	9:00	9:01	9:03	9:05	9:07
9:01	9:03	9:04	9:06	9:08	9:10	9:11	9:13	9:15	9:17
9:11	9:13	9:14	9:16	9:18	9:20	9:21	9:23	9:25	9:27
9:21	9:23	9:24	9:26	9:28	9:30	9:31	9:33	9:35	9:37
9:31	9:33	9:34	9:36	9:38	9:40	9:41	9:43	9:45	9:47
9:41	9:43	9:44	9:46	9:48	9:50	9:51	9:53	9:55	9:57
9:51	9:53	9:54	9:56	9:58	10:00	10:01	10:03	10:05	10:07
10:01	10:03	10:04	10:06	10:08	10:10	10:11	10:13	10:15	10:17
10:10	10:14	10:18	10:20	10:22	10:24	10:25	10:27	10:29	10:31
10:24	10:28	10:32	10:34	10:36	10:38	10:39	10:41	10:43	10:45
10:36	10:40	10:44	10:46	10:48	10:50	10:51	10:53	10:55	10:57
12 minutes									
5:18P	5:20P	5:21P	5:23P	5:25P	5:27P	5:28P	5:30P	5:32P	5:34P
5:24	5:26	5:27	5:29	5:31	5:33	5:34	5:36	5:38	5:40
5:34	5:36	5:37	5:39	5:41	5:43	5:44	5:46	5:48	5:50
5:44	5:46	5:47	5:49	5:51	5:53	5:54	5:56	5:58	6:00
5:54	5:56	5:57	5:59	6:01	6:03	6:04	6:06	6:08	6:10
6:04	6:06	6:07	6:09	6:11	6:13	6:14	6:16	6:18	6:20
6:14	6:16	6:17	6:19	6:21	6:23	6:24	6:26	6:28	6:30
6:24	6:26	6:27	6:29	6:31	6:33	6:34	6:36	6:38	6:40
6:34	6:36	6:37	6:39	6:41	6:43	6:44	6:46	6:48	6:50
6:44	6:46	6:47	6:49	6:51	6:53	6:54	6:56	6:58	7:00
6:54	6:56	6:57	6:59	7:01	7:03	7:04	7:06	7:08	7:10
7:04	7:06	7:07	7:09	7:11	7:13	7:14	7:16	7:18	7:20
7:14	7:16	7:17	7:19	7:21	7:23	7:24	7:26	7:28	7:30
7:24	7:26	7:27	7:29	7:31	7:33	7:34	7:36	7:38	7:40
7:34	7:36	7:37	7:39	7:41	7:43	7:44	7:46	7:48	7:50
7:44	7:46	7:47	7:49	7:51	7:53	7:54	7:56	7:58	8:00
7:54	7:56	7:57	7:59	8:01	8:03	8:04	8:06	8:08	8:10
8:04	8:06	8:07	8:09	8:11	8:13	8:14	8:16	8:18	8:20
8:14	8:16	8:17	8:19	8:21	8:23	8:24	8:26	8:28	8:30
8:24	8:26	8:27	8:29	8:31	8:33	8:34	8:36	8:38	8:40
8:34	8:36	8:37	8:39	8:41	8:43	8:44	8:46	8:48	8:50
8:44	8:46	8:47	8:49	8:51	8:53	8:54	8:56	8:58	9:00
8:54	8:56	8:57	8:59	9:01	9:03	9:04	9:06	9:08	9:10
9:04	9:06	9:07	9:09	9:11	9:13	9:14	9:16	9:18	9:20
9:14	9:16	9:17	9:19	9:21	9:23	9:24	9:26	9:28	9:30
12 minutes									
11:51	11:53	11:54	11:56	11:58	12:00A	12:02A	12:04A	12:06A	12:08A
12:01A	12:03A	12:04A	12:06A	12:08A	12:10A	12:12A	12:14A	12:16A	12:18A
12:11	12:13	12:14	12:16	12:18	12:20	12:22	12:24	12:26	12:28

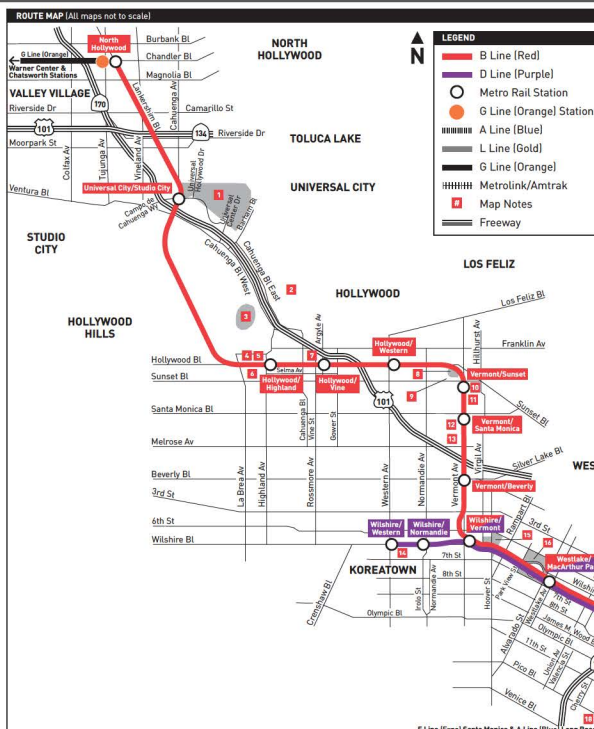
Art's a trip.

Free Metro Rail Art Tours are offered the first Thursday, Saturday and Sunday of each month. Call 213.922.2738 for Art Tour information.



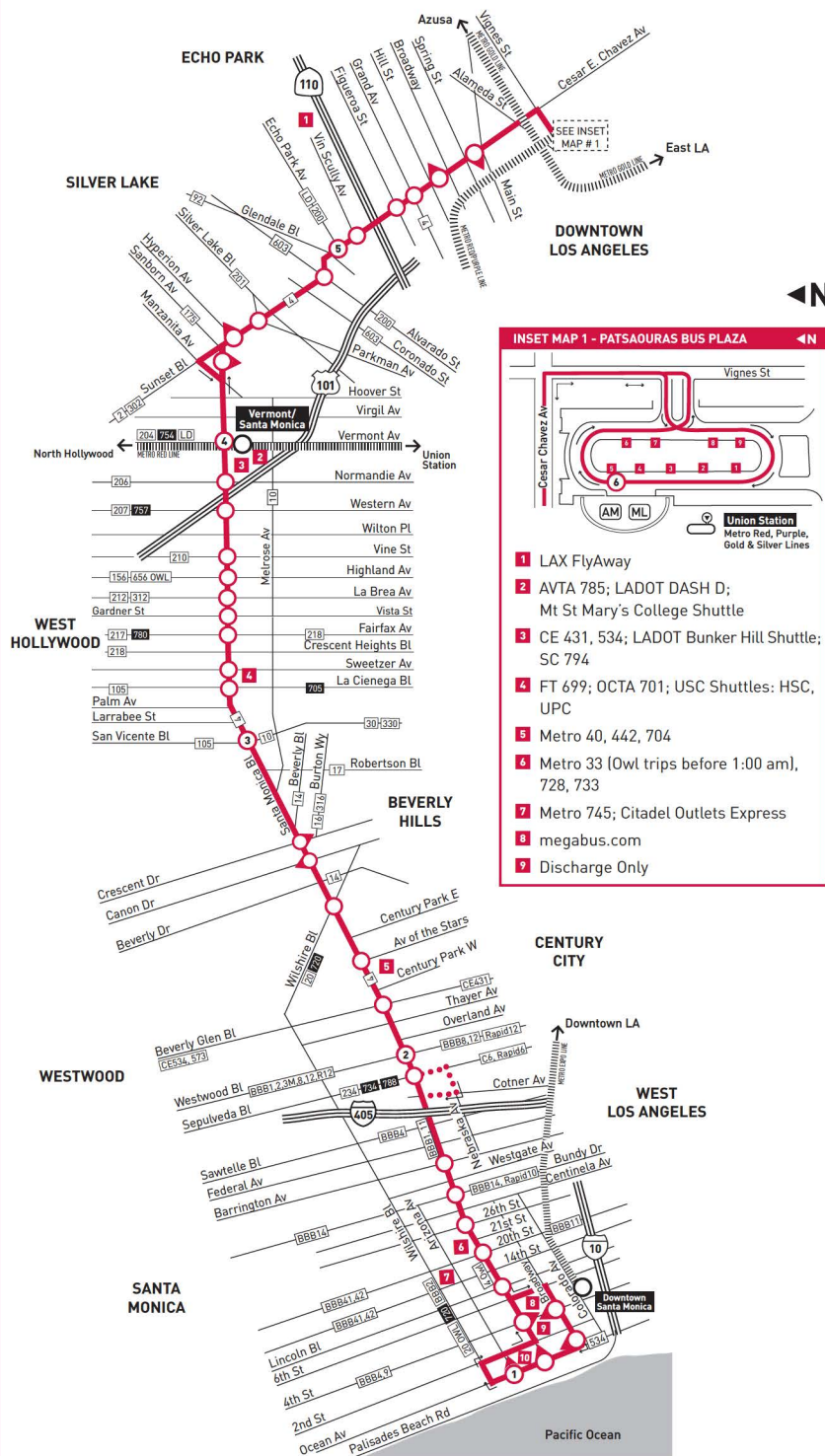
Taking your bike on the train?

Please be courteous to other passengers and avoid blocking doors and aisles.

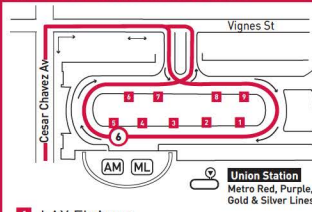


- MAP NOTES**
- 1 Universal Studios/City Walk
 - 2 John Anson Ford Theater
 - 3 Hollywood Bowl
 - 4 TCL Chinese Theatre
 - 5 Hollywood & Highland Center
 - 6 El Capitan Theater
 - 7 Pantages Theater
 - 8 Bannsdall Park
 - 9 Kaiser LA Medical Center - Hollywood
 - 10 Children's Hospital of Los Angeles
 - 11 Queen of the Angels Hollywood
 - 12 Presbyterian Medical Center
 - 13 Los Angeles City College
 - 14 Braille

Eastbound Al Este (Approximate Times / Tiempos Aproximados)												Westbound Al Oeste (Approximate Times / Tiempos Aproximados)											
STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION	STATION
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24
San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio	San Antonio
4:37A	4:56A	5:06A	5:14A	5:27A	5:31A	5:41A	5:58A	6:06A	6:23A	6:30A	6:47A	6:55A	6:58A	7:06A	7:14A	7:23A	7:30A	7:37A	7:44A	7:51A	7:58A	8:05A	8:12A
5:13	5:31	5:44	5:50	6:03	6:08	6:19	6:39	6:51	7:10	7:19	7:36	7:45	7:48	7:56	8:04	8:12	8:20	8:28	8:36	8:44	8:52	9:00	9:08
5:23	5:42	5:55	6:01	6:15	6:20	6:31	6:53	7:02	7:20	7:29	7:46	7:55	7:58	8:06	8:14	8:22	8:30	8:38	8:46	8:54	9:02	9:10	9:18
5:35	5:54	6:07	6:13	6:27	6:32	6:44	7:06	7:16	7:34	7:43	7:60	7:69	7:72	7:80	7:88	7:96	8:04	8:12	8:20	8:28	8:36	8:44	8:52
5:47	6:06	6:19	6:25	6:39	6:45	6:57	7:19	7:29	7:47	7:56	8:13	8:22	8:25	8:33	8:41	8:49	8:57	9:05	9:13	9:21	9:29	9:37	9:45
5:58	6:18	6:31	6:37	6:51	6:57	7:09	7:31	7:41	7:59	8:08	8:25	8:34	8:37	8:45	8:53	9:01	9:09	9:17	9:25	9:33	9:41	9:49	9:57
6:12	6:32	6:45	6:51	7:05	7:12	7:24	7:47	7:57	8:15	8:24	8:41	8:50	8:53	9:01	9:09	9:17	9:25	9:33	9:41	9:49	9:57	10:05	10:13
6:25	6:45	6:58	7:05	7:21	7:27	7:40	8:04	8:15	8:33	8:42	8:59	9:08	9:11	9:19	9:27	9:35	9:43	9:51	9:59	10:07	10:15	10:23	10:31
6:38	6:58	7:13	7:20	7:36	7:42	7:55	8:19	8:29	8:48	8:57	9:14	9:23	9:26	9:34	9:42	9:50	9:58	10:06	10:14	10:22	10:30	10:38	10:46
6:51	7:13	7:27	7:34	7:51	7:57	8:11	8:35	8:45	9:04	9:13	9:30	9:39	9:42	9:50	9:58	10:06	10:14	10:22	10:30	10:38	10:46	10:54	11:02
7:05	7:27	7:42	7:49	8:06	8:12	8:26	8:50	8:58	9:17	9:26	9:43	9:52	9:55	10:03	10:11	10:19	10:27	10:35	10:43	10:51	10:59	11:07	11:15
7:18	7:41	7:56	8:03	8:21	8:27	8:41	9:05	9:12	9:32	9:41	9:58	10:07	10:10	10:18	10:26	10:34	10:42	10:50	10:58	11:06	11:14	11:22	11:30
7:32	7:56	8:11	8:18	8:36	8:42	8:56	9:20	9:27	9:47	9:56	10:13	10:22	10:25	10:33	10:41	10:49	10:57	11:05	11:13	11:21	11:29	11:37	11:45
7:47	8:18	8:33	8:40	8:58	9:04	9:19	9:43	9:50	10:10	10:19	10:36	10:45	10:48	10:56	11:04	11:12	11:20	11:28	11:36	11:44	11:52	12:00	12:08
8:02	8:26	8:41	8:48	9:06	9:12	9:27	9:51	9:57	10:17	10:26	10:43	10:52	10:55	11:03	11:11	11:19	11:27	11:35	11:43	11:51	11:59	12:07	12:15
8:17	8:48	9:03	9:10	9:28	9:34	9:49	10:13	10:20	10:40	10:49	11:06	11:15	11:18	11:26	11:34	11:42	11:50	11:58	12:06	12:14	12:22	12:30	12:38
8:30	8:55	9:11	9:18	9:36	9:42	9:57	10:20	10:27	10:47	10:56	11:13	11:22	11:25	11:33	11:41	11:49	11:57	12:05	12:13	12:21	12:29	12:37	12:45
8:44	9:09	9:25	9:32	9:51	9:57	10:12	10:35	10:42	11:05	11:14	11:31	11:40	11:43	11:51	11:59	12:07	12:15	12:23	12:31	12:39	12:47	12:55	13:03
9:07	9:31	9:47	9:54	10:13	10:19	10:34	10:57	11:04	11:27	11:36	11:53	12:02	12:05	12:13	12:21	12:29	12:37	12:45	12:53	13:01	13:09	13:17	13:25
9:12	9:38	9:54	10:02	10:21	10:27	10:43	11:06	11:13	11:36	11:45	12:02	12:11	12:14	12:22	12:30	12:38	12:46	12:54	13:02	13:10	13:18	13:26	13:34
9:25	9:51	10:07	10:17	10:36	10:43	10:59	11:23	11:30	11:53	12:02	12:19	12:28	12:31	12:39	12:47	12:55	13:03	13:11	13:19	13:27	13:35	13:43	13:51
9:39	10:05	10:21	10:31	10:50	10:57	11:13	11:37	11:44	12:07	12:16	12:33	12:42	12:45	12:53	13:01	13:09	13:17	13:25	13:33	13:41	13:49	13:57	14:05
9:54	10:20	10:36	10:46	11:05	11:12	11:28	11:52	12:00	12:23	12:32	12:49	12:58	13:01	13:09	13:17	13:25	13:33	13:41	13:49	13:57	14:05	14:13	14:21
10:07	10:33	10:49	10:59	11:18	11:25	11:41	12:05	12:12	12:35	12:44	13:01	13:10	13:13	13:21	13:29	13:37	13:45	13:53	14:01	14:09	14:17	14:25	14:33
10:22	10:48	11:05	11:15	11:34	11:41	11:57	12:21	12:28	12:51	13:00	13:17	13:26	13:29	13:37	13:45	13:53	14:01	14:09	14:17	14:25	14:33	14:41	14:49
10:37	11:03	11:19	11:29	11:48	11:55	12:11	12:35	12:42	13:05	13:14	13:31	13:40	13:43	13:51	13:59	14:07	14:15	14:23	14:31	14:39	14:47	14:55	15:03
10:52	11:18	11:34	11:44	12:03	12:10	12:26	12:50	12:57	13:20	13:29	13:46	13:55	13:58	14:06	14:14	14:22	14:30	14:38	14:46	14:54	15:02	15:10	15:18
11:07	11:33	11:49	12:00	12:19	12:26	12:42	13:06	13:13	13:39	13:48	14:05	14:14	14:17	14:25	14:33	14:41	14:49	14:57	15:05	15:13	15:21	15:29	15:37
11:22	11:48	12:04	12:15	12:34	12:41	12:57	13:21	13:28	13:54	14:03	14:20	14:29	14:32	14:40	14:48	14:56	15:04	15:12	15:20	15:28	15:36	15:44	15:52
11:37	12:03	12:19	12:30	12:49	12:56	13:12	13:36	13:43	14:10	14:19	14:36	14:45	14:48	14:56	15:04	15:12	15:20	15:28	15:36	15:44	15:52	16:00	16:08
11:52	12:18	12:34	12:45	13:04	13:11	13:27	13:51	13:58	14:17	14:26	14:43	14:52	14:55	15:03	15:11	15:19	15:27	15:35	15:43	15:51	15:59	16:07	16:15
12:07	12:33	12:49	13:00	13:19	13:26	13:42	14:06	14:13	14:35	14:44	15:01	15:10	15:13	15:21	15:29	15:37	15:45	15:53	16:01	16:09	16:17	16:25	16:33
12:22	12:48	13:04	13:15	13:34	13:41	13:57	14:21	14:28	14:50	14:59	15:16	15:25	15:28	15:36	15:44	15:52	16:00	16:08	16:16	16:24	16:32	16:40	16:48
12:37	13:03	13:19	13:30	13:49	13:56	14:12	14:36	14:43	15:08	15:17	15:34	15:43	15:46	15:54	16:02	16:10	16:18	16:26	16:34	16:42	16:50	16:58	17:06
12:52	13:18	13:34	13:45	14:04	14:11	14:27	14:51	14:58	15:23	15:32	15:49	15:58	16:01	16:09	16:17	16:25	16:33	16:41	16:49	16:57	17:05	17:13	17:21
13:07	13:33	13:49	14:00	14:19	14:26	14:42	15:06	15:13	15:39	15:48	16:05	16:14	16:17	16:25	16:33	16:41	16:49	16:57	17:05	17:13	17:21	17:29	17:37
13:22	13:48	14:04	14:15	14:34	14:41	14:57	15:21	15:28	15:54	16:03	16:20	16:29	16:32	16:40	16:48	16:56	17:04	17:12	17:20	17:28	17:36	17:44	17:52
13:37	14:03	14:19	14:30	14:49	14:56	15:12	15:36	15:43	16:10	16:19	16:36	16:45	16:48	16:56	17:04	17:12	17:20	17:28	17:36	17:44	17:52	18:00	18:08
13:52	14:18	14:34	14:45	15:04	15:11	15:27	15:51	15:58	16:24	16:33	16:50	16:59	17:02	17:10	17:18	17:26	17:34	17:42	17:50	17:58	18:06	18:14	18:22
14:07	14:33	14:49	15:00	15:19	15:26	15:42	16:06	16:13	16:40	16:49	17:06	17:15	17:18	17:26	17:34	17:42	17:50	17:58	18:06	18:14	18:22	18:30	18:38
14:22	14:48	15:04	15:15	15:34	15:41	15:57	16:21	16:28	16:54	17:03	17:20	17:29	17:32	17:40	17:48	17:56	18:04	18:12	18:20	18:28	18:36	18:44	18:52
14:37	15:03	15:19	15:30	15:49	15:56	16:12	16:36	16:43	17:10	17:19	17:36	17:45	17:48	17:56	18:04	18:12	18:20	18:28	18:36	18:44	18:52	19:00	19:08
14:52	15:18	15:34	15:45	16:04	16:11	16:27	16:51	16:58	17:24	17:33	17:50	18:00	18:03	18:11	18:19	18:27	18:35	18:43	18:51	18:59	19:07	19:15	19:23
15:07	15:33	15:49	16:00	16:19	16:26	16:42	17:06	17:13	17:42	17:51	18:08	18:17	18:20	18:28	18:36	18:44	18:52	19:00	19:08	19:16	19:24	19:32	19:40
15:22	15:48	16:04	16:15	16:34	16:41	16:57	17:21	17:28	17:54	18:03	18:20	18:29	18:32	18:40	18:48	18:56	19:04	19:12	19:20	19:28	19:36	19:44	19:52
15:37	16:03	16:19	16:30	16:49	16:56	17:12	17:36	17:43	18:10	18:19	18:36	18:45	18:48	18:56	19:04	19:12	19:20	19:28	19:36	19:44	19:52	20:00	20:08
15:52	16:18	16:34	16:45	17:04	17:11	17:27	17:51	17:58	18:18	18:27	18:44	18:53	18:56	19:04	19:12	19:20	19:28	19:36	19:44	19:52	20:00	20:08	20:16
16:07	16:33	16:49	17:00	17:19	17:26																		



INSET MAP 1 - PATSAOURAS BUS PLAZA



- 1 LAX FlyAway
- 2 AVTA 785; LADOT DASH D; Mt St Mary's College Shuttle
- 3 CE 431, 534; LADOT Bunker Hill Shuttle; SC 794
- 4 FT 699; OCTA 701; USC Shuttles: HSC, UPC
- 5 Metro 40, 442, 704
- 6 Metro 33 [Owl trips before 1:00 am], 728, 733
- 7 Metro 745; Citadel Outlets Express
- 8 megabus.com
- 9 Discharge Only

LEGEND

- Line 704 Route
- Shortline Turnaround Loop at Nebraska & Sepulveda
- Rapid Stop
- Rapid Stop - Single Direction Only
- Rapid Stop Timepoint
- Metro Rail
- Metro Rail Station
- Metrolink
- Amtrak
- AV Antelope Valley Transit Authority
- BBB Santa Monica's Big Blue Bus
- C Culver CityBus
- CE LADOT Commuter Express
- LD LADOT DASH
- SC Santa Clarita Transit

MAP NOTES

- 1 Dodger Stadium
- 2 Braille Institute
- 3 LA City College
- 4 West Hollywood City Hall
- 5 Santa Monica Bl & Av of the Stars
Metro 4, 16, 28, 704, 728; AV 786;
CE 534, 573; SC 792, 797
- 6 St. John's Hospital
- 7 Santa Monica-UCLA Medical Center
- 8 Santa Monica Bl & 4th St / Broadway & 4th St
Metro 4 Owl, 20 Owl, 534; BBB 1, 2, 3, 4, 5, 7, 8, 9; Rapid 3, 7, 10
- 9 Third Street Promenade
- 10 Ocean Av & Arizona Av
Metro 4 Owl, 20 Owl, 33 Owl, 534, 704, 720, 733; BBB 1, 8; Rapid 10

Monday through Friday

Effective Dec 16 2018

704

Eastbound Al Este (Approximate Times/Tiempos Aproximados)

SANTA MONICA	WEST LOS ANGELES	WEST HOLLYWOOD	LOS ANGELES	ECHO PARK	DOWNTOWN LOS ANGELES
1	2	3	4	5	6
Ocean & Arizona	Santa Monica & Westwood	Santa Monica & San Vicente	Santa Monica & Vermont	Sunset & Echo Park	Pasadas Bus Plaza / LA Union Station
5:44A	6:04A	6:17A	6:40A	6:50A	7:02A
5:59	6:20	6:34	6:57	7:08	7:21
—	6:34	6:49	7:13	7:24	7:37
6:27	6:49	7:04	7:28	7:40	7:53
6:40	7:02	7:18	7:43	7:55	8:08
—	7:18	7:34	8:00	8:12	8:25
7:07	7:32	7:50	8:17	8:29	8:42
7:20	7:48	8:07	8:34	8:46	8:59
—	8:03	8:24	8:51	9:03	9:16
7:46	8:17	8:39	9:08	9:20	9:33
—	8:32	8:55	9:24	9:36	9:49
8:16	8:48	9:11	9:40	9:52	10:05
—	9:03	9:26	9:55	10:07	10:19
8:49	9:19	9:41	10:10	10:22	10:34
—	9:35	9:56	10:25	10:37	10:49
9:22	9:51	10:11	10:40	10:52	11:04
—	10:07	10:26	10:55	11:07	11:19
9:53	10:22	10:41	11:10	11:22	11:34
—	10:37	10:56	11:25	11:37	11:49
10:22	10:51	11:11	11:40	11:52	12:04P
—	11:06	11:26	11:55	12:07P	12:19
10:51	11:20	11:40	12:10P	12:22	12:35
—	11:33	11:54	12:25	12:37	12:50
11:19	11:48	12:09P	12:40	12:52	1:05
—	12:02P	12:24	12:55	1:07	1:20
11:47	12:17	12:39	1:10	1:22	1:35
—	12:31	12:53	1:25	1:38	1:51
12:14P	12:45	1:07	1:40	1:53	2:06
—	12:59	1:22	1:56	2:09	2:22
12:43	1:14	1:37	2:12	2:25	2:38
—	1:27	1:51	2:27	2:40	2:53
1:11	1:42	2:06	2:42	2:55	3:08
—	1:55	2:20	2:57	3:11	3:24
1:37	2:09	2:34	3:12	3:26	3:40
—	2:21	2:47	3:26	3:41	3:55
2:03	2:36	3:02	3:41	3:56	4:10
—	2:49	3:16	3:55	4:11	4:25
2:28	3:02	3:30	4:09	4:25	4:39
—	3:14	3:42	4:21	4:37	4:51
2:49	3:25	3:54	4:33	4:49	5:03
—	3:37	4:06	4:45	5:01	5:14
3:10	3:48	4:18	4:57	5:13	5:26
—	3:59	4:29	5:09	5:25	5:38
3:31	4:11	4:41	5:21	5:37	5:50
—	4:22	4:53	5:33	5:49	6:02
3:51	4:33	5:04	5:45	6:01	6:13
—	4:44	5:16	5:57	6:12	6:24
4:11	4:55	5:28	6:09	6:24	6:35
—	5:08	5:41	6:22	6:37	6:48
4:38	5:23	5:56	6:37	6:52	7:03
4:55	5:40	6:13	6:52	7:07	7:17
5:11	5:56	6:29	7:07	7:21	7:31
5:29	6:13	6:45	7:22	7:36	7:45
5:47	6:29	7:00	7:37	7:50	7:59
6:11	6:49	7:17	7:51	8:04	8:13
6:33	7:08	7:33	8:06	8:18	8:27
6:57	7:29	7:51	8:22	8:34	8:43
7:18	7:46	8:07	8:38	8:50	8:59
7:37	8:04	8:24	8:55	9:07	9:15
7:57	8:24	8:43	9:13	9:25	9:33
8:18	8:44	9:03	9:32	9:43	9:51
8:41	9:07	9:25	9:52	10:03	10:11
9:02	9:28	9:45	10:12	10:23	10:31
9:22	9:48	10:05	10:32	10:42	10:50
9:48	10:11	10:27	10:52	11:02	11:09
10:11	10:32	10:47	11:12	11:22	11:29
10:31	10:52	11:07	11:32	11:41	11:48
10:51	11:12	11:27	11:52	12:01A	12:08A
11:13	11:33	11:48	12:11A	12:20	12:27
11:35	11:55	12:09A	12:31	12:40	12:47

Westbound Al Oeste (Approximate Times/Tiempos Aproximados)

DOWNTOWN LOS ANGELES	ECHO PARK	LOS ANGELES	WEST HOLLYWOOD	WEST LOS ANGELES	SANTA MONICA
6	5	4	3	2	1
Pasadas Bus Plaza / LA Union Station	Sunset & Echo Park	Santa Monica & Vermont	Santa Monica & San Vicente	Santa Monica & Westwood	Ocean & Arizona
5:29A	5:40A	5:49A	6:08A	6:20A	6:39A
5:43	5:54	6:03	6:24	6:36	6:56
5:57	6:08	6:17	6:38	6:53	—
6:09	6:20	6:29	6:51	7:05	7:26
6:21	6:32	6:41	7:05	7:20	7:42
6:30	6:41	6:51	7:16	7:35	—
6:40	6:51	7:01	7:26	7:46	8:09
6:47	6:58	7:09	7:36	7:57	—
6:54	7:06	7:17	7:46	8:07	8:31
7:02	7:14	7:25	7:56	8:18	—
7:09	7:21	7:32	8:05	8:27	8:53
7:17	7:29	7:41	8:15	8:37	—
7:27	7:39	7:51	8:25	8:48	9:14
7:36	7:48	8:01	8:36	8:58	—
7:46	7:58	8:11	8:46	9:09	9:36
7:57	8:09	8:22	8:57	9:19	—
8:09	8:21	8:34	9:08	9:30	9:57
8:23	8:35	8:48	9:21	9:42	—
8:36	8:48	9:01	9:33	9:54	10:21
8:50	9:02	9:15	9:46	10:07	—
9:04	9:16	9:29	10:00	10:19	10:46
9:18	9:30	9:43	10:14	10:36	—
9:32	9:44	9:57	10:28	10:47	11:14
9:46	9:58	10:11	10:42	11:04	—
10:00	10:12	10:25	10:56	11:15	11:42
10:15	10:27	10:40	11:11	11:33	—
10:30	10:42	10:55	11:26	11:45	12:13P
10:45	10:57	11:10	11:42	12:04P	—
11:01	11:12	11:25	11:57	12:16	12:44
11:16	11:27	11:40	12:12P	12:36	—
11:30	11:42	11:55	12:27	12:47	1:15
11:44	11:56	12:10P	12:42	1:06	—
11:59	12:11P	12:25	12:57	1:17	1:45
12:15P	12:27	12:41	1:13	1:37	—
12:31	12:43	12:57	1:29	1:49	2:17
12:46	12:58	1:12	1:44	2:08	—
1:01	1:13	1:27	1:59	2:19	2:47
1:16	1:28	1:42	2:14	2:38	—
1:31	1:43	1:57	2:29	2:50	3:18
1:47	1:59	2:13	2:45	3:09	—
2:02	2:14	2:28	3:00	3:22	3:50
2:18	2:30	2:44	3:15	3:38	—
2:33	2:45	2:59	3:30	3:52	4:21
2:48	3:00	3:14	3:45	4:07	—
3:03	3:15	3:29	4:00	4:21	4:50
3:18	3:30	3:44	4:15	4:36	5:05
3:33	3:45	3:59	4:30	4:51	5:20
3:47	3:59	4:13	4:44	5:05	5:34
4:01	4:13	4:27	4:58	5:20	5:49
4:13	4:25	4:40	5:11	5:33	6:02
4:25	4:38	4:53	5:24	5:46	6:15
4:37	4:50	5:05	5:36	5:58	6:27
4:49	5:02	5:17	5:48	6:10	6:39
5:03	5:16	5:31	6:02	6:24	6:52
5:18	5:31	5:46	6:17	6:38	7:06
5:33	5:46	6:01	6:32	6:51	7:18
5:48	6:01	6:16	6:47	7:06	7:32
6:03	6:16	6:31	7:02	7:20	7:46
6:18	6:31	6:46	7:16	7:34	8:00
6:33	6:46	7:01	7:31	7:48	8:13
6:51	7:03	7:17	7:45	8:02	8:26
7:11	7:22	7:36	8:03	8:18	8:42
7:32	7:42	7:55	8:21	8:36	8:59
7:51	8:01	8:14	8:40	8:54	9:15
8:09	8:19	8:32	8:57	9:11	9:32
8:33	8:43	8:56	9:20	9:34	9:54
9:00	9:10	9:21	9:43	9:56	10:15
9:30	9:40	9:51	10:12	10:25	10:44

Eastbound Al Este (Approximate Times/Tiempos Aproximados)

SANTA MONICA	WEST LOS ANGELES	WEST HOLLYWOOD	LOS ANGELES	ECHO PARK	DOWNTOWN LOS ANGELES
1	2	3	4	5	6
Ocean & Arizona	Santa Monica & Westwood ^B	Santa Monica & San Vicente	Santa Monica & Vermont	Sunset & Echo Park	Pasadas Bus Plaza / LA Union Station
5:49A	6:10A	6:24A	6:45A	6:54A	7:02A
—	6:47	7:01	7:23	7:32	7:41
6:55	7:17	7:31	7:53	8:02	8:12
7:13	7:36	7:51	8:15	8:25	8:36
7:33	7:57	8:12	8:36	8:46	8:57
7:52	8:16	8:31	8:56	9:07	9:17
8:11	8:36	8:52	9:18	9:29	9:40
8:30	8:56	9:12	9:38	9:49	10:00
8:52	9:19	9:35	10:03	10:15	10:26
9:15	9:42	9:59	10:27	10:39	10:50
9:39	10:06	10:23	10:51	11:03	11:14
10:01	10:28	10:46	11:16	11:28	11:39
10:23	10:50	11:08	11:38	11:50	12:01P
10:45	11:13	11:32	12:03P	12:15P	12:26
11:07	11:37	11:56	12:28	12:41	12:52
11:28	11:59	12:18P	12:52	1:05	1:16
11:50	12:21P	12:41	1:15	1:28	1:40
12:13P	12:44	1:04	1:39	1:52	2:04
12:34	1:05	1:25	2:00	2:13	2:25
12:58	1:30	1:50	2:25	2:38	2:50
1:21	1:53	2:13	2:48	3:01	3:13
1:42	2:14	2:34	3:09	3:22	3:34
2:02	2:36	2:57	3:33	3:46	3:58
2:24	2:58	3:19	3:55	4:07	4:19
2:45	3:19	3:40	4:16	4:28	4:40
3:04	3:38	3:59	4:35	4:47	4:59
3:27	4:01	4:22	4:57	5:10	5:22
3:48	4:21	4:42	5:17	5:30	5:42
4:07	4:40	5:01	5:35	5:47	5:59
4:24	4:57	5:18	5:52	6:04	6:15
4:45	5:16	5:37	6:11	6:23	6:34
5:05	5:35	5:56	6:30	6:42	6:53
5:23	5:52	6:12	6:46	6:58	7:09
5:46	6:13	6:33	7:06	7:18	7:29
6:06	6:34	6:53	7:26	7:38	7:49
6:27	6:54	7:13	7:44	7:56	8:06
6:48	7:14	7:33	8:04	8:15	8:25
7:12	7:38	7:56	8:25	8:35	8:44
7:37	8:03	8:20	8:49	8:59	9:07
8:05	8:29	8:45	9:12	9:22	9:30
8:32	8:55	9:11	9:37	9:47	9:55
8:57	9:19	9:35	10:00	10:10	10:18
9:22	9:43	9:59	10:24	10:34	10:42
9:46	10:07	10:23	10:48	10:57	11:05
10:10	10:31	10:47	11:12	11:21	11:29
10:35	10:55	11:11	11:36	11:45	11:53
11:00	11:20	11:36	11:59	12:08A	12:16A
11:24	11:44	11:59	12:24A	12:32	12:40

Westbound Al Oeste (Approximate Times/Tiempos Aproximados)

DOWNTOWN LOS ANGELES	ECHO PARK	LOS ANGELES	WEST HOLLYWOOD	WEST LOS ANGELES	SANTA MONICA
6	5	4	3	2	1
Pasadas Bus Plaza / LA Union Station	Sunset & Echo Park	Santa Monica & Vermont	Santa Monica & San Vicente	Santa Monica & Westwood	Ocean & Arizona
6:04A	6:14A	6:24A	6:44A	6:56A	7:16A
6:28	6:38	6:48	7:08	7:20	7:41
6:48	6:58	7:08	7:28	7:41	8:02
7:14	7:24	7:34	7:56	8:10	8:31
7:32	7:43	7:54	8:17	8:32	8:56
7:52	8:03	8:14	8:38	8:53	9:17
8:11	8:22	8:33	8:58	9:13	9:37
8:32	8:43	8:54	9:19	9:34	10:00
8:50	9:01	9:12	9:40	9:56	10:24
9:10	9:21	9:32	10:01	10:17	10:45
9:29	9:40	9:52	10:21	10:37	11:06
9:52	10:03	10:16	10:45	11:01	11:30
10:12	10:23	10:36	11:06	11:22	11:52
10:31	10:42	10:55	11:25	11:42	12:12P
10:51	11:02	11:16	11:48	12:05P	12:36
11:11	11:22	11:36	12:09P	12:26	12:58
11:31	11:42	11:56	12:29	12:47	1:20
11:49	11:59	12:15P	12:48	1:06	1:39
12:11P	12:22P	12:37	1:10	1:28	2:01
12:32	12:43	12:58	1:31	1:49	2:22
12:51	1:02	1:17	1:50	2:08	2:41
1:09	1:21	1:36	2:11	2:30	3:03
1:30	1:42	1:57	2:32	2:51	3:24
1:51	2:03	2:18	2:50	3:09	3:41
2:12	2:24	2:39	3:11	3:30	4:02
2:33	2:45	3:00	3:32	3:51	4:23
2:54	3:06	3:21	3:52	4:10	4:42
3:12	3:24	3:39	4:09	4:27	4:59
3:31	3:43	3:58	4:28	4:46	5:17
3:51	4:03	4:17	4:47	5:05	5:36
4:10	4:21	4:35	5:05	5:23	5:54
4:29	4:40	4:54	5:24	5:41	6:10
4:51	5:02	5:16	5:45	6:01	6:28
5:14	5:25	5:38	6:07	6:23	6:50
5:35	5:46	5:59	6:28	6:44	7:13
5:58	6:09	6:22	6:51	7:07	7:35
6:19	6:30	6:43	7:12	7:28	7:55
6:43	6:54	7:07	7:36	7:52	8:17
7:10	7:21	7:34	8:01	8:15	8:39
7:41	7:52	8:04	8:31	8:45	9:07
8:06	8:17	8:29	8:55	9:09	9:31
8:32	8:42	8:53	9:19	9:33	9:54
8:56	9:06	9:17	9:43	9:57	10:16
9:20	9:30	9:41	10:07	10:21	10:40
9:44	9:54	10:05	10:31	10:45	11:04

Sunday & Holiday Schedules

Sunday & Holiday schedule in effect on New Year's Day, Memorial Day, Independence Day, Labor Day, Thanksgiving Day and Christmas Day.

Nextrip

Text "metro" and your intersection or stop number to 41411 (example: metro vignes&cesarechavez or metro 1563). You can also visit metro.net or call 511 and say "Nextrip"

Special Notes

- ^B Trips shown starting at Santa Monica & Westwood originate from Nebraska & Sepulveda approximately 4 - 8 minutes before time shown.
- ^C Trips shown ending at Santa Monica & Westwood continue to Nebraska & Sepulveda arriving approximately 5 minutes after time shown.

Horarios de domingo y días feriados

Horarios de domingo y días feriados en vigor para New Year's Day, Memorial Day, Independence Day, Labor Day, Thanksgiving Day and Christmas Day.

Nextrip

Envíe un mensaje de texto con "Metro" y la intersección de la calle o el número de su parada al 41411. Nextrip le enviará un mensaje de texto con la próxima llegada de cada autobús en esa parada. También puede visitar metro.net o llamar al 511 y decir "Nextrip"

Avisos especiales

- ^B Viajes mostrados en Santa Monica & Westwood comienzan de Nebraska & Sepulveda aproximadamente 4 - 8 minutos antes de la hora mostrada.
- ^C Viajes mostrados terminando en Santa Monica & Westwood continúan a Nebraska & Sepulveda llegando aproximadamente 5 minutos después que la hora mostrada.

Sunday and Holiday Schedule

Effective Dec 16 2018

704

Eastbound *Al Este* (Approximate Times/Tiempos Aproximados)

SANTA MONICA	WEST LOS ANGELES	WEST HOLLYWOOD	LOS ANGELES	ECHO PARK	DOWNTOWN LOS ANGELES
1	2	3	4	5	6
Ocean & Arizona	Santa Monica & Westwood	Santa Monica & San Vicente	Santa Monica & Vermont	Sunset & Echo Park	Patsaouras Bus Plaza / LA Union Station
7:16A	7:35A	7:48A	8:11A	8:21A	8:31A
7:45	8:04	8:17	8:41	8:51	9:02
8:03	8:24	8:37	9:01	9:11	9:22
8:31	8:53	9:06	9:31	9:42	9:53
8:58	9:20	9:34	9:59	10:10	10:21
9:27	9:49	10:03	10:31	10:42	10:53
9:45	10:07	10:23	10:51	11:02	11:12
10:12	10:35	10:51	11:19	11:31	11:41
10:39	11:02	11:18	11:46	11:58	12:09P
11:05	11:29	11:45	12:13P	12:25P	12:36
11:22	11:46	12:02P	12:31	12:43	12:54
11:40	12:06P	12:22	12:51	1:03	1:14
12:03P	12:30	12:46	1:16	1:28	1:39
12:19	12:46	1:02	1:32	1:44	1:55
12:43	1:10	1:26	1:56	2:08	2:19
1:00	1:27	1:43	2:14	2:26	2:37
1:27	1:53	2:10	2:41	2:53	3:04
1:45	2:11	2:28	2:59	3:11	3:22
2:03	2:29	2:46	3:17	3:29	3:39
2:27	2:53	3:10	3:41	3:53	4:03
2:48	3:14	3:31	4:02	4:13	4:23
3:12	3:38	3:58	4:29	4:40	4:51
3:35	4:01	4:17	4:47	4:58	5:09
3:51	4:17	4:33	5:03	5:14	5:25
4:20	4:46	5:02	5:32	5:43	5:54
4:38	5:04	5:20	5:50	6:01	6:12
5:05	5:31	5:47	6:17	6:28	6:38
5:19	5:45	6:01	6:31	6:42	6:52
5:41	6:07	6:23	6:53	7:04	7:13
6:10	6:36	6:52	7:20	7:30	7:39
6:31	6:56	7:12	7:40	7:50	7:59
6:54	7:18	7:34	8:01	8:11	8:20
7:22	7:44	7:59	8:24	8:34	8:43
7:46	8:08	8:23	8:48	8:58	9:06
8:10	8:32	8:47	9:12	9:22	9:30
8:34	8:56	9:11	9:36	9:45	9:53
9:02	9:23	9:37	10:00	10:09	10:17
9:27	9:48	10:02	10:24	10:33	10:41
9:53	10:13	10:26	10:48	10:57	11:05
10:18	10:37	10:50	11:12	11:20	11:28
10:42	11:01	11:14	11:36	11:44	11:52
11:08	11:26	11:39	11:59	12:08A	12:16A
11:34	11:52	12:05A	12:26A	12:34	12:42

Westbound *Al Oeste* (Approximate Times/Tiempos Aproximados)

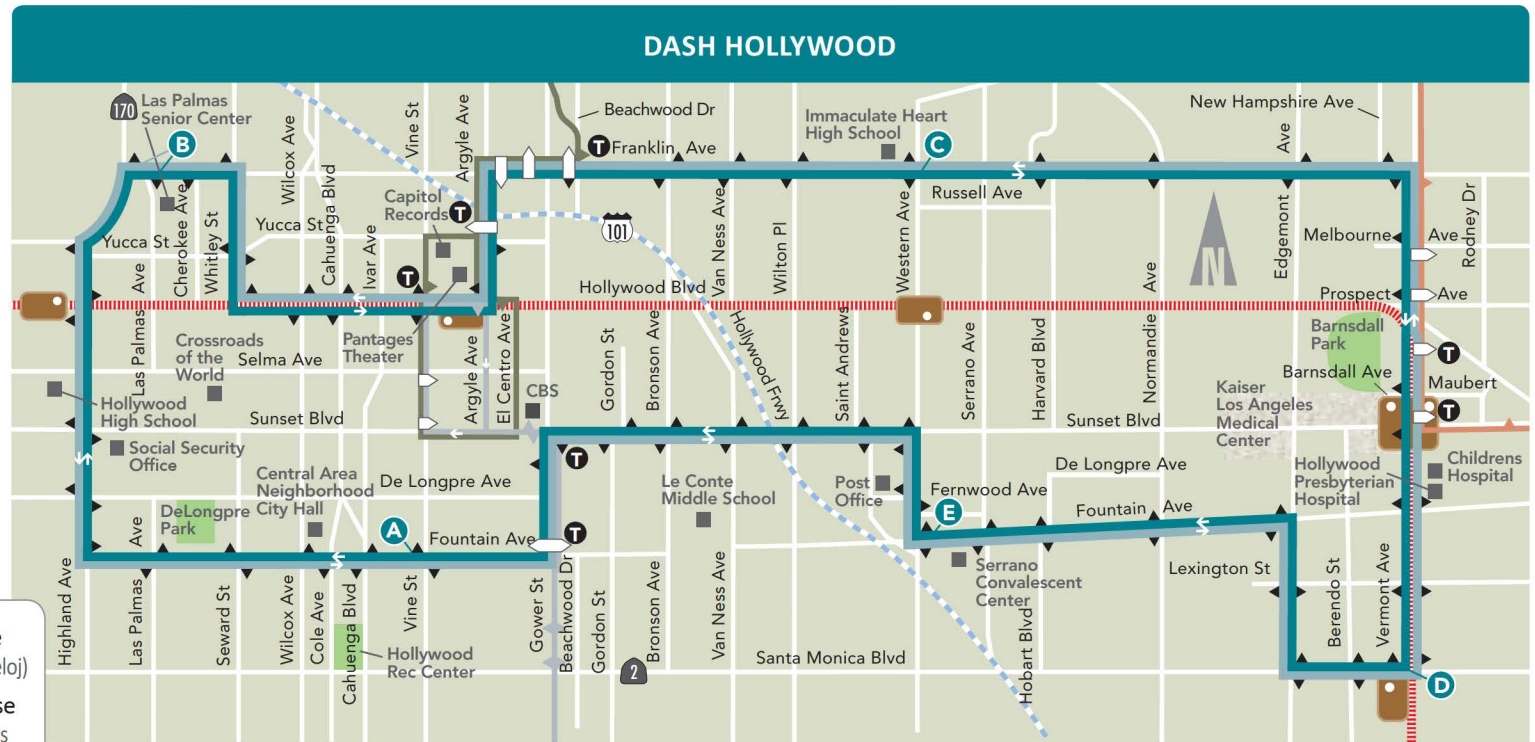
DOWNTOWN LOS ANGELES	ECHO PARK	LOS ANGELES	WEST HOLLYWOOD	WEST LOS ANGELES	SANTA MONICA
6	5	4	3	2	1
Patsaouras Bus Plaza / LA Union Station	Sunset & Echo Park	Santa Monica & Vermont	Santa Monica & San Vicente	Santa Monica & Westwood	Ocean & Arizona
6:40A	6:51A	7:00A	7:20A	7:32A	7:50A
7:15	7:26	7:36	7:58	8:10	8:30
7:45	7:56	8:07	8:30	8:42	9:02
8:02	8:13	8:24	8:47	8:59	9:19
8:21	8:32	8:43	9:07	9:20	9:42
8:40	8:51	9:02	9:26	9:40	10:03
9:10	9:21	9:32	9:58	10:12	10:36
9:29	9:40	9:52	10:18	10:32	10:56
9:49	10:00	10:12	10:38	10:53	11:19
10:08	10:19	10:31	10:59	11:14	11:41
10:27	10:38	10:51	11:22	11:37	12:04P
10:46	10:57	11:11	11:41	11:57	12:26
11:07	11:18	11:32	12:02P	12:18P	12:47
11:27	11:38	11:51	12:21	12:37	1:06
11:46	11:57	12:11P	12:41	12:57	1:26
12:06P	12:17P	12:31	1:01	1:17	1:46
12:26	12:37	12:51	1:21	1:37	2:07
12:46	12:57	1:11	1:41	1:57	2:27
1:06	1:17	1:31	2:01	2:17	2:47
1:26	1:37	1:51	2:21	2:37	3:07
1:50	2:01	2:15	2:45	3:02	3:32
2:14	2:25	2:39	3:09	3:26	3:57
2:30	2:41	2:55	3:26	3:43	4:14
2:53	3:04	3:18	3:49	4:06	4:37
3:11	3:22	3:36	4:07	4:24	4:54
3:38	3:49	4:03	4:34	4:50	5:19
4:10	4:21	4:34	5:05	5:21	5:50
4:33	4:44	4:57	5:27	5:42	6:09
4:57	5:08	5:21	5:49	6:04	6:31
5:26	5:37	5:50	6:17	6:32	6:58
5:49	6:00	6:13	6:40	6:54	7:20
6:22	6:33	6:46	7:14	7:28	7:54
6:45	6:56	7:09	7:37	7:51	8:16
7:14	7:25	7:38	8:04	8:17	8:39
7:42	7:53	8:06	8:32	8:45	9:06
8:13	8:24	8:36	9:02	9:15	9:36
8:46	8:57	9:08	9:30	9:43	10:04
9:15	9:26	9:37	9:59	10:12	10:33
9:45	9:56	10:07	10:29	10:41	11:02

CLOCKWISE ROUTE/EN EL SENTIDO DE LAS MANECILLAS DEL RELOJ

	LEAVES/SALE FOUNTAIN & VINE A	FRANKLIN & LAS PALMAS B	FRANKLIN & WESTERN C	SANTA MONICA & VERMONT D	FOUNTAIN & WESTERN E	ARRIVES/LLEGA FOUNTAIN & VINE A
MONDAY-FRIDAY/LUNES-VIERNES						
FIRST BUS/ PRIMER AUTOBÚS	6:00am	6:08	6:18	6:28	6:38	6:50
30	then every 30 minutes until /entonces cada 30 minutos hasta					
LAST BUS/ ÚLTIMO AUTOBÚS	7:00pm	7:08	7:18	7:28	7:38	7:50
SATURDAY & SUNDAY/SÁBADO Y DOMINGO						
FIRST BUS/ PRIMER AUTOBÚS	9:00AM	9:08	9:18	9:28	9:38	9:50
30	then every 30 minutes until /entonces cada 30 minutos hasta					
LAST BUS SAT/ ÚLTIMO AUTOBÚS SÁBADO	6:30pm	6:38	6:48	6:58	7:08	7:20
LAST BUS SUN/ ÚLTIMO AUTOBÚS DOMINGO	6:00pm	6:08	6:18	6:28	6:38	6:50

COUNTERCLOCKWISE ROUTE/EN EL SENTIDO OPUESTO DE LAS MANECILLAS DEL RELOJ

	LEAVES/SALE FOUNTAIN & VINE A	FOUNTAIN & WESTERN E	SANTA MONICA & VERMONT D	FRANKLIN & WESTERN C	FRANKLIN & LAS PALMAS B	ARRIVES/LLEGA FOUNTAIN & VINE A
MONDAY-FRIDAY/LUNES-VIERNES						
FIRST BUS/ PRIMER AUTOBÚS	6:00am	6:08	6:18	6:28	6:38	6:50
30	then every 30 minutes until /entonces cada 30 minutos hasta					
LAST BUS/ ÚLTIMO AUTOBÚS	7:00pm	7:08	7:18	7:28	7:38	7:50
SATURDAY & SUNDAY/SÁBADO Y DOMINGO						
FIRST BUS/ PRIMER AUTOBÚS	9:00am	9:08	9:18	9:28	9:38	9:50
30	then every 30 minutes until /entonces cada 30 minutos hasta					
LAST BUS SAT/ ÚLTIMO AUTOBÚS SÁBADO	6:30pm	6:38	6:48	6:58	7:08	7:20
LAST BUS SUN/ ÚLTIMO AUTOBÚS DOMINGO	6:00pm	6:08	6:18	6:28	6:38	6:50



- DASH Hollywood - Clockwise Route
(Ruta en el Sentido de las Manecillas del Reloj)
- DASH Hollywood - Counterclockwise Route
(Ruta en el Sentido Opuesto de las Manecillas del Reloj)
- DASH Hollywood/Wilshire Route
- DASH Los Feliz/Observatory Route
- DASH Beachwood Canyon Route
- - - Commuter Express Routes 422 & 423
- ||||| Metro Rail Red Line
- ▲ Bus Stop (Parada de Autobús)
- ◁ Multiple Route Stop
(Parada de Rutas Múltiples)
- Points of Interest (Puntos de Interés)
- A Time Point (Punto Clave de Horario)
- T Transfer Point (Punto de Transbordo)
- Metro Rail Station & Entrance
(Estación y Entrada de Metro)

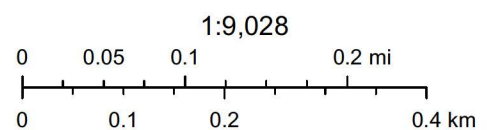
APPENDIX H

**MOBILITY NETWORK
WALKABILITY INDEX MAPS
BICYCLE PLAN MAPS
PEDESTRIAN DESTINATION MAPS
&
HIGH INJURY NETWORK MAP**

Metro Station/Lines

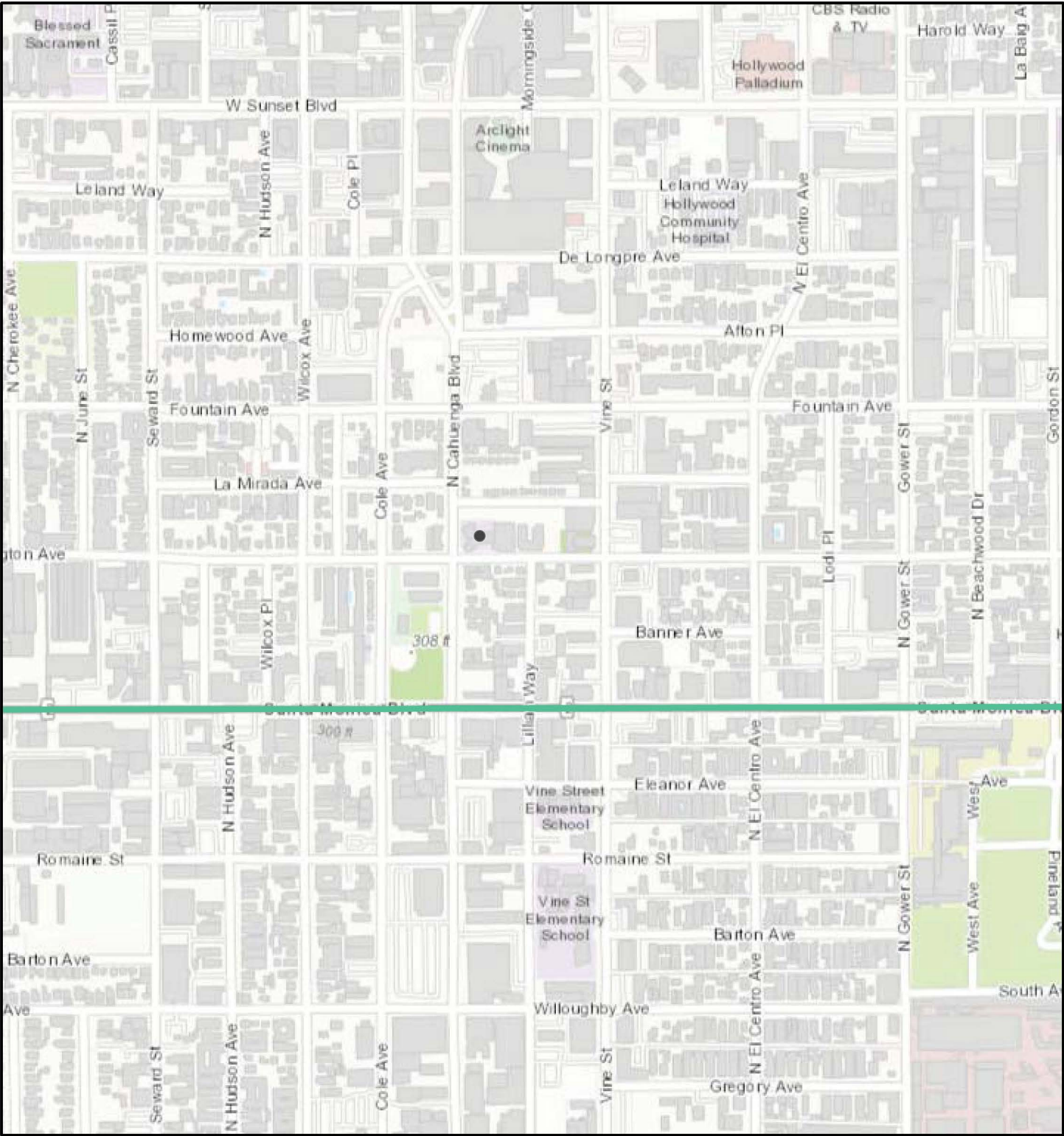


6/19/2021, 5:40:57 AM



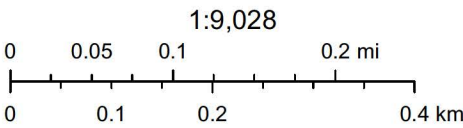
County of Los Angeles, Bureau of Land Management, Esri, HERE, Garmin, INCREMENT P, Intermap, USGS, METI/NASA, EPA, USDA

Transit Enhanced Area



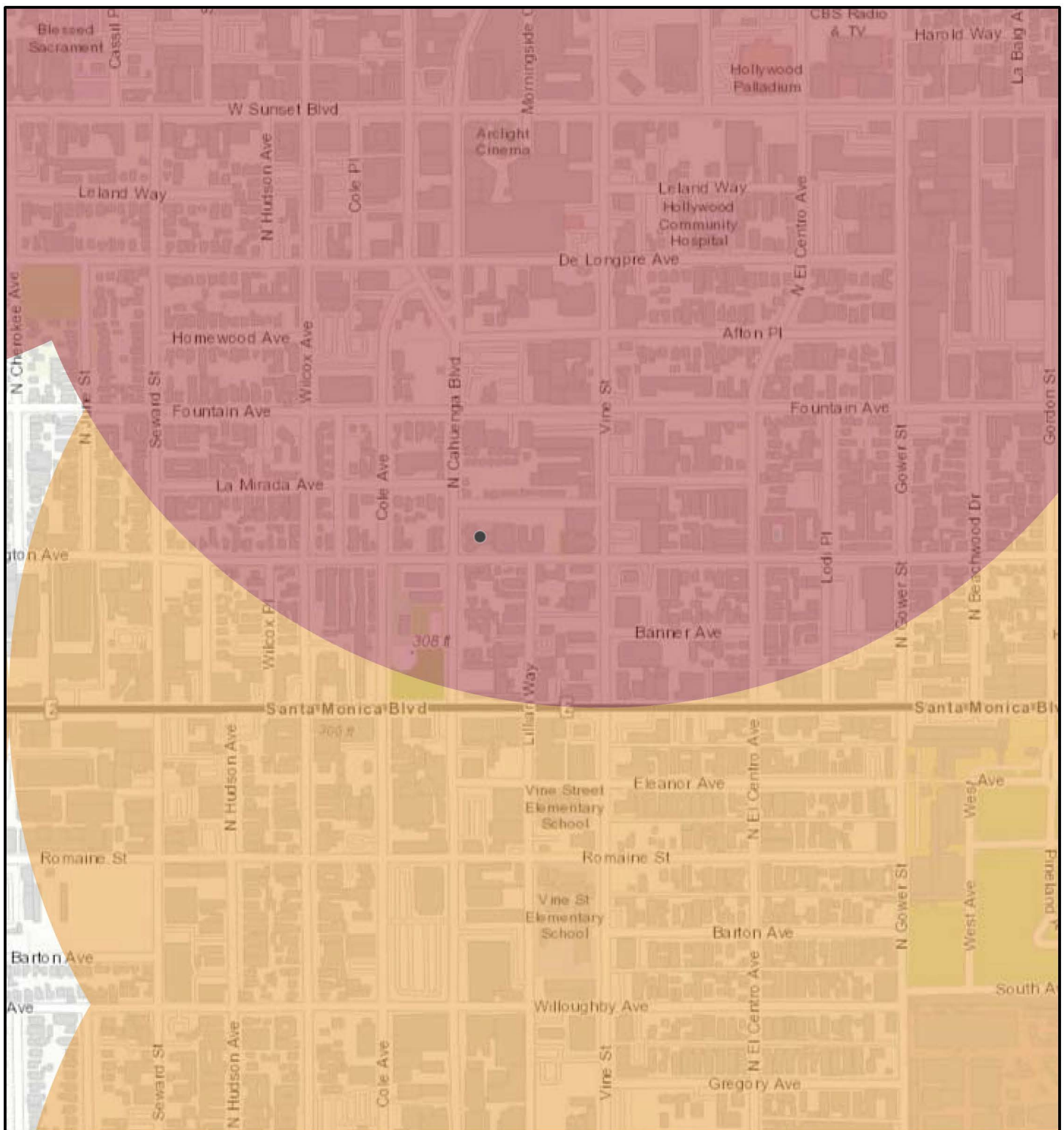
6/19/2021, 5:43:57 AM

Transit Enhanced Network (TEN)



County of Los Angeles, Bureau of Land Management, Esri, HERE, Garmin, INCREMENT P, Intermap, USGS, METI/NASA, EPA, USDA

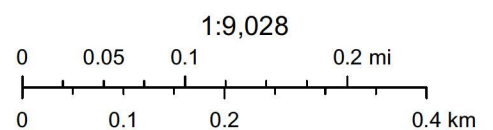
Transit Priority Area



6/19/2021, 5:43:34 AM

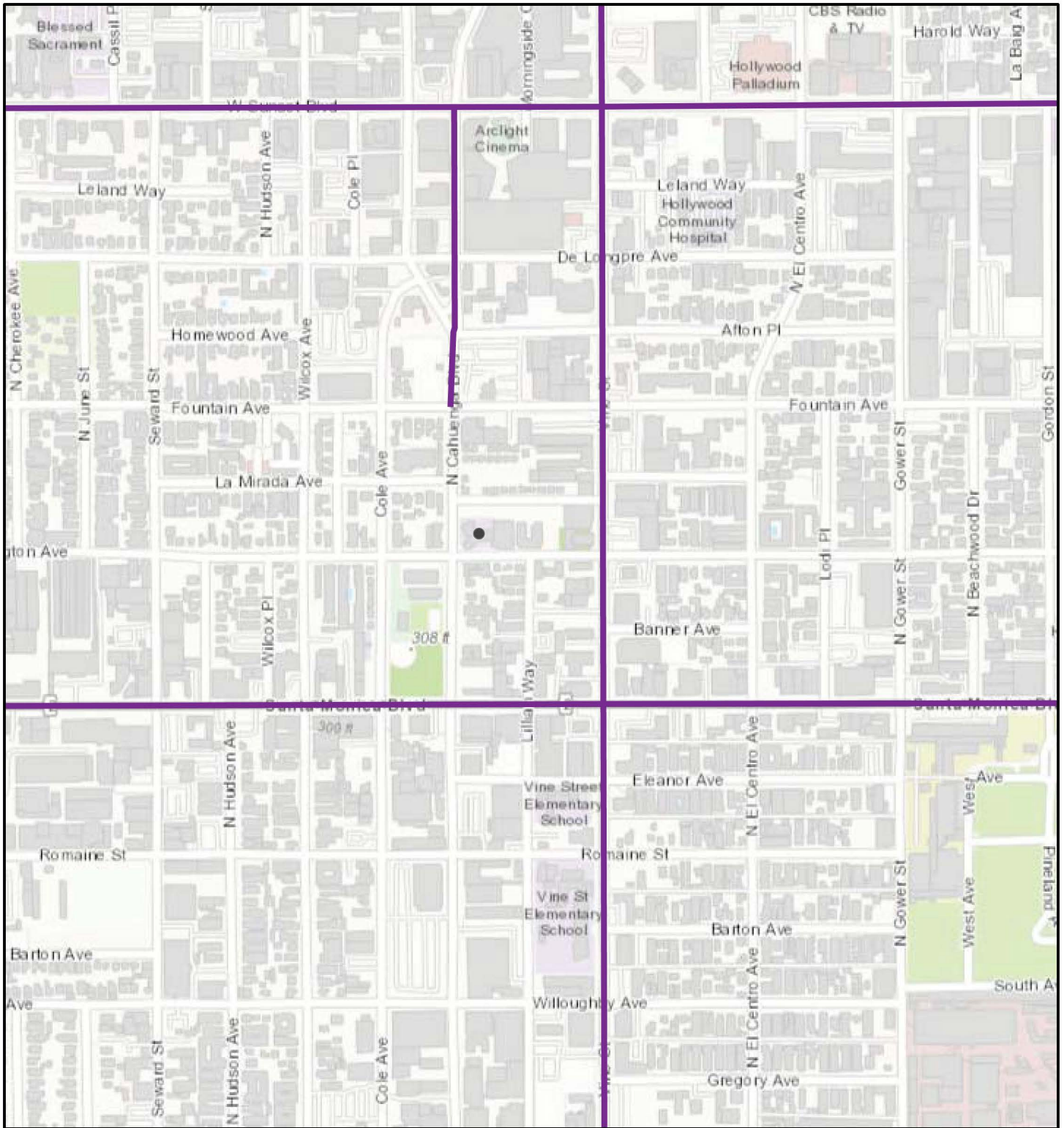
Transit Priority Area (TPA)

- Heavy Rail
- Major Bus Routes



County of Los Angeles, Bureau of Land Management, Esri, HERE, Garmin, INCREMENT P, Intermap, USGS, METI/NASA, EPA, USDA

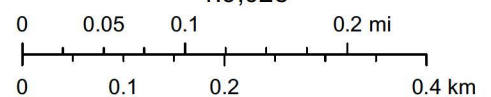
High Injury Network



6/19/2021, 5:46:59 AM

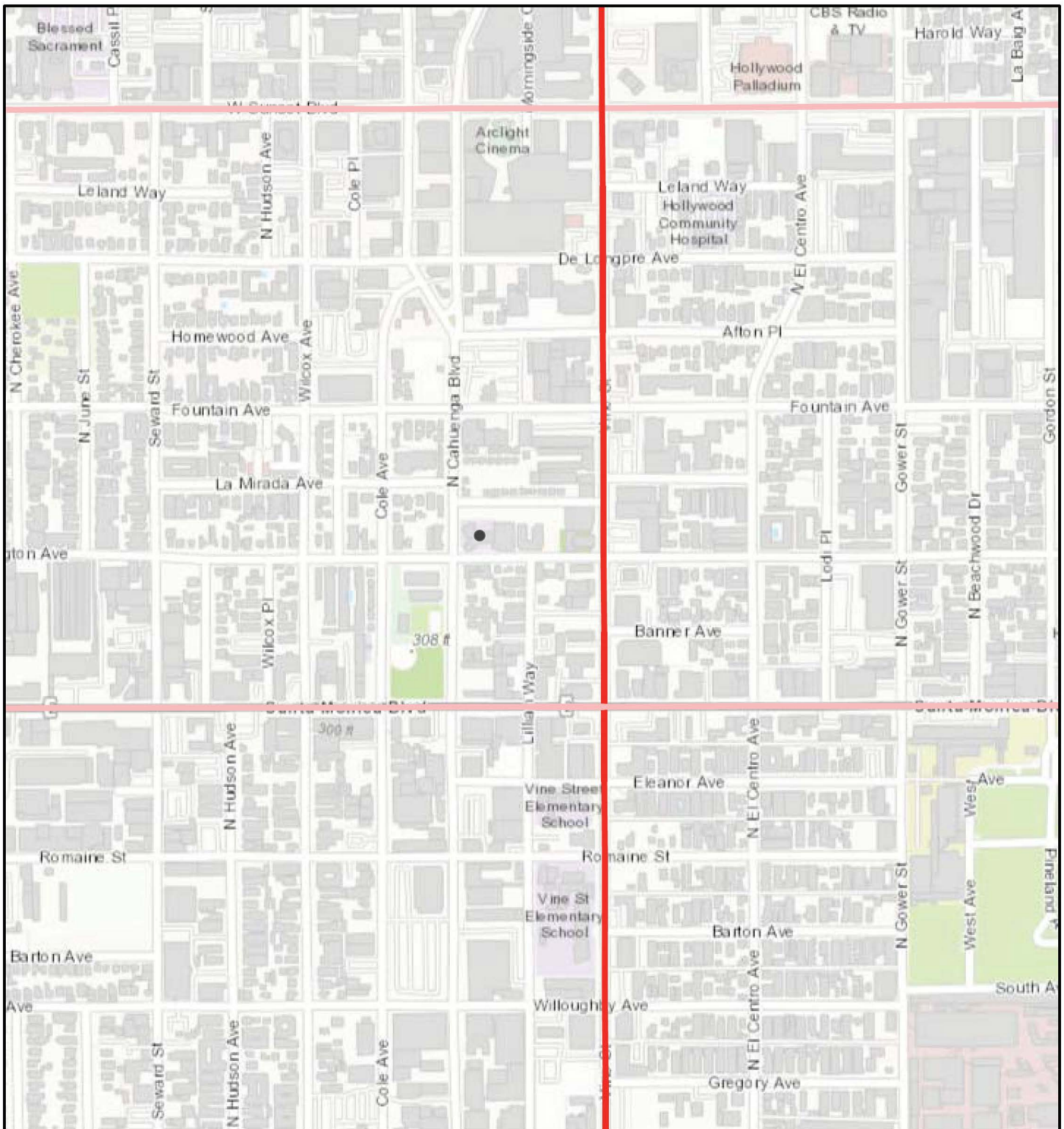
High Injury Network

1:9,028



County of Los Angeles, Bureau of Land Management, Esri, HERE, Garmin,
INCREMENT P, Intermap, USGS, METI/NASA, EPA, USDA

Bicycle Network

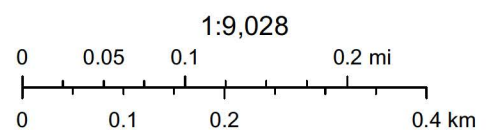


6/19/2021, 5:44:17 AM

Bicycle Network

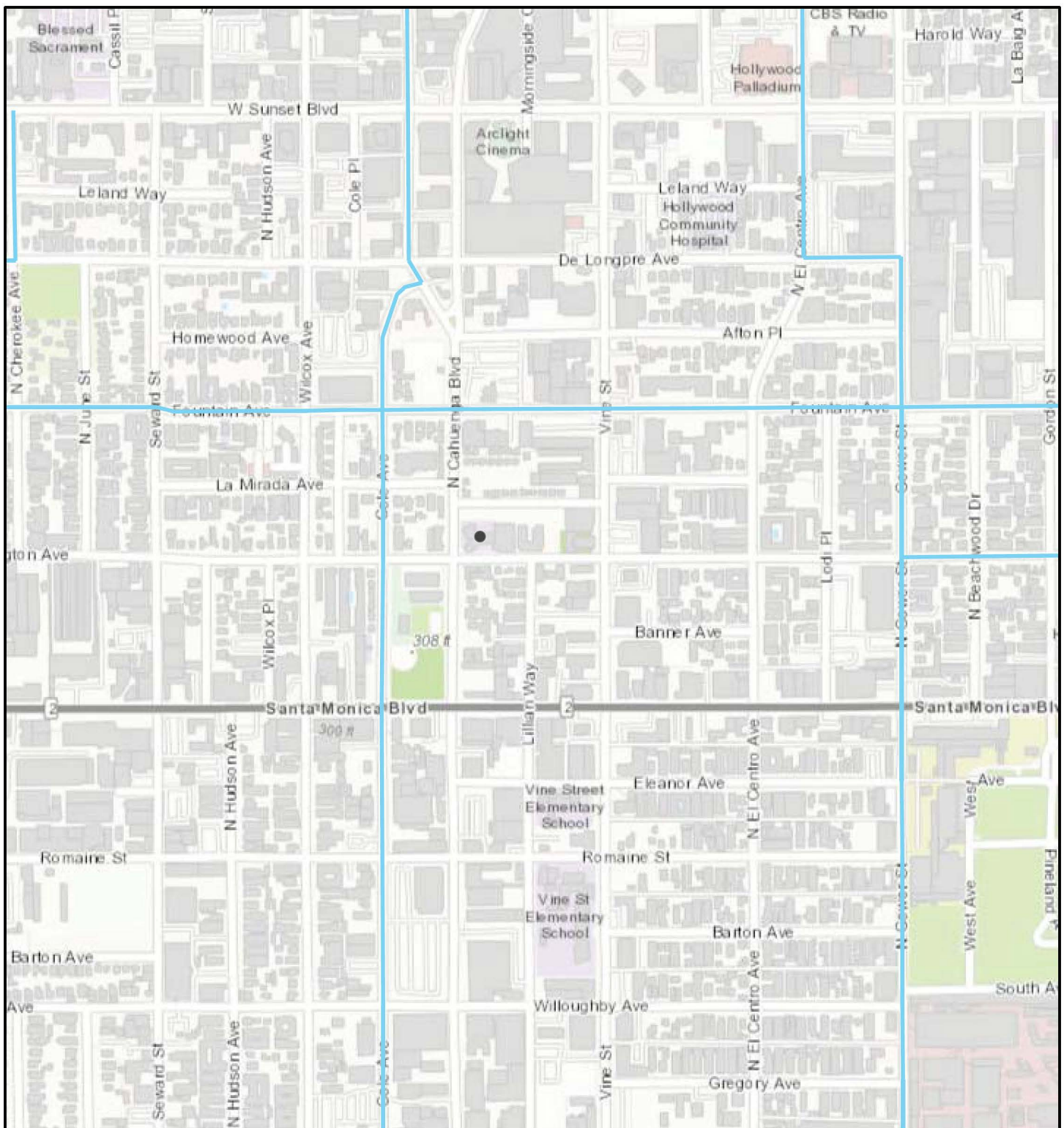
— Tier 2 (BLN)

— Tier 3 (BLN)



County of Los Angeles, Bureau of Land Management, Esri, HERE, Garmin, INCREMENT P, Intermap, USGS, METI/NASA, EPA, USDA

Neighborhood Enhanced Network

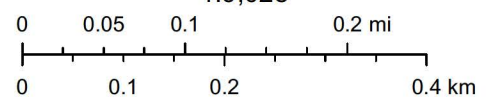


6/19/2021, 5:46:05 AM

Neighborhood Network (NEN)

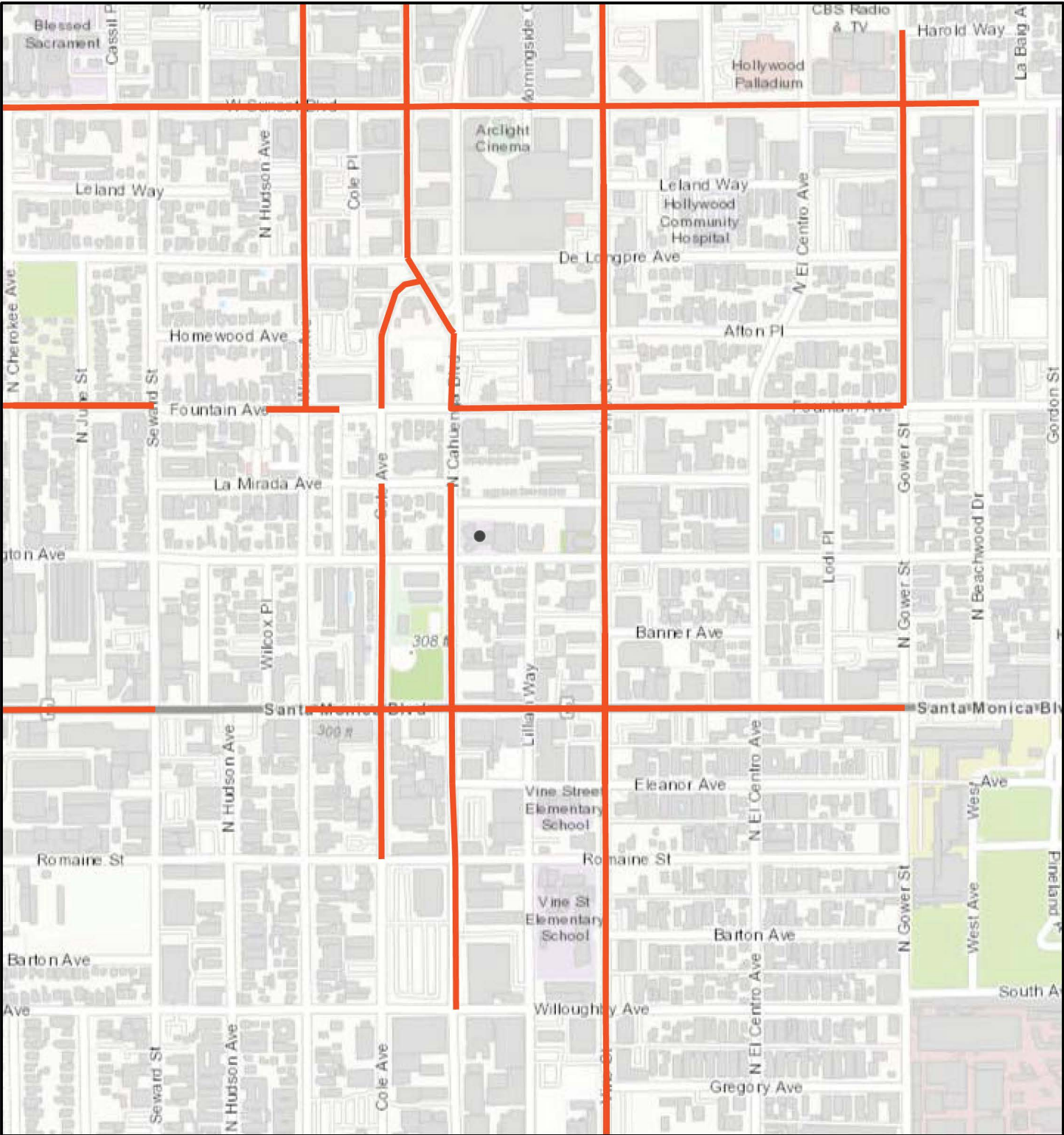
— Tier 2 NEN

1:9,028



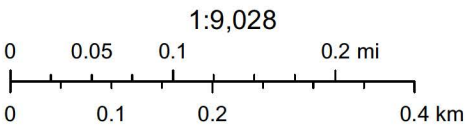
County of Los Angeles, Bureau of Land Management, Esri, HERE, Garmin,
INCREMENT P, Intermap, USGS, METI/NASA, EPA, USDA

Pedestrian Enhanced District



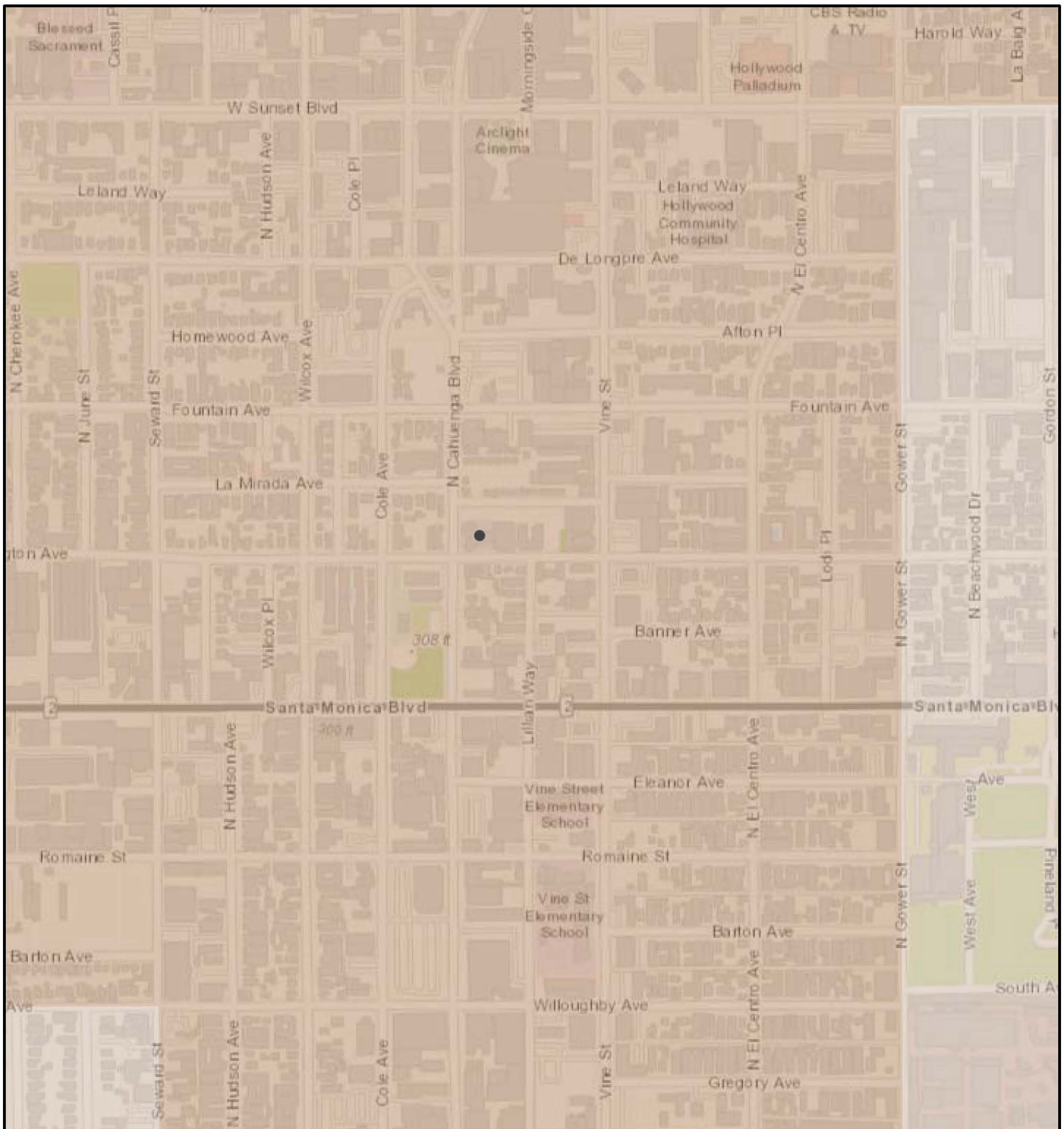
6/19/2021, 5:46:33 AM

 Pedestrian Enhanced Districts (PEDs)



County of Los Angeles, Bureau of Land Management, Esri, HERE, Garmin, INCREMENT P, Intermap, USGS, METI/NASA, EPA, USDA

Walkability Index

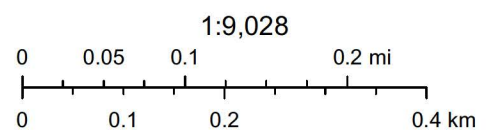


6/19/2021, 5:47:17 AM

Walkability Index

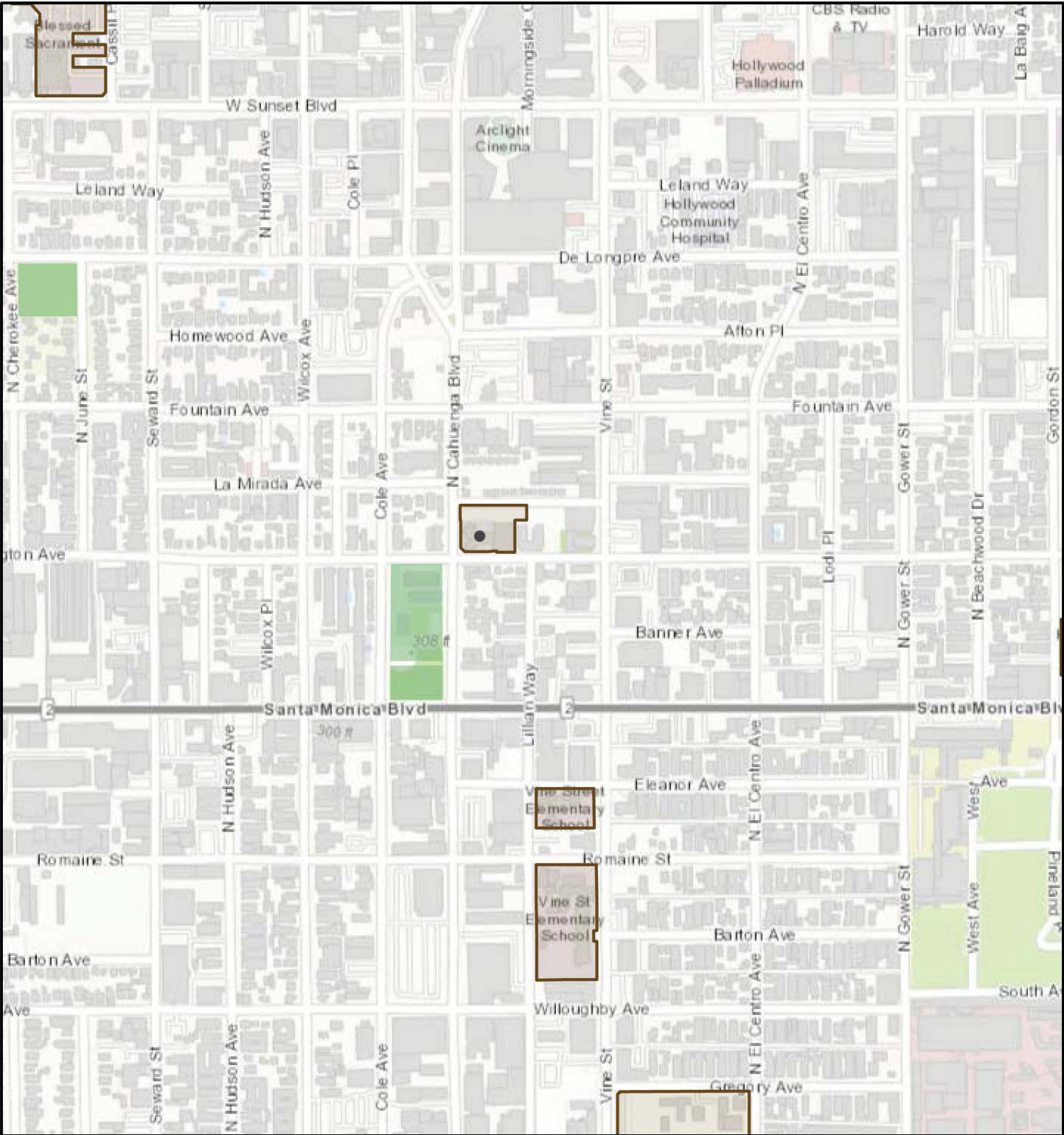


High Walkability



County of Los Angeles, Bureau of Land Management, Esri, HERE, Garmin, INCREMENT P, Intermap, USGS, METI/NASA, EPA, USDA

Library, Schools, Green Network, Parks

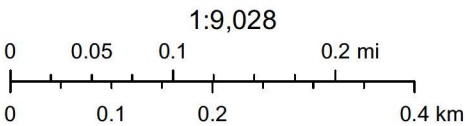


6/19/2021, 5:48:34 AM

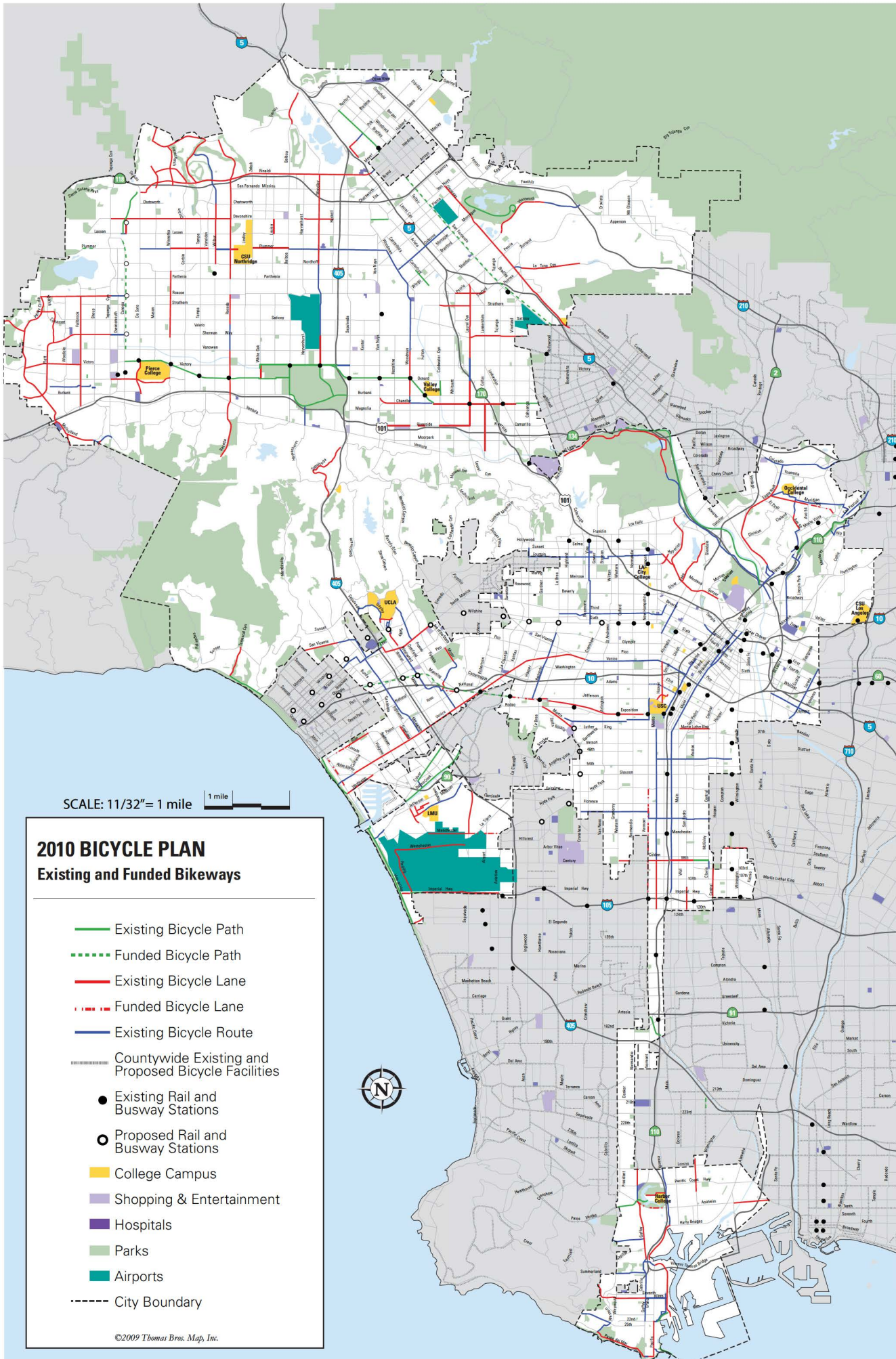
Schools

 Schools

 Parks



County of Los Angeles, Bureau of Land Management, Esri, HERE, Garmin, INCREMENT P, Intermap, USGS, METI/NASA, EPA, USDA



APPENDIX I

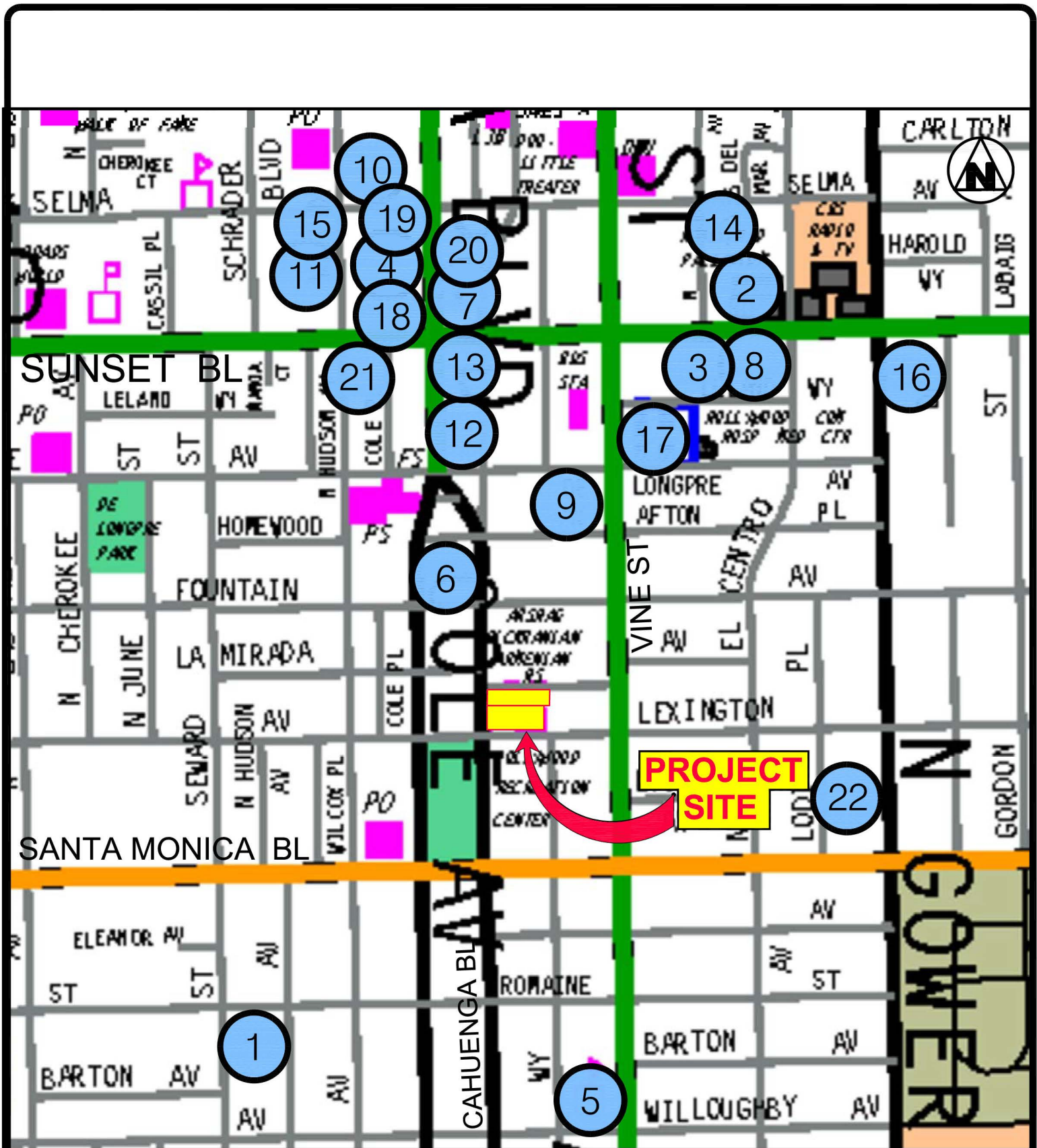
RELATED PROJECT INFORMATION

RELATED PROJECT LIST
1200 Cahuenga Boulevard

#	Project	Size	Location	Daily Traffic	AM Peak Hour			PM Peak Hours		
					In	Out	Total	In	Out	Total
1	Office	130,000 sf	956 N. Seward Street							
2	Palladium Residences		6201 W. Sunset Boulevard	4913	128	228	356	234	169	403
	Apartments/Condos	731 units								
	OR Apartments/Condos	598 units								
	with Hotel	250 rooms								
	Retail	21,000 sf								
	Restaurant	7,000 sf								
3	Apartments	200 units	6230 W. Sunset Boulevard	1473	52	80	132	71	50	121
	Office	32,100 sf								
	Retail	4,700 sf								
4	Hotel	69 rooms	1525 N Cahuenga Boulevard	469	10	12	22	20	14	34
5	Apartments	85 units	901 N. Vine Street	-32	4	26	30	-5	1	-4
	Restaurant	4,000 sf								
	Retail	4,000 sf								
6	Apartments	375 units	1310 N. Cole Avenue	224	24	6	30	7	23	30
	Creative Office	2,800 sf								
7	Hotel	275 rooms	6409 W. Sunset Boulevard	1285	51	26	77	53	60	113
	Retail	1,900 sf								
8	Apartments	270 units	6200 W. Sunset Boulevard	1243	-2	76	74	73	23	96
	Restaurant	1,750 sf								
	Retail	8,070 sf								
	Pharmacy	2,300 sf								
9	Academy Square		6332 W. De Longpre Avenue	3981	282	91	373	118	208	326
	Apartments	200 units								
	Office	298,000 sf								
	Quality Restaurant	11,900 sf								
	High Turnover Restaurant	4,200 sf								
10	Hotel	114 rooms	6421 W. Selma Avenue	1277	43	27	70	56	44	100
	Restaurant	5,041 sf								
	Retail	1,809 sf								

RELATED PROJECT LIST
1200 Cahuenga Boulevard

#	Project	Size	Location	Daily Traffic	AM Peak Hour			PM Peak Hours		
					In	Out	Total	In	Out	Total
11	Hotel	190 rooms	1541 N. Wilcox Avenue	2058	76	57	133	82	75	157
	Restaurant	4,463 sf								
	Meeting Room	1,382 sf								
12	Hotel	220 rooms	1400 N. Cahuenga Boulevard	1875	55	47	102	78	60	138
	Restaurant	2,723 sf								
	Rooftop lounge/bar	1,440 sf								
13	Apartments	200 units	6400 W. Sunset Boulevard	-59	14	76	90	24	-26	-2
	Retail	7,000 sf								
14	Apartments	276 units	1546 N. Argyle Avenue	2073	43	127	170	128	51	179
	Retail	9,000 sf								
	Restaurant	15,000 sf								
15	Retail/Restaurant/Bar	14,800 sf	1545 N. Wilcox Avenue	2341	36	50	86	128	47	175
	Office	16,100 sf								
16	Sunset Gower Studios		6050 W. Sunset Boulevard	4108	424	68	492	77	409	486
	Sound Stage/Office	859,350 sf								
17	Apartments	170 units	1400 N. Vine Street	1446	70	93	163	97	56	153
	Affordable Apartments	19 units								
	Retail	16,000 sf								
18	Hotel	175 rooms	6445 W. Sunset Boulevard	1409	77	58	135	80	61	141
	Restaurant/Bar	11,400 sf								
19	Apartments	45 units	6422 W. Selma Avenue	126	-3	10	7	9	-1	8
20	Apartments	243 units	1520 N. Cahuenga Boulevard	1143	34	75	109	82	40	122
	Affordable Apartments	27 units								
	High Turnover Restaurant	6,805 sf								
21	Office	431,032 sf	6450 W. Sunset Boulevard	2,836	311	50	361	93	319	412
	Restaurant	12,386 sf								
22	Apartments	155 units	1125 N Gower Street	667	16	39	55	38	25	63
	Affordable Apartments	14 units								



FIGURE

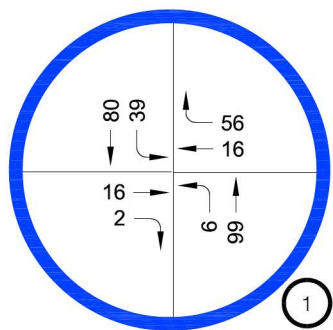
7/2021

RELATED PROJECT LOCATION MAP

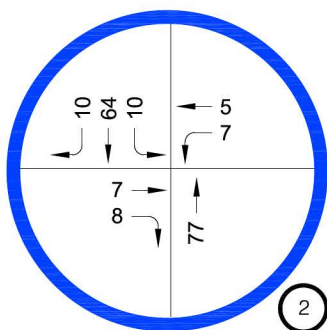


Overland Traffic Consultants, Inc.

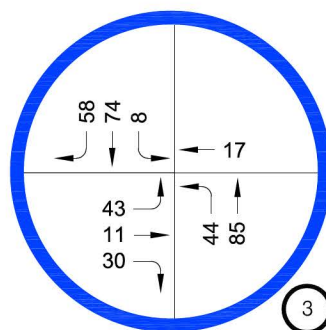
952 Manhattan Beach Bl, #100, Manhattan Beach, CA 90266
(310) 545-1235, liz@overlandtraffic.com



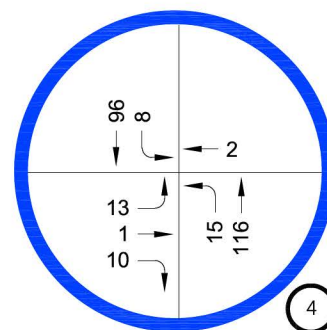
CAHUENGA BOULEVARD & FOUNTAIN AVENUE



CAHUENGA BOULEVARD & LEXINGTON AVENUE

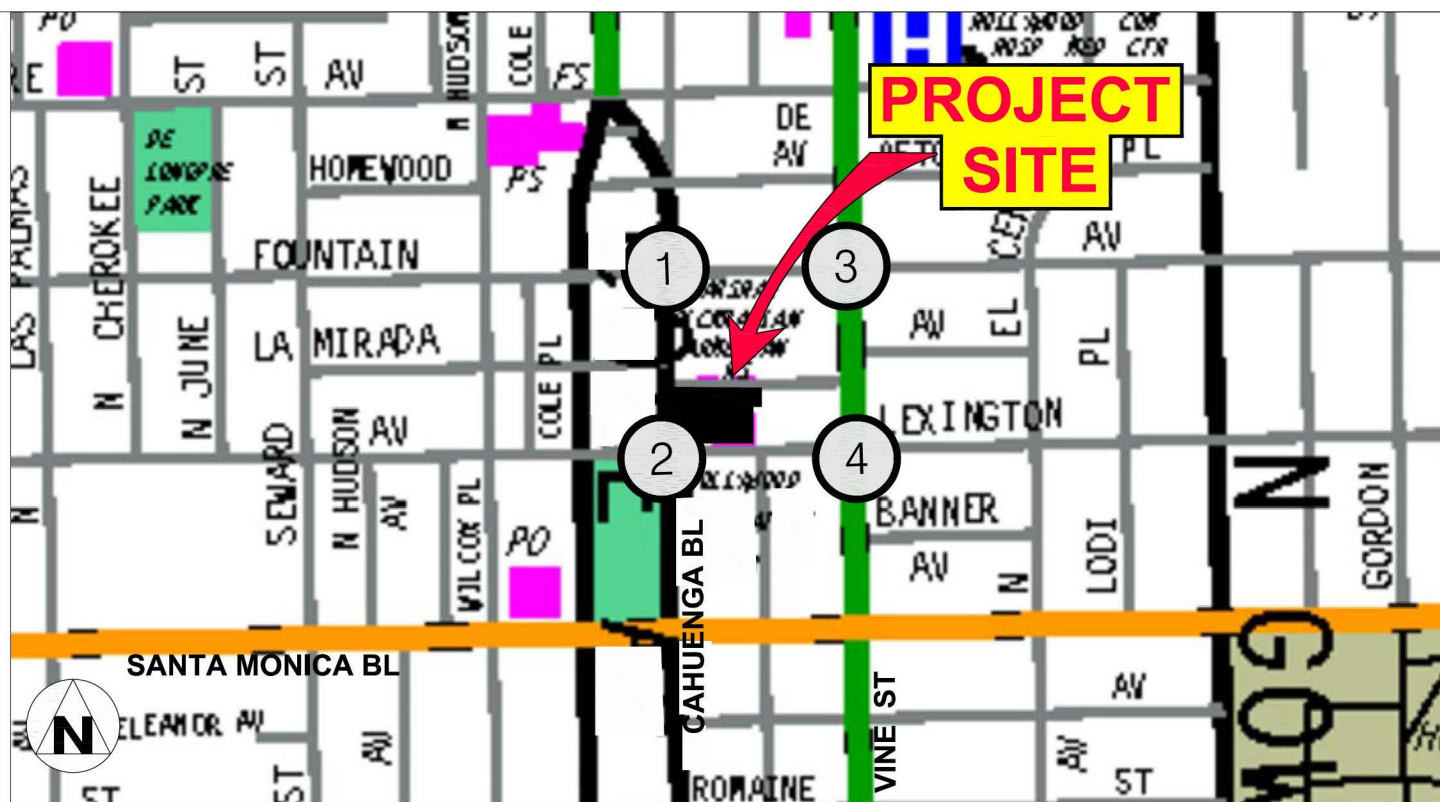


FOUNTAIN AVENUE & VINE STREET

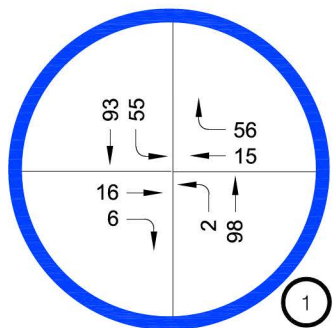


LEXINGTON AVENUE & VINE STREET

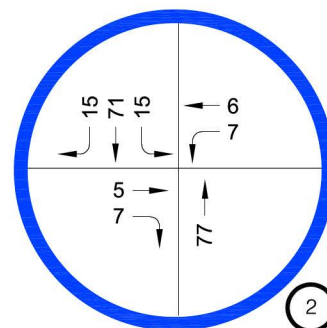
AM PEAK HOUR



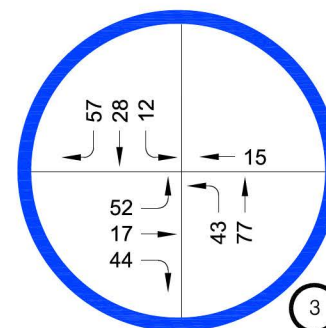
PROJECT SITE



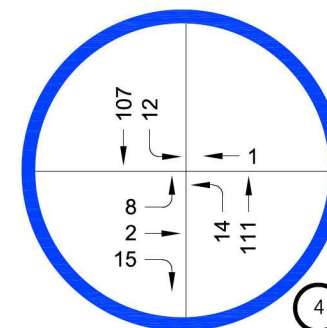
CAHUENGA BOULEVARD & FOUNTAIN AVENUE



CAHUENGA BOULEVARD & LEXINGTON AVENUE



FOUNTAIN AVENUE & VINE STREET



LEXINGTON AVENUE & VINE STREET

PM PEAK HOUR

FIGURE 9

RELATED PROJECTS ONLY
TRAFFIC VOLUMES

Overland Traffic Consultants, Inc.
952 Manhattan Beach Bl #100, Manhattan Beach Ca 90266
(310)545-1235, (661)799-8423, liz@overlandtraffic.com

APPENDIX J

TRAFFIC VOLUME DATA,

HCS LEVEL OF SERVICE WORKSHEETS.

&

SIGNAL WARRANT WORKSHEETS

TRAFFIC VOLUME DATA

National Data & Surveying Services

Intersection Turning Movement Count

Location: Cahuenga Blvd & Fountain Ave
City: Hollywood
Control: Signalized

Project ID: 18-05272-055
Date: 5/16/2018

Total

NS/EW Streets:	Cahuenga Blvd				Cahuenga Blvd				Fountain Ave				Fountain Ave				
AM	NORTHBOUND				SOUTHBOUND				EASTBOUND				WESTBOUND				TOTAL
	0	2	0	0	0	2	0	0	0	1	0	0	0	1	0	0	
	NL	NT	NR	NU	SL	ST	SR	SU	EL	ET	ER	EU	WL	WT	WR	WU	
7:00 AM	2	53	1	0	1	174	13	0	16	23	1	0	2	78	3	0	367
7:15 AM	4	67	3	0	2	234	18	0	15	39	5	0	3	99	4	0	493
7:30 AM	2	78	5	0	3	246	18	0	13	59	8	0	1	97	8	0	538
7:45 AM	4	86	6	0	5	242	17	0	18	50	4	0	18	129	8	0	587
8:00 AM	3	131	6	0	2	220	17	0	30	43	5	0	12	91	4	0	564
8:15 AM	2	138	14	0	3	242	15	0	17	59	10	0	21	93	13	0	627
8:30 AM	1	149	6	0	1	207	11	0	29	51	4	0	14	115	8	0	596
8:45 AM	5	170	8	0	2	239	20	0	29	69	2	0	11	97	10	0	662
9:00 AM	2	158	7	0	0	236	17	0	30	91	2	0	20	84	14	0	661
9:15 AM	2	162	8	0	5	224	15	0	21	86	3	0	18	111	8	0	663
9:30 AM	2	133	6	0	3	213	15	0	25	60	1	0	15	118	10	0	601
9:45 AM	2	148	1	0	0	201	17	0	22	73	3	0	11	101	12	0	591
TOTAL VOLUMES :	NL	NT	NR	NU	SL	ST	SR	SU	EL	ET	ER	EU	WL	WT	WR	WU	TOTAL
APPROACH %'s :	31	1473	71	0	27	2678	193	0	265	703	48	0	146	1213	102	0	6950
	1.97%	93.52%	4.51%	0.00%	0.93%	92.41%	6.66%	0.00%	26.08%	69.19%	4.72%	0.00%	9.99%	83.03%	6.98%	0.00%	
PEAK HR :	08:45 AM - 09:45 AM				10	912	67	0	105	306	8	0	64	410	42	0	TOTAL
PEAK HR VOL :	11	623	29	0	0.500	0.954	0.838	0.000	0.875	0.841	0.667	0.000	0.800	0.869	0.750	0.000	2587
PEAK HR FACTOR :	0.550	0.916	0.906	0.000		0.947				0.852				0.902			0.975

PM	NORTHBOUND				SOUTHBOUND				EASTBOUND				WESTBOUND				TOTAL
	0	2	0	0	0	2	0	0	0	1	0	0	0	1	0	0	
	NL	NT	NR	NU	SL	ST	SR	SU	EL	ET	ER	EU	WL	WT	WR	WU	
4:00 PM	4	174	16	0	9	174	8	0	26	126	4	0	10	70	14	0	635
4:15 PM	4	147	16	0	5	151	11	0	19	124	6	0	7	74	3	0	567
4:30 PM	9	132	8	0	8	180	14	0	14	96	5	0	15	67	12	0	560
4:45 PM	4	92	12	0	3	164	13	0	30	123	4	0	11	75	9	0	540
5:00 PM	3	106	12	0	12	155	18	0	25	135	4	0	12	81	9	0	572
5:15 PM	1	176	12	0	6	168	13	0	21	128	4	0	9	78	16	0	632
5:30 PM	2	118	16	0	7	178	10	0	16	123	5	0	8	81	21	0	585
5:45 PM	5	129	15	0	7	166	13	1	11	119	4	0	10	86	20	0	586
6:00 PM	3	128	25	1	6	170	11	0	19	149	3	0	16	84	23	0	638
6:15 PM	5	130	13	0	8	197	10	0	17	135	2	0	11	94	37	0	659
6:30 PM	4	143	18	0	13	171	10	0	17	130	6	0	5	93	28	0	638
6:45 PM	8	122	15	0	6	169	17	0	17	149	5	0	12	81	21	0	622
TOTAL VOLUMES :	NL	NT	NR	NU	SL	ST	SR	SU	EL	ET	ER	EU	WL	WT	WR	WU	TOTAL
APPROACH %'s :	52	1597	178	1	90	2043	148	1	232	1537	52	0	126	964	213	0	7234
	2.84%	87.36%	9.74%	0.05%	3.94%	89.53%	6.49%	0.04%	12.74%	84.40%	2.86%	0.00%	9.67%	73.98%	16.35%	0.00%	
PEAK HR :	06:00 PM - 07:00 PM				33	707	48	0	70	563	16	0	44	352	109	0	TOTAL
PEAK HR VOL :	20	523	71	1	0.635	0.897	0.706	0.000	0.921	0.945	0.667	0.000	0.688	0.936	0.736	0.000	2557
PEAK HR FACTOR :	0.625	0.914	0.710	0.250		0.916				0.949				0.889			0.970

Project ID: 18-05272-055
Date: 5/16/2018

National Data & Surveying Services

Intersection Turning Movement Count

Location: Cahuenga Blvd & Fountain Ave
City: Hollywood

Project ID: 18-05272-055
Date: 5/16/2018

Pedestrians (Crosswalks)

NS/EW Streets:	Cahuenga Blvd		Cahuenga Blvd		Fountain Ave		Fountain Ave		
AM	NORTH LEG		SOUTH LEG		EAST LEG		WEST LEG		TOTAL
	EB	WB	EB	WB	NB	SB	NB	SB	
7:00 AM	2	1	0	2	5	2	2	1	15
7:15 AM	2	0	3	0	1	0	0	0	6
7:30 AM	0	0	0	1	4	1	0	0	6
7:45 AM	0	0	1	0	2	2	0	0	5
8:00 AM	4	0	3	4	4	4	4	0	23
8:15 AM	3	0	2	2	1	4	3	0	15
8:30 AM	0	0	3	2	2	3	0	0	10
8:45 AM	2	0	1	3	1	3	1	0	11
9:00 AM	0	0	2	3	4	10	0	0	19
9:15 AM	0	0	6	3	6	5	0	0	20
9:30 AM	1	0	1	2	1	0	1	1	7
9:45 AM	4	0	3	1	2	6	6	1	23
TOTAL VOLUMES :	EB 18	WB 1	EB 25	WB 23	NB 33	SB 40	NB 17	SB 3	TOTAL 160
APPROACH %'s :	94.74%	5.26%	52.08%	47.92%	45.21%	54.79%	85.00%	15.00%	
PEAK HR :	08:45 AM - 09:45 AM								TOTAL
PEAK HR VOL :	3	0	10	11	12	18	2	1	57
PEAK HR FACTOR :	0.375		0.417	0.917	0.500	0.450	0.500	0.250	0.713
	0.375		0.583		0.536		0.375		

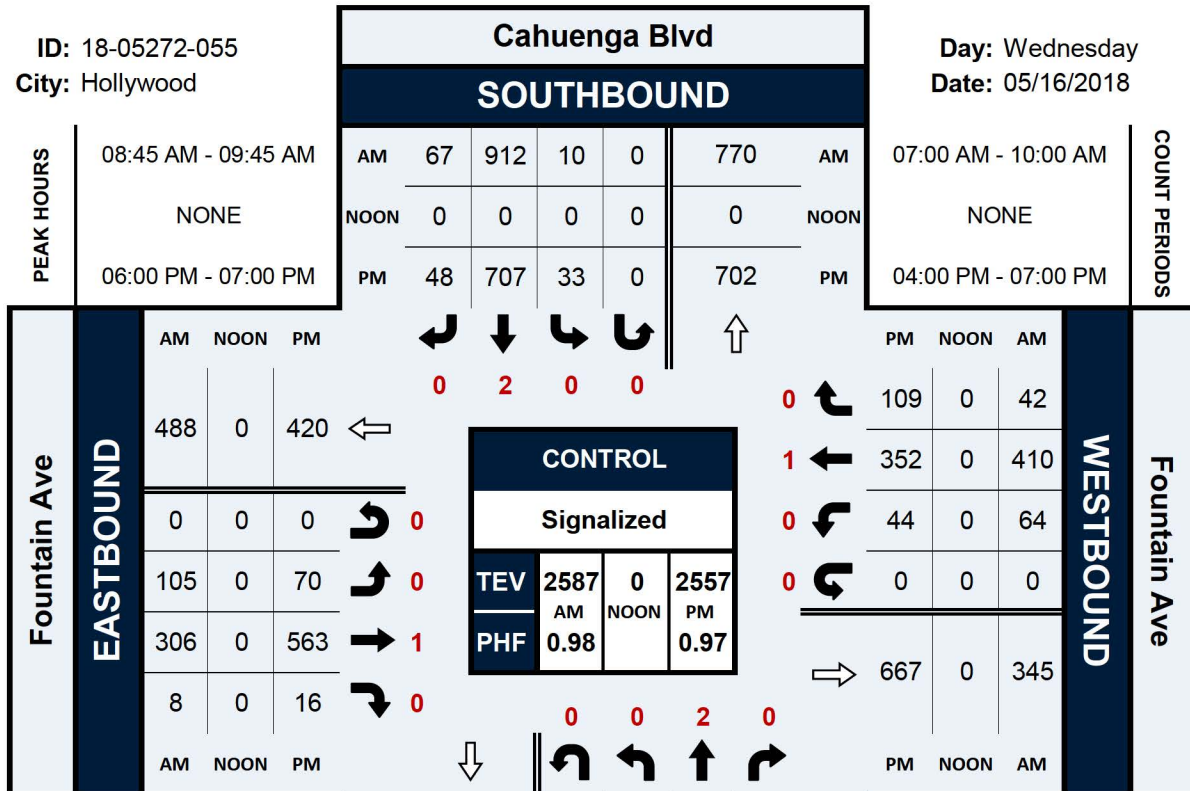
PM	NORTH LEG		SOUTH LEG		EAST LEG		WEST LEG		TOTAL
	EB	WB	EB	WB	NB	SB	NB	SB	
4:00 PM	0	4	7	1	6	2	0	3	23
4:15 PM	0	1	4	4	4	4	0	1	18
4:30 PM	1	0	5	0	10	3	1	0	20
4:45 PM	1	1	6	5	4	11	1	1	30
5:00 PM	0	1	8	6	2	5	0	2	24
5:15 PM	4	1	5	4	7	1	4	2	28
5:30 PM	3	4	8	9	3	6	0	3	36
5:45 PM	3	1	7	3	9	3	3	1	30
6:00 PM	2	2	6	1	10	1	2	5	29
6:15 PM	1	4	7	6	10	7	1	4	40
6:30 PM	5	0	6	9	5	9	5	0	39
6:45 PM	0	0	4	2	6	1	0	1	14
TOTAL VOLUMES :	EB 20	WB 19	EB 73	WB 50	NB 76	SB 53	NB 17	SB 23	TOTAL 331
APPROACH %'s :	51.28%	48.72%	59.35%	40.65%	58.91%	41.09%	42.50%	57.50%	
PEAK HR :	06:00 PM - 07:00 PM								TOTAL
PEAK HR VOL :	8	6	23	18	31	18	8	10	122
PEAK HR FACTOR :	0.400	0.375	0.821	0.500	0.775	0.500	0.400	0.500	0.763
	0.700		0.683		0.721		0.643		

Cahuenga Blvd & Fountain Ave

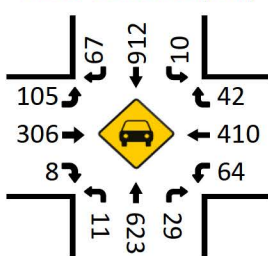
Peak Hour Turning Movement Count

ID: 18-05272-055
City: Hollywood

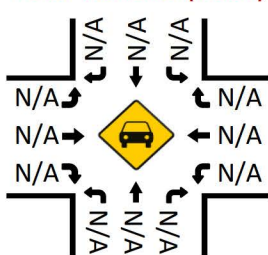
Day: Wednesday
Date: 05/16/2018



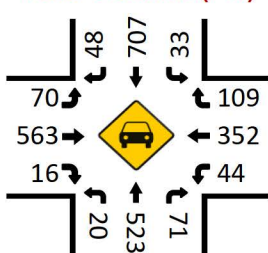
Total Vehicles (AM)



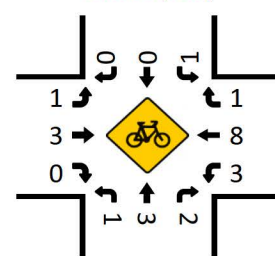
Total Vehicles (Noon)



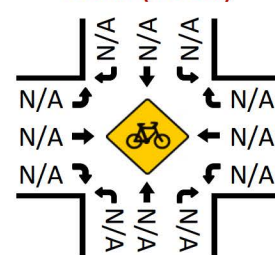
Total Vehicles (PM)



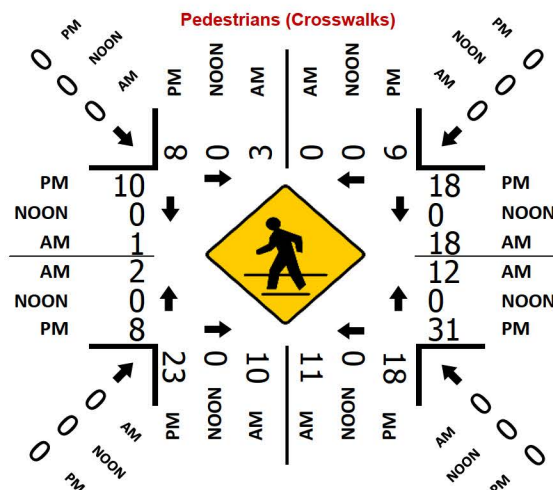
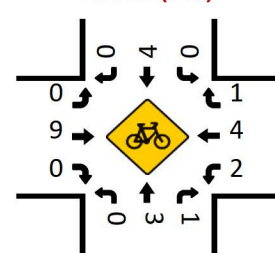
Bikes (AM)



Bikes (Noon)



Bikes (PM)





City Of Los Angeles
Department Of Transportation
MANUAL TRAFFIC COUNT SUMMARY

STREET:
North/South

Cahuenga Blvd

East/West

Lexington Ave

Day: Thursday Date: 10/26/2017 Weather: SUNNY

Hours: 7-10AM 3-6PM Chekrs: NDS

School Day: Yes District: 0 I/S CODE 0

	N/B	S/B	E/B	W/B
DUAL-WHEELED	92	88	14	9
BIKES	0	0	0	0
BUSES	0	0	0	0
	N/B TIME	S/B TIME	E/B TIME	W/B TIME
AM PK 15 MIN	211 8.15	304 7.45	21 9.15	51 9.00
PM PK 15 MIN	170 3.45	230 3.15	74 5.30	47 5.30
AM PK HOUR	723 8.15	1072 7.45	69 8.45	165 9.00
PM PK HOUR	654 3.15	831 3.00	263 5.00	139 5.00

NORTHBOUND Approach

Hours	Lt	Th	Rt	Total
7-8	14	340	20	374
8-9	18	641	34	693
9-10	13	598	23	634
3-4	16	606	23	645
4-5	17	569	27	613
5-6	47	462	58	567
TOTAL	125	3216	185	3526

SOUTHBOUND Approach

Hours	Lt	Th	Rt	Total
7-8	9	888	90	987
8-9	17	886	89	992
9-10	9	651	48	708
3-4	17	798	16	831
4-5	10	679	16	705
5-6	45	731	33	809
TOTAL	107	4633	292	5032

TOTAL

N-S
1361
1685
1342
1476
1318
1376
8558

XING S/L

Ped	Sch
11	0
23	0
18	0
15	0
21	0
16	0
104	0

XING N/L

Ped	Sch
1	0
1	0
2	0
1	0
2	0
4	0
11	0

EASTBOUND Approach

Hours	Lt	Th	Rt	Total
7-8	3	10	19	32
8-9	19	23	24	66
9-10	21	22	24	67
3-4	39	124	34	197
4-5	21	99	39	159
5-6	25	178	60	263
TOTAL	128	456	200	784

WESTBOUND Approach

Hours	Lt	Th	Rt	Total
7-8	12	94	19	125
8-9	11	82	42	135
9-10	33	110	22	165
3-4	19	37	28	84
4-5	7	47	35	89
5-6	10	78	51	139
TOTAL	92	448	197	737

TOTAL

E-W
157
201
232
281
248
402
1521

XING W/L

Ped	Sch
10	0
20	0
12	0
5	0
11	0
15	0
73	0

XING E/L

Ped	Sch
10	0
17	0
8	0
10	0
16	0
10	0
71	0

National Data & Surveying Services

Intersection Turning Movement Count

Location: Vine St & Fountain Ave
City: Hollywood
Control: Signalized

Project ID: 18-05272-056
Date: 5/16/2018

Total

NS/EW Streets:	Vine St				Vine St				Fountain Ave				Fountain Ave				
AM	NORTHBOUND				SOUTHBOUND				EASTBOUND				WESTBOUND				TOTAL
	1 NL	2 NT	0 NR	0 NU	1 SL	2 ST	0 SR	0 SU	1 EL	1 ET	0 ER	0 EU	1 WL	1 WT	0 WR	0 WU	
7:00 AM	5	152	5	0	4	257	12	0	7	15	4	0	11	69	6	0	547
7:15 AM	5	153	9	0	5	282	14	0	7	29	3	0	10	79	5	0	601
7:30 AM	13	135	6	0	6	324	15	0	16	45	5	0	12	81	10	0	668
7:45 AM	14	164	7	0	4	300	24	0	11	51	7	0	20	115	11	0	728
8:00 AM	8	178	10	0	10	293	18	0	9	41	3	0	16	89	5	0	680
8:15 AM	8	220	9	0	10	281	30	1	16	50	6	0	10	86	9	1	737
8:30 AM	11	211	6	0	5	322	24	0	9	40	8	0	21	103	9	0	769
8:45 AM	7	265	8	0	6	330	13	0	19	48	8	0	16	101	10	0	831
9:00 AM	15	267	11	0	6	307	26	0	21	66	12	0	19	76	12	0	838
9:15 AM	6	206	12	0	3	284	21	0	20	74	13	0	20	118	12	0	789
9:30 AM	6	224	9	0	6	259	14	0	20	46	4	0	20	130	10	0	748
9:45 AM	6	260	18	0	7	298	16	0	16	48	9	0	21	99	9	0	807
TOTAL VOLUMES :	NL 104	NT 2435	NR 110	NU 0	SL 72	ST 3537	SR 227	SU 1	EL 171	ET 553	ER 82	EU 0	WL 196	WT 1146	WR 108	WU 1	TOTAL 8743
APPROACH %'s :	3.93%	91.92%	4.15%	0.00%	1.88%	92.18%	5.92%	0.03%	21.22%	68.61%	10.17%	0.00%	13.51%	78.98%	7.44%	0.07%	
PEAK HR :	08:30 AM - 09:30 AM																TOTAL
PEAK HR VOL :	39	949	37	0	20	1243	84	0	69	228	41	0	76	398	43	0	3227
PEAK HR FACTOR :	0.650	0.889	0.771	0.000	0.833	0.942	0.808	0.000	0.821	0.770	0.788	0.000	0.905	0.843	0.896	0.000	0.963
	0.875				0.959				0.790				0.862				

PM	NORTHBOUND				SOUTHBOUND				EASTBOUND				WESTBOUND				TOTAL
	1 NL	2 NT	0 NR	0 NU	1 SL	2 ST	0 SR	0 SU	1 EL	1 ET	0 ER	0 EU	1 WL	1 WT	0 WR	0 WU	
4:00 PM	15	282	20	1	8	239	13	0	32	109	9	0	11	52	20	0	811
4:15 PM	12	319	13	0	5	277	11	0	21	104	16	0	17	60	14	0	869
4:30 PM	8	260	17	0	9	314	13	0	16	95	8	0	10	73	11	0	834
4:45 PM	12	251	16	0	14	267	11	0	14	110	10	0	20	71	8	0	804
5:00 PM	12	297	15	0	13	289	20	0	32	126	15	0	23	72	13	0	927
5:15 PM	15	290	10	0	6	264	21	0	21	119	19	0	19	75	13	0	872
5:30 PM	7	253	19	0	10	242	24	0	16	124	12	1	19	75	16	0	818
5:45 PM	13	260	23	0	8	292	23	0	30	105	11	0	16	68	18	0	867
6:00 PM	7	309	13	1	7	312	33	0	29	126	10	0	18	77	13	0	955
6:15 PM	27	273	17	0	12	280	25	0	30	123	9	0	24	86	13	0	919
6:30 PM	10	254	16	1	16	232	26	0	33	127	10	0	18	78	11	0	832
6:45 PM	13	295	10	0	14	241	18	0	28	128	14	0	18	85	13	0	877
TOTAL VOLUMES :	NL 151	NT 3343	NR 189	NU 3	SL 122	ST 3249	SR 238	SU 0	EL 302	ET 1396	ER 143	EU 1	WL 213	WT 872	WR 163	WU 0	TOTAL 10385
APPROACH %'s :	4.10%	90.69%	5.13%	0.08%	3.38%	90.02%	6.59%	0.00%	16.40%	75.79%	7.76%	0.05%	17.07%	69.87%	13.06%	0.00%	
PEAK HR :	06:00 PM - 07:00 PM																TOTAL
PEAK HR VOL :	57	1131	56	2	49	1065	102	0	120	504	43	0	78	326	50	0	3583
PEAK HR FACTOR :	0.528	0.915	0.824	0.500	0.766	0.853	0.773	0.000	0.909	0.984	0.768	0.000	0.813	0.948	0.962	0.000	0.938
	0.944				0.864				0.981				0.923				

National Data & Surveying Services

Intersection Turning Movement Count

Location: Vine St & Fountain Ave
City: Hollywood

Project ID: 18-05272-056
Date: 5/16/2018

Pedestrians (Crosswalks)

NS/EW Streets:	Vine St		Vine St		Fountain Ave		Fountain Ave		
AM	NORTH LEG		SOUTH LEG		EAST LEG		WEST LEG		TOTAL
	EB	WB	EB	WB	NB	SB	NB	SB	
7:00 AM	1	1	1	4	6	8	2	5	28
7:15 AM	2	3	5	1	4	6	5	5	31
7:30 AM	3	3	0	2	11	9	4	1	33
7:45 AM	4	3	3	3	9	10	8	6	46
8:00 AM	1	2	3	4	6	16	8	12	52
8:15 AM	5	5	3	10	9	9	11	12	64
8:30 AM	3	8	4	9	36	14	9	3	86
8:45 AM	3	2	2	5	10	13	4	2	41
9:00 AM	3	6	4	6	11	6	6	11	53
9:15 AM	3	3	6	7	12	16	4	6	57
9:30 AM	3	7	4	4	11	17	7	9	62
9:45 AM	1	4	4	4	14	11	10	12	60
TOTAL VOLUMES :	EB 32	WB 47	EB 39	WB 59	NB 139	SB 135	NB 78	SB 84	TOTAL 613
APPROACH %'s :	40.51%	59.49%	39.80%	60.20%	50.73%	49.27%	48.15%	51.85%	
PEAK HR :	08:30 AM - 09:30 AM								TOTAL
PEAK HR VOL :	12	19	16	27	69	49	23	22	237
PEAK HR FACTOR :	1.000	0.594	0.667	0.750	0.479	0.766	0.639	0.500	0.689
	0.705		0.827		0.590		0.662		

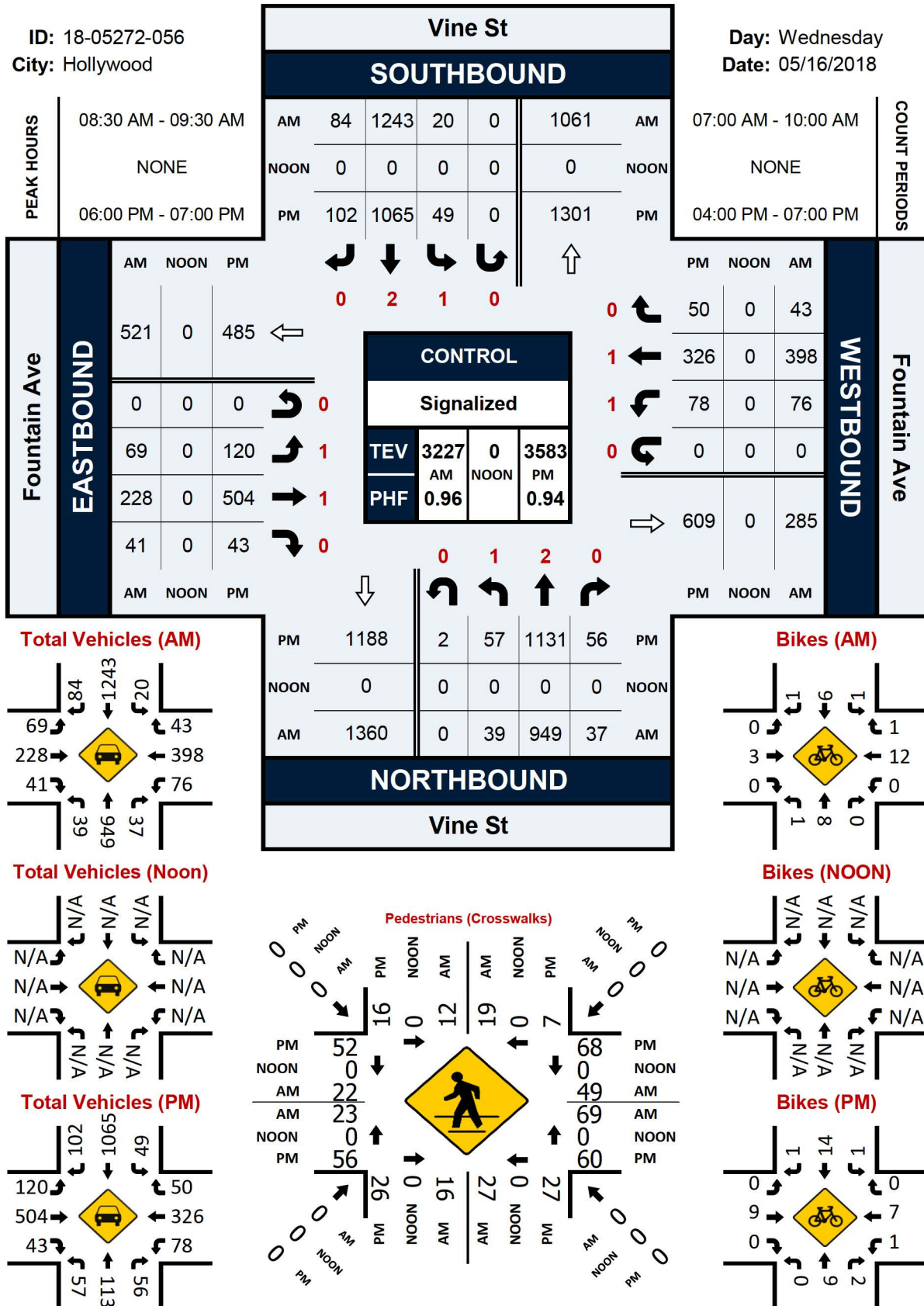
PM	NORTH LEG		SOUTH LEG		EAST LEG		WEST LEG		TOTAL
	EB	WB	EB	WB	NB	SB	NB	SB	
4:00 PM	5	0	12	6	13	23	15	12	86
4:15 PM	2	0	2	8	17	23	6	7	65
4:30 PM	4	0	3	11	11	21	7	11	68
4:45 PM	2	6	13	8	20	18	7	16	90
5:00 PM	4	2	11	8	10	22	19	15	91
5:15 PM	4	0	17	11	12	18	22	9	93
5:30 PM	2	4	14	6	19	23	10	21	99
5:45 PM	1	2	3	10	17	18	17	11	79
6:00 PM	4	2	11	9	20	8	10	18	82
6:15 PM	0	3	4	6	12	15	16	10	66
6:30 PM	9	2	5	5	17	25	7	10	80
6:45 PM	3	0	6	7	11	20	23	14	84
TOTAL VOLUMES :	EB 40	WB 21	EB 101	WB 95	NB 179	SB 234	NB 159	SB 154	TOTAL 983
APPROACH %'s :	65.57%	34.43%	51.53%	48.47%	43.34%	56.66%	50.80%	49.20%	
PEAK HR :	06:00 PM - 07:00 PM								TOTAL
PEAK HR VOL :	16	7	26	27	60	68	56	52	312
PEAK HR FACTOR :	0.444	0.583	0.591	0.750	0.750	0.680	0.609	0.722	0.929
	0.523		0.663		0.762		0.730		

Vine St & Fountain Ave

Peak Hour Turning Movement Count

ID: 18-05272-056
City: Hollywood

Day: Wednesday
Date: 05/16/2018



National Data & Surveying Services

Intersection Turning Movement Count

Location: Vine St & Lexington Ave
City: Hollywood
Control: Signalized

Project ID: 18-05272-058
Date: 5/16/2018

Total

NS/EW Streets:	Vine St				Vine St				Lexington Ave				Lexington Ave				
AM	NORTHBOUND				SOUTHBOUND				EASTBOUND				WESTBOUND				TOTAL
	1 NL	2 NT	0 NR	0 NU	1 SL	2 ST	0 SR	0 SU	0 EL	1 ET	0 ER	0 EU	0 WL	1 WT	0 WR	0 WU	
7:00 AM	3	166	2	0	2	282	5	0	2	6	2	0	2	4	6	0	482
7:15 AM	3	149	3	1	1	283	9	0	3	2	3	0	10	15	6	0	488
7:30 AM	11	156	4	0	4	327	9	0	1	8	7	0	10	20	9	0	566
7:45 AM	6	193	4	1	3	298	12	0	1	5	8	0	13	24	6	0	574
8:00 AM	9	208	8	0	10	297	20	0	3	6	14	0	14	16	8	0	613
8:15 AM	15	246	3	0	3	279	15	0	1	10	11	0	11	24	6	0	624
8:30 AM	3	214	1	0	6	315	7	0	6	11	10	0	5	13	3	0	594
8:45 AM	5	262	3	0	4	330	14	0	3	6	6	0	3	16	14	0	666
9:00 AM	2	273	7	1	3	322	15	0	8	6	5	0	8	14	5	0	669
9:15 AM	7	228	3	0	9	292	12	0	2	5	6	0	12	19	6	0	601
9:30 AM	3	258	1	1	8	271	5	0	1	3	5	0	6	13	4	0	579
9:45 AM	7	258	3	0	5	317	6	0	6	3	3	0	4	21	10	0	643
TOTAL VOLUMES :	NL	NT	NR	NU	SL	ST	SR	SU	EL	ET	ER	EU	WL	WT	WR	WU	TOTAL
APPROACH %'s :	74	2611	42	4	58	3613	129	0	37	71	80	0	98	199	83	0	7099
	2.71%	95.61%	1.54%	0.15%	1.53%	95.08%	3.39%	0.00%	19.68%	37.77%	42.55%	0.00%	25.79%	52.37%	21.84%	0.00%	
PEAK HR :	08:15 AM - 09:15 AM																TOTAL
PEAK HR VOL :	25	995	14	1	16	1246	51	0	18	33	32	0	27	67	28	0	2553
PEAK HR FACTOR :	0.417	0.911	0.500	0.250	0.667	0.944	0.850	0.000	0.563	0.750	0.727	0.000	0.614	0.698	0.500	0.000	0.954
	0.914				0.943				0.769				0.744				

PM	NORTHBOUND				SOUTHBOUND				EASTBOUND				WESTBOUND				TOTAL
	1 NL	2 NT	0 NR	0 NU	1 SL	2 ST	0 SR	0 SU	0 EL	1 ET	0 ER	0 EU	0 WL	1 WT	0 WR	0 WU	
4:00 PM	2	323	12	0	6	246	5	0	2	15	9	0	7	6	17	0	650
4:15 PM	4	325	10	0	7	295	8	0	4	23	9	0	3	12	7	0	707
4:30 PM	1	273	8	0	8	305	4	1	6	16	8	0	3	13	7	0	653
4:45 PM	6	268	9	0	9	255	12	1	8	29	8	0	8	8	9	0	630
5:00 PM	10	295	5	0	14	279	12	0	12	32	15	0	14	6	18	0	712
5:15 PM	6	320	3	0	9	309	8	1	7	29	13	0	12	10	7	0	734
5:30 PM	5	262	5	0	5	250	5	0	5	16	11	0	5	7	15	0	591
5:45 PM	7	286	10	0	7	298	11	1	9	26	19	0	5	6	6	0	691
6:00 PM	2	290	12	0	12	305	8	0	13	26	11	0	4	11	9	0	703
6:15 PM	3	286	6	1	2	307	5	0	9	44	9	0	6	16	21	0	715
6:30 PM	5	288	8	0	5	263	4	0	9	24	6	0	5	11	15	0	643
6:45 PM	6	303	7	0	12	254	10	0	9	14	12	0	10	3	11	0	651
TOTAL VOLUMES :	NL	NT	NR	NU	SL	ST	SR	SU	EL	ET	ER	EU	WL	WT	WR	WU	TOTAL
APPROACH %'s :	57	3519	95	1	96	3366	92	4	93	294	130	0	82	109	142	0	8080
	1.55%	95.83%	2.59%	0.03%	2.70%	94.60%	2.59%	0.11%	17.99%	56.87%	25.15%	0.00%	24.62%	32.73%	42.64%	0.00%	
PEAK HR :	05:45 PM - 06:45 PM																TOTAL
PEAK HR VOL :	17	1150	36	1	26	1173	28	1	40	120	45	0	20	44	51	0	2752
PEAK HR FACTOR :	0.607	0.991	0.750	0.250	0.542	0.955	0.636	0.250	0.769	0.682	0.592	0.000	0.833	0.688	0.607	0.000	0.962
	0.990				0.945				0.827				0.669				

Project ID: 18-05272-058
Date: 5/16/2018

National Data & Surveying Services

Intersection Turning Movement Count

Location: Vine St & Lexington Ave
City: Hollywood

Project ID: 18-05272-058
Date: 5/16/2018

Pedestrians (Crosswalks)

NS/EW Streets:	Vine St		Vine St		Lexington Ave		Lexington Ave		
AM	NORTH LEG		SOUTH LEG		EAST LEG		WEST LEG		TOTAL
	EB	WB	EB	WB	NB	SB	NB	SB	
7:00 AM	0	0	0	2	2	3	2	5	14
7:15 AM	1	1	0	10	4	6	2	7	31
7:30 AM	1	2	2	8	7	9	8	3	40
7:45 AM	3	2	5	5	8	6	5	9	43
8:00 AM	1	3	0	7	6	10	9	8	44
8:15 AM	2	0	2	4	9	6	6	10	39
8:30 AM	3	3	6	3	10	8	3	6	42
8:45 AM	2	1	4	4	11	11	4	5	42
9:00 AM	1	0	3	2	7	8	6	6	33
9:15 AM	2	0	1	5	20	6	6	5	45
9:30 AM	0	1	1	5	11	12	1	7	38
9:45 AM	2	7	6	2	9	14	7	10	57
TOTAL VOLUMES :	EB 18	WB 20	EB 30	WB 57	NB 104	SB 99	NB 59	SB 81	TOTAL 468
APPROACH %'s :	47.37%	52.63%	34.48%	65.52%	51.23%	48.77%	42.14%	57.86%	
PEAK HR :	08:15 AM - 09:15 AM								TOTAL
PEAK HR VOL :	8	4	15	13	37	33	19	27	156
PEAK HR FACTOR :	0.667	0.333	0.625	0.813	0.841	0.750	0.792	0.675	0.929
	0.500		0.778		0.795		0.719		

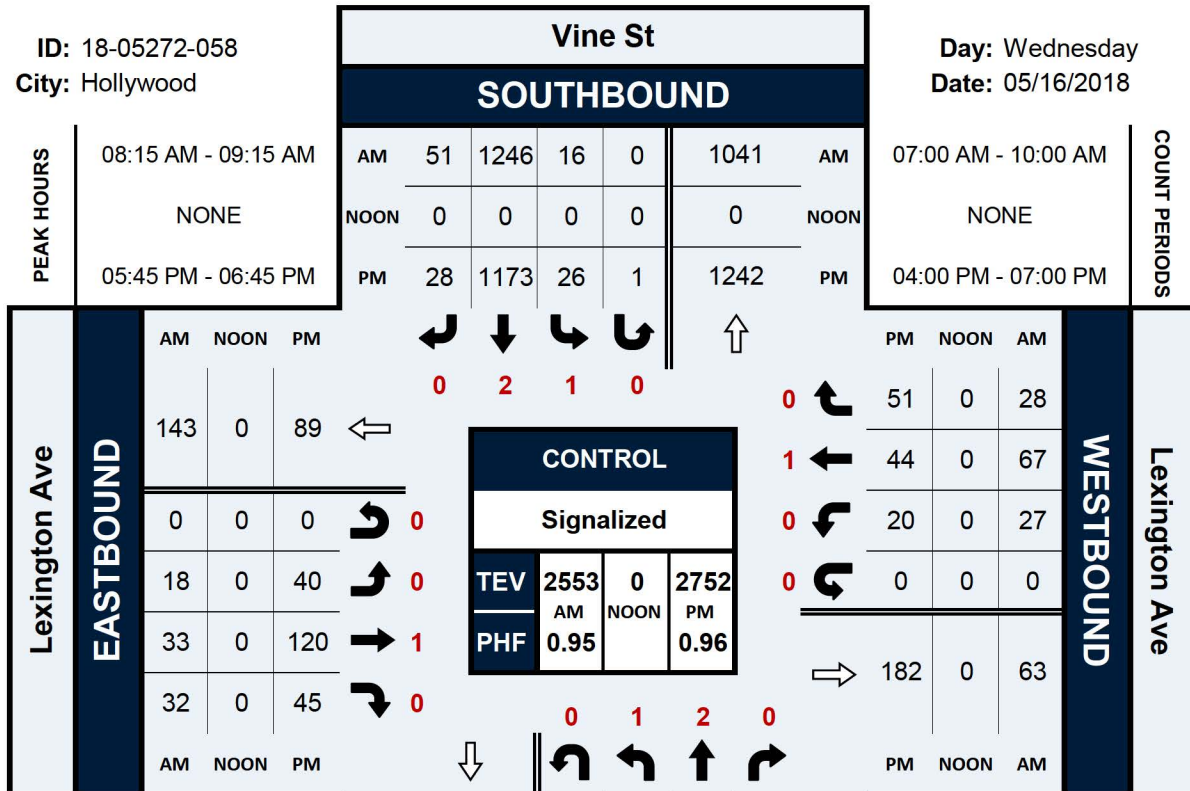
PM	NORTH LEG		SOUTH LEG		EAST LEG		WEST LEG		TOTAL
	EB	WB	EB	WB	NB	SB	NB	SB	
4:00 PM	3	4	0	2	10	13	9	9	50
4:15 PM	9	5	2	6	5	11	10	7	55
4:30 PM	3	4	5	9	17	14	1	6	59
4:45 PM	3	7	2	0	11	14	13	9	59
5:00 PM	3	1	5	8	4	16	9	8	54
5:15 PM	8	5	7	3	11	12	7	8	61
5:30 PM	8	8	4	5	13	15	7	7	67
5:45 PM	4	7	5	8	12	19	15	12	82
6:00 PM	12	6	9	7	13	11	7	13	78
6:15 PM	6	1	5	3	9	20	8	9	61
6:30 PM	2	12	1	5	20	12	6	10	68
6:45 PM	2	6	2	8	6	8	7	7	46
TOTAL VOLUMES :	EB 63	WB 66	EB 47	WB 64	NB 131	SB 165	NB 99	SB 105	TOTAL 740
APPROACH %'s :	48.84%	51.16%	42.34%	57.66%	44.26%	55.74%	48.53%	51.47%	
PEAK HR :	05:45 PM - 06:45 PM								TOTAL
PEAK HR VOL :	24	26	20	23	54	62	36	44	289
PEAK HR FACTOR :	0.500	0.542	0.556	0.719	0.675	0.775	0.600	0.846	0.881
	0.694		0.672		0.906		0.741		

Vine St & Lexington Ave

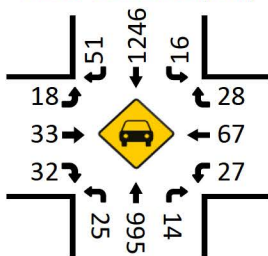
Peak Hour Turning Movement Count

ID: 18-05272-058
City: Hollywood

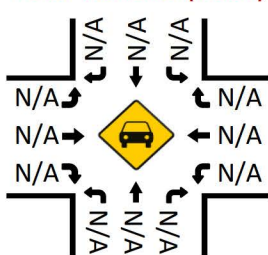
Day: Wednesday
Date: 05/16/2018



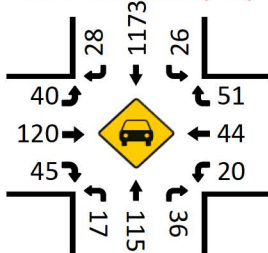
Total Vehicles (AM)



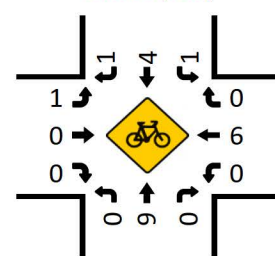
Total Vehicles (Noon)



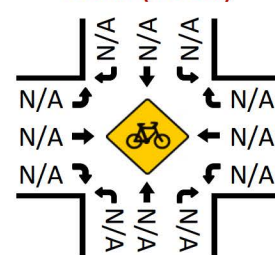
Total Vehicles (PM)



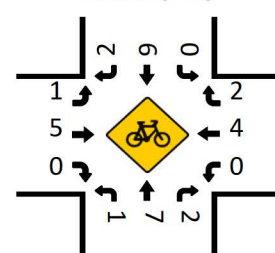
Bikes (AM)



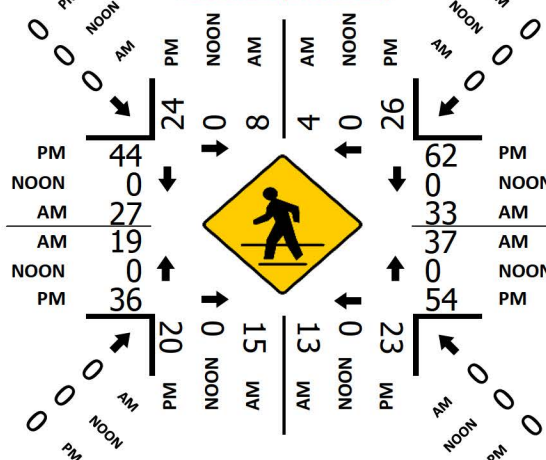
Bikes (Noon)



Bikes (PM)



Pedestrians (Crosswalks)



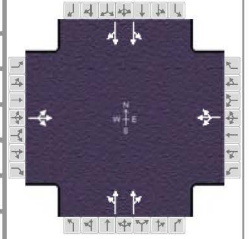
HCS WORKSHEETS

HCS7 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS		
Analyst	LF	Analysis Date	12/29/2021
Jurisdiction	LOS ANGELES	Time Period	AM PEAK HOUR
Urban Street	CAHUENGA BL	Analysis Year	2021
Intersection	FOUNTAIN AV	File Name	1 CAHUENGA & FOUNTAIN
Project Description	EXISTING		

Intersection Information



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	108	316	8	66	424	43	11	644	30	10	942	69

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	30.0	22.0	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		8.0		8.0
Phase Duration, s		26.0		26.0		34.0		34.0
Change Period, ($Y+R_c$), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g_s), s		24.0		20.4				
Green Extension Time (g_e), s		0.0		0.5		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		1.00		1.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		441			544			366		333		490
Adjusted Saturation Flow Rate (s), veh/h/ln		1386			1646			1861		1694		1676
Queue Service Time (g_s), s		0.0			0.0			0.0		7.3		12.4
Cycle Queue Clearance Time (g_c), s		18.1			18.4			7.2		7.3		12.4
Green Ratio (g/C)		0.37			0.37			0.50		0.50		0.50
Capacity (c), veh/h		583			671			992		847		838
Volume-to-Capacity Ratio (X)		0.756			0.811			0.369		0.393		0.585
Back of Queue (Q), ft/ln (85 th percentile)		198.6			249.7			109.3		103.4		162.3
Back of Queue (Q), veh/ln (85 th percentile)		7.9			10.0			4.4		4.1		6.5
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00			0.00		0.00		0.00
Uniform Delay (d_1), s/veh		17.0			17.5			9.3		9.3		10.6
Incremental Delay (d_2), s/veh		5.0			6.9			1.1		1.4		3.0
Initial Queue Delay (d_3), s/veh		0.0			0.0			0.0		0.0		0.0
Control Delay (d), s/veh		22.0			24.4			10.3		10.7		13.6
Level of Service (LOS)		C			C			B		B		B
Approach Delay, s/veh / LOS	22.0	C		24.4	C		10.5	B		13.1	B	
Intersection Delay, s/veh / LOS	16.1						B					

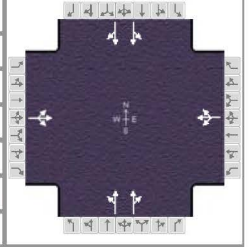
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.09	B		2.09	B		1.65	B		1.65	B	
Bicycle LOS Score / LOS	1.21	A		1.38	A		1.06	A		1.35	A	

HCS7 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	AM PEAK HOUR	PHF	0.98
Urban Street	CAHUENGA BL	Analysis Year	2021	Analysis Period	1> 7:00
Intersection	FOUNTAIN AV	File Name	1 CAHUENGA & FOUNTAIN AM EXISTING+PRO...		
Project Description	EXISTING+PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	108	316	9	66	424	43	8	641	30	10	943	69

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	30.0	22.0	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		8.0		8.0
Phase Duration, s		26.0		26.0		34.0		34.0
Change Period, ($Y+R_c$), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g_s), s		24.0		20.4				
Green Extension Time (g_e), s		0.0		0.5		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		1.00		1.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		442			544		364		329	553		490
Adjusted Saturation Flow Rate (s), veh/h/ln		1387			1646		1875		1692	1885		1675
Queue Service Time (g_s), s		0.0			0.0		0.0		7.2	0.0		12.4
Cycle Queue Clearance Time (g_c), s		18.1			18.4		7.1		7.2	12.3		12.4
Green Ratio (g/C)		0.37			0.37		0.50		0.50	0.50		0.50
Capacity (c), veh/h		583			671		999		846	1004		837
Volume-to-Capacity Ratio (X)		0.757			0.811		0.365		0.388	0.550		0.585
Back of Queue (Q), ft/ln (85 th percentile)		199.7			249.7		108.4		102	173.5		162.4
Back of Queue (Q), veh/ln (85 th percentile)		8.0			10.0		4.3		4.1	6.9		6.5
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00		0.00		0.00	0.00		0.00
Uniform Delay (d_1), s/veh		17.0			17.5		9.3		9.3	10.6		10.6
Incremental Delay (d_2), s/veh		5.1			6.9		1.0		1.3	2.2		3.0
Initial Queue Delay (d_3), s/veh		0.0			0.0		0.0		0.0	0.0		0.0
Control Delay (d), s/veh		22.1			24.4		10.3		10.7	12.7		13.6
Level of Service (LOS)		C			C		B		B	B		B
Approach Delay, s/veh / LOS	22.1	C		24.4	C		10.5	B		13.1	B	
Intersection Delay, s/veh / LOS	16.2						B					

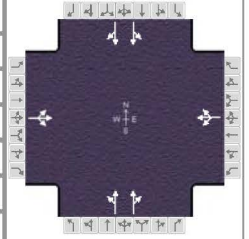
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.09	B		2.09	B		1.65	B		1.65	B	
Bicycle LOS Score / LOS	1.22	A		1.38	A		1.06	A		1.35	A	

HCS7 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	AM PEAK HOUR	PHF	0.98
Urban Street	CAHUENGA BL	Analysis Year	2024	Analysis Period	1> 7:00
Intersection	FOUNTAIN AV	File Name	1 CAHUENGA & FOUNTAIN AM FUTURE WO P...		
Project Description	FUTURE WITHOUT PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	112	343	11	68	454	101	18	764	31	50	1053	71

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	30.0	22.0	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		8.0		8.0
Phase Duration, s		26.0		26.0		34.0		34.0
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g _s), s		24.0		24.0				
Green Extension Time (g _e), s		0.0		0.0		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		1.00		1.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		476			636		430		400	613		585
Adjusted Saturation Flow Rate (s), veh/h/ln		1245			1652		1822		1699	1750		1683
Queue Service Time (g _s), s		0.0			0.0		0.0		9.2	3.2		16.0
Cycle Queue Clearance Time (g _c), s		22.0			22.0		8.8		9.2	14.9		16.0
Green Ratio (g/C)		0.37			0.37		0.50		0.50	0.50		0.50
Capacity (c), veh/h		531			672		974		849	940		842
Volume-to-Capacity Ratio (X)		0.895			0.945		0.442		0.470	0.652		0.695
Back of Queue (Q), ft/ln (85 th percentile)		275.9			382.1		130		125.9	203.7		207.5
Back of Queue (Q), veh/ln (85 th percentile)		11.0			15.3		5.2		5.0	8.1		8.3
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00		0.00		0.00	0.00		0.00
Uniform Delay (d ₁), s/veh		18.4			19.2		9.7		9.8	11.1		11.5
Incremental Delay (d ₂), s/veh		17.2			22.0		1.5		1.9	3.5		4.7
Initial Queue Delay (d ₃), s/veh		0.0			0.0		0.0		0.0	0.0		0.0
Control Delay (d), s/veh		35.6			41.2		11.1		11.7	14.6		16.2
Level of Service (LOS)		D			D		B		B	B		B
Approach Delay, s/veh / LOS	35.6		D	41.2		D	11.4		B	15.4		B
Intersection Delay, s/veh / LOS	22.6						C					

Multimodal Results

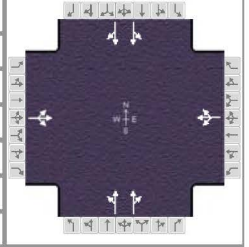
	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.09		B	2.09		B	1.65		B	1.65		B
Bicycle LOS Score / LOS	1.27		A	1.54		B	1.17		A	1.48		A

HCS7 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS		
Analyst	LF	Analysis Date	12/29/2021
Jurisdiction	LOS ANGELES	Time Period	AM PEAK HOUR
Urban Street	CAHUENGA BL	Analysis Year	2024
Intersection	FOUNTAIN AV	File Name	1 CAHUENGA & F
Project Description	FUTURE WITH PROJECT		

Intersection Information



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	112	343	12	68	454	101	15	761	31	50	1054	71

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	30.0	22.0	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		8.0		8.0
Phase Duration, s		26.0		26.0		34.0		34.0
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g _s), s		24.0		24.0				
Green Extension Time (g _e), s		0.0		0.0		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		1.00		1.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		477			636			429		395		585
Adjusted Saturation Flow Rate (s), veh/h/ln		1246			1652			1839		1697		1682
Queue Service Time (g _s), s		0.0			0.0			0.0		9.1		16.0
Cycle Queue Clearance Time (g _c), s		22.0			22.0			8.7		9.1		16.0
Green Ratio (g/C)		0.37			0.37			0.50		0.50		0.50
Capacity (c), veh/h		531			672			982		849		841
Volume-to-Capacity Ratio (X)		0.897			0.946			0.437		0.465		0.696
Back of Queue (Q), ft/ln (85 th percentile)		277.3			382.3			129.5		124.2		207.6
Back of Queue (Q), veh/ln (85 th percentile)		11.1			15.3			5.2		5.0		8.3
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00			0.00		0.00		0.00
Uniform Delay (d ₁), s/veh		18.4			19.2			9.7		9.8		11.5
Incremental Delay (d ₂), s/veh		17.4			22.1			1.4		1.8		4.7
Initial Queue Delay (d ₃), s/veh		0.0			0.0			0.0		0.0		0.0
Control Delay (d), s/veh		35.8			41.2			11.1		11.6		16.2
Level of Service (LOS)		D			D			B		B		B
Approach Delay, s/veh / LOS	35.8		D	41.2		D	11.3		B	15.4		B
Intersection Delay, s/veh / LOS	22.7						C					

Multimodal Results

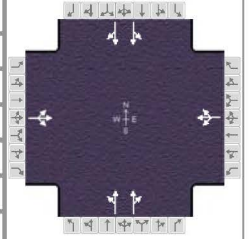
	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.09		B	2.09		B	1.65		B	1.65		B
Bicycle LOS Score / LOS	1.27		A	1.54		B	1.17		A	1.48		A

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS		
Analyst	LF	Analysis Date	12/29/2021
Jurisdiction	LOS ANGELES	Time Period	PM PEAK HOUR
Urban Street	CAHUENGA BL	Analysis Year	2021
Intersection	FOUNTAIN AV	File Name	1 CAHUENGA & F
Project Description	EXISTING		

Intersection Information



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	72	582	17	45	364	113	22	540	73	34	730	50

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	26.8	25.2	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		8.0		8.0
Phase Duration, s		29.2		29.2		30.8		30.8
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.2		3.2		0.0		0.0
Queue Clearance Time (g _s), s		24.6		17.5				
Green Extension Time (g _e), s		0.6		2.3		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		1.00		0.29				

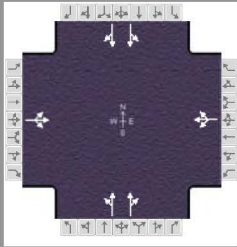
Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		692			538			346		309		403
Adjusted Saturation Flow Rate (s), veh/h/ln		1751			1697			1814		1623		1675
Queue Service Time (g _s), s		7.1			0.0			0.0		7.8		10.5
Cycle Queue Clearance Time (g _c), s		22.6			15.5			7.4		7.8		10.5
Green Ratio (g/C)		0.42			0.42			0.45		0.45		0.45
Capacity (c), veh/h		802			778			874		725		748
Volume-to-Capacity Ratio (X)		0.862			0.692			0.396		0.426		0.539
Back of Queue (Q), ft/ln (85 th percentile)		312.2			196.9			117.5		110.2		146.8
Back of Queue (Q), veh/ln (85 th percentile)		12.5			7.9			4.7		4.4		5.9
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00			0.00		0.00		0.00
Uniform Delay (d ₁), s/veh		16.4			14.4			11.2		11.3		12.1
Incremental Delay (d ₂), s/veh		8.7			2.0			1.3		1.8		2.8
Initial Queue Delay (d ₃), s/veh		0.0			0.0			0.0		0.0		0.0
Control Delay (d), s/veh		25.1			16.5			12.6		13.2		14.9
Level of Service (LOS)		C			B			B		B		B
Approach Delay, s/veh / LOS	25.1	C		16.5	B		12.9	B		14.4	B	
Intersection Delay, s/veh / LOS	17.1						B					

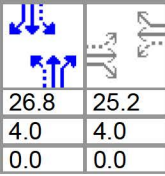
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.7	B		2.7	B		2.1	B		2.1	B	
Bicycle LOS Score / LOS	1.6	A		1.4	A		1.0	A		1.2	A	

HCS 2010 Signalized Intersection Results Summary

General Information						Intersection Information		
Agency	OVERLAND TRAFFIC CONSULTANTS					Duration, h	0.25	
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other			
Jurisdiction	LOS ANGELES	Time Period	PM PEAK HOUR	PHF	0.97			
Urban Street	CAHUENGA BL	Analysis Year	2021	Analysis Period	1> 7:00			
Intersection	FOUNTAIN AV	File Name	1 CAHUENGA & FOUNTAIN PM EXISTING+PR...					
Project Description	EXISTING+PROJECT							

Demand Information	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	72	582	17	45	364	113	28	546	73	34	730	50

Signal Information											
Cycle, s	60.0	Reference Phase	2								
Offset, s	0	Reference Point	End								
Uncoordinated	No	Simult. Gap E/W	On								
Force Mode	Fixed	Simult. Gap N/S	On								
				Green	26.8	25.2	0.0	0.0	0.0	0.0	
				Yellow	4.0	4.0	0.0	0.0	0.0	0.0	
				Red	0.0	0.0	0.0	0.0	0.0	0.0	

Timer Results	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		8.0		8.0
Phase Duration, s		29.2		29.2		30.8		30.8
Change Period, ($Y+R_c$), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.2		3.2		0.0		0.0
Queue Clearance Time (g_s), s		24.6		17.5				
Green Extension Time (g_e), s		0.6		2.3		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		1.00		0.29				

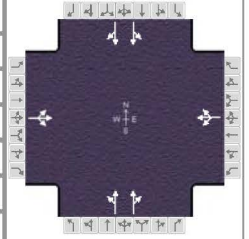
Movement Group Results	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		692			538			350		317		403
Adjusted Saturation Flow Rate (s), veh/h/ln		1751			1697			1783		1621		1673
Queue Service Time (g_s), s		7.1			0.0			0.0		8.1		10.5
Cycle Queue Clearance Time (g_c), s		22.6			15.5			7.5		8.1		10.5
Green Ratio (g/C)		0.42			0.42			0.45		0.45		0.45
Capacity (c), veh/h		802			778			861		724		747
Volume-to-Capacity Ratio (X)		0.862			0.692			0.407		0.438		0.540
Back of Queue (Q), ft/ln (85 th percentile)		312.2			196.9			119		113.4		146.8
Back of Queue (Q), veh/ln (85 th percentile)		12.5			7.9			4.8		4.5		5.9
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00			0.00		0.00		0.00
Uniform Delay (d_1), s/veh		16.4			14.4			11.3		11.4		12.1
Incremental Delay (d_2), s/veh		8.7			2.0			1.4		1.9		2.8
Initial Queue Delay (d_3), s/veh		0.0			0.0			0.0		0.0		0.0
Control Delay (d), s/veh		25.1			16.5			12.7		13.3		14.9
Level of Service (LOS)		C			B			B		B		B
Approach Delay, s/veh / LOS	25.1	C		16.5	B		13.0	B		14.4	B	
Intersection Delay, s/veh / LOS	17.2						B					

Multimodal Results	EB		WB		NB		SB	
Pedestrian LOS Score / LOS	2.7	B	2.7	B	2.1	B	2.1	B
Bicycle LOS Score / LOS	1.6	A	1.4	A	1.0	A	1.2	A

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	PM PEAK HOUR	PHF	0.97
Urban Street	CAHUENGA BL	Analysis Year	2024	Analysis Period	1> 7:00
Intersection	FOUNTAIN AV	File Name	1 CAHUENGA & FOUNTAIN PM FUTURE WO P...		
Project Description	FUTURE WITHOUT PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	75	617	23	47	391	172	24	656	76	90	847	51

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	26.0	26.0	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		8.0		8.0
Phase Duration, s		30.0		30.0		30.0		30.0
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g _s), s		28.0		22.3				
Green Extension Time (g _e), s		0.0		1.6		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		1.00		0.91				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		737			629		409		370	492		526
Adjusted Saturation Flow Rate (s), veh/h/ln		1667			1659		1729		1635	1315		1686
Queue Service Time (g _s), s		5.7			0.0		0.4		9.9	11.2		15.4
Cycle Queue Clearance Time (g _c), s		26.0			20.3		15.8		9.9	21.1		15.4
Green Ratio (g/C)		0.43			0.43		0.43		0.43	0.43		0.43
Capacity (c), veh/h		789			784		813		708	641		731
Volume-to-Capacity Ratio (X)		0.934			0.802		0.503		0.522	0.768		0.720
Back of Queue (Q), ft/ln (85 th percentile)		395.8			257.8		145.7		138.1	235.9		215.7
Back of Queue (Q), veh/ln (85 th percentile)		15.8			10.3		5.8		5.5	9.4		8.6
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00		0.00		0.00	0.00		0.00
Uniform Delay (d ₁), s/veh		16.9			15.1		12.3		12.5	15.5		14.0
Incremental Delay (d ₂), s/veh		17.8			5.6		2.2		2.7	8.6		6.1
Initial Queue Delay (d ₃), s/veh		0.0			0.0		0.0		0.0	0.0		0.0
Control Delay (d), s/veh		34.7			20.7		14.5		15.2	24.1		20.1
Level of Service (LOS)		C			C		B		B	C		C
Approach Delay, s/veh / LOS	34.7	C		20.7	C		14.8	B		22.0	C	
Intersection Delay, s/veh / LOS	22.9						C					

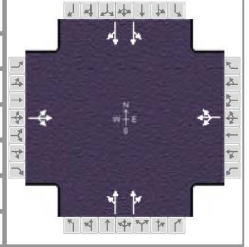
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.7	B		2.7	B		2.1	B		2.1	B	
Bicycle LOS Score / LOS	1.7	A		1.5	A		1.1	A		1.3	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	PM PEAK HOUR	PHF	0.97
Urban Street	CAHUENGA BL	Analysis Year	2024	Analysis Period	1> 7:00
Intersection	FOUNTAIN AV	File Name	1 CAHUENGA & FOUNTAIN PM FUTURE WITH...		
Project Description	FUTURE WITH PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	75	617	23	47	391	172	30	662	76	90	847	51

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	26.0	26.0	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		8.0		8.0
Phase Duration, s		30.0		30.0		30.0		30.0
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g _s), s		28.0		22.3				
Green Extension Time (g _e), s		0.0		1.6		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		1.00		0.91				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		737			629		413		379	492		527
Adjusted Saturation Flow Rate (s), veh/h/ln		1667			1659		1616		1633	1293		1684
Queue Service Time (g _s), s		5.7			0.0		0.8		10.3	11.4		15.5
Cycle Queue Clearance Time (g _c), s		26.0			20.3		16.3		10.3	21.7		15.5
Green Ratio (g/C)		0.43			0.43		0.43		0.43	0.43		0.43
Capacity (c), veh/h		789			784		765		707	632		730
Volume-to-Capacity Ratio (X)		0.935			0.803		0.539		0.536	0.779		0.721
Back of Queue (Q), ft/ln (85 th percentile)		396			256.8		149.3		142.1	240.4		216
Back of Queue (Q), veh/ln (85 th percentile)		15.8			10.3		6.0		5.7	9.6		8.6
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00		0.00		0.00	0.00		0.00
Uniform Delay (d ₁), s/veh		16.9			15.1		12.4		12.5	15.7		14.0
Incremental Delay (d ₂), s/veh		17.9			5.6		2.7		2.9	9.2		6.1
Initial Queue Delay (d ₃), s/veh		0.0			0.0		0.0		0.0	0.0		0.0
Control Delay (d), s/veh		34.7			20.7		15.1		15.4	24.9		20.1
Level of Service (LOS)		C			C		B		B	C		C
Approach Delay, s/veh / LOS	34.7	C		20.7	C		15.3	B		22.4	C	
Intersection Delay, s/veh / LOS	23.1						C					

Multimodal Results

	EB		WB		NB		SB	
Pedestrian LOS Score / LOS	2.7	B	2.7	B	2.1	B	2.1	B
Bicycle LOS Score / LOS	1.7	A	1.5	A	1.1	A	1.3	A

HCS 2010 Two-Way Stop-Control Report

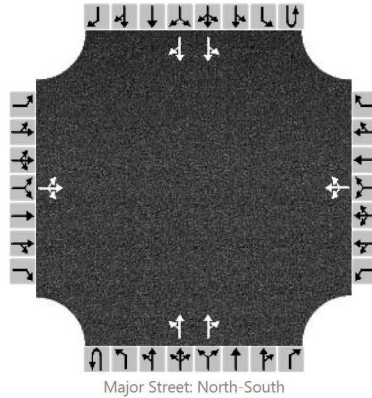
General Information

Analyst	LF
Agency/Co.	OTC, INC
Date Performed	12/29/2021
Analysis Year	2021
Time Analyzed	AM PEAK HOUR
Intersection Orientation	North-South
Project Description	EXISTING

Site Information

Intersection	2
Jurisdiction	LOS ANGELES
East/West Street	LEXINGTON AV
North/South Street	CAHUENGA BL
Peak Hour Factor	0.99
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority		10	11	12		7	8	9	1U	1	2	3	4U	4	5	6
Number of Lanes		0	1	0		0	1	0	0	0	2	0	0	0	2	0
Configuration			LTR				LTR			LT		TR		LT		TR
Volume, V (veh/h)		20	24	25		11	86	44		19	669	35		18	925	93
Percent Heavy Vehicles (%)		3	3	3		3	3	3		3				3		
Proportion Time Blocked																
Percent Grade (%)	0				0											
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)		7.5	6.5	6.9		7.5	6.5	6.9		4.1				4.1		
Critical Headway (sec)		7.56	6.56	6.96		7.56	6.56	6.96		4.16				4.16		
Base Follow-Up Headway (sec)		3.5	4.0	3.3		3.5	4.0	3.3		2.2				2.2		
Follow-Up Headway (sec)		3.53	4.03	3.33		3.53	4.03	3.33		2.23				2.23		

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)			69				142			19				18		
Capacity, c (veh/h)							94			638				876		
v/c Ratio							1.51			0.03				0.02		
95% Queue Length, Q ₉₅ (veh)							10.9			0.1				0.1		
Control Delay (s/veh)							355.2			10.8				9.2		
Level of Service, LOS							F			B				A		
Approach Delay (s/veh)					355.2				0.5				0.4			
Approach LOS					F											

HCS 2010 Two-Way Stop-Control Report

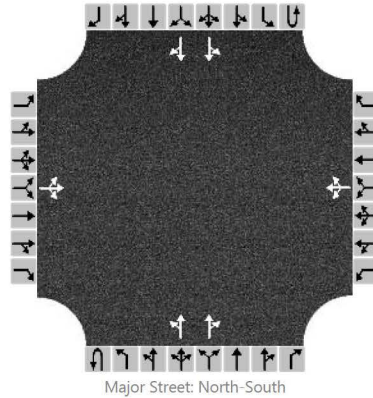
General Information

Analyst	LF
Agency/Co.	OTC, INC
Date Performed	12/29/2021
Analysis Year	2021
Time Analyzed	AM PEAK HOUR
Intersection Orientation	North-South
Project Description	EXISTING+PROJECT

Site Information

Intersection	2
Jurisdiction	LOS ANGELES
East/West Street	LEXINGTON AV
North/South Street	CAHUENGA BL
Peak Hour Factor	0.99
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority		10	11	12		7	8	9	1U	1	2	3	4U	4	5	6
Number of Lanes		0	1	0		0	1	0	0	0	2	0	0	0	2	0
Configuration			LTR				LTR			LT		TR		LT		TR
Volume, V (veh/h)		20	23	25		8	84	39		19	669	36		19	923	93
Percent Heavy Vehicles (%)		3	3	3		3	3	3		3				3		
Proportion Time Blocked																
Percent Grade (%)	0				0											
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)		7.5	6.5	6.9		7.5	6.5	6.9		4.1				4.1		
Critical Headway (sec)		7.56	6.56	6.96		7.56	6.56	6.96		4.16				4.16		
Base Follow-Up Headway (sec)		3.5	4.0	3.3		3.5	4.0	3.3		2.2				2.2		
Follow-Up Headway (sec)		3.53	4.03	3.33		3.53	4.03	3.33		2.23				2.23		

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)			68				132			19				19		
Capacity, c (veh/h)							91			638				874		
v/c Ratio							1.44			0.03				0.02		
95% Queue Length, Q ₉₅ (veh)							10.0			0.1				0.1		
Control Delay (s/veh)							332.8			10.8				9.2		
Level of Service, LOS							F			B				A		
Approach Delay (s/veh)					332.8				0.5				0.4			
Approach LOS					F											

HCS7 Two-Way Stop-Control Report

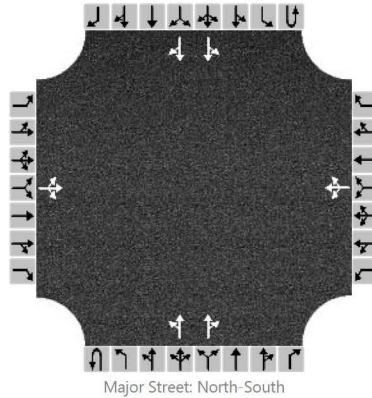
General Information

Analyst	LF
Agency/Co.	OTC, INC
Date Performed	12/29/2021
Analysis Year	2024
Time Analyzed	AM PEAK HOUR
Intersection Orientation	North-South
Project Description	FUTURE WITHOUT PROJECT

Site Information

Intersection	2
Jurisdiction	LOS ANGELES
East/West Street	LEXINGTON AV
North/South Street	CAHUENGA BL
Peak Hour Factor	0.99
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority		10	11	12		7	8	9	1U	1	2	3	4U	4	5	6
Number of Lanes		0	1	0		0	1	0	0	0	2	0	0	0	2	0
Configuration			LTR				LTR			LT		TR		LT		TR
Volume, V (veh/h)		20	32	34		19	93	45		19	768	37		28	1020	106
Percent Heavy Vehicles (%)		3	3	3		3	3	3		3				3		
Proportion Time Blocked																
Percent Grade (%)	0				0											
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)		7.5	6.5	6.9		7.5	6.5	6.9		4.1				4.1		
Critical Headway (sec)		7.56	6.56	6.96		7.56	6.56	6.96		4.16				4.16		
Base Follow-Up Headway (sec)		3.5	4.0	3.3		3.5	4.0	3.3		2.2				2.2		
Follow-Up Headway (sec)		3.53	4.03	3.33		3.53	4.03	3.33		2.23				2.23		

Delay, Queue Length, and Level of Service

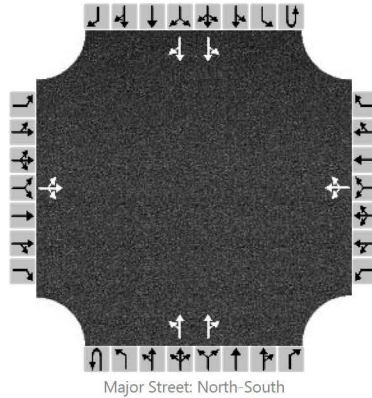
Flow Rate, v (veh/h)			87				159			19				28		
Capacity, c (veh/h)							58			579				802		
v/c Ratio							2.74			0.03				0.04		
95% Queue Length, Q ₉₅ (veh)							16.3			0.1				0.1		
Control Delay (s/veh)							940.5			11.4				9.7		
Level of Service, LOS							F			B				A		
Approach Delay (s/veh)					940.5				0.6				0.6			
Approach LOS					F											

HCS7 Two-Way Stop-Control Report

General Information

Analyst	LF	Intersection	2
Agency/Co.	OTC, INC	Jurisdiction	LOS ANGELES
Date Performed	12/29/2021	East/West Street	LEXINGTON AV
Analysis Year	2024	North/South Street	CAHUENGA BL
Time Analyzed	AM PEAK HOUR	Peak Hour Factor	0.99
Intersection Orientation	North-South	Analysis Time Period (hrs)	0.25
Project Description	FUTURE WITH PROJECT		

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority		10	11	12		7	8	9	1U	1	2	3	4U	4	5	6
Number of Lanes		0	1	0		0	1	0	0	0	2	0	0	0	2	0
Configuration			LTR				LTR			LT		TR		LT		TR
Volume, V (veh/h)		20	31	34		16	91	40		19	768	38		29	1018	106
Percent Heavy Vehicles (%)		3	3	3		3	3	3		3				3		
Proportion Time Blocked																
Percent Grade (%)	0				0											
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)		7.5	6.5	6.9		7.5	6.5	6.9		4.1				4.1		
Critical Headway (sec)		7.56	6.56	6.96		7.56	6.56	6.96		4.16				4.16		
Base Follow-Up Headway (sec)		3.5	4.0	3.3		3.5	4.0	3.3		2.2				2.2		
Follow-Up Headway (sec)		3.53	4.03	3.33		3.53	4.03	3.33		2.23				2.23		

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)			86				148			19				29		
Capacity, c (veh/h)							57			581				801		
v/c Ratio							2.59			0.03				0.04		
95% Queue Length, Q ₉₅ (veh)							15.1			0.1				0.1		
Control Delay (s/veh)							875.4			11.4				9.7		
Level of Service, LOS							F			B				A		
Approach Delay (s/veh)					875.4				0.6				0.7			
Approach LOS					F											

HCS 2010 Two-Way Stop-Control Report

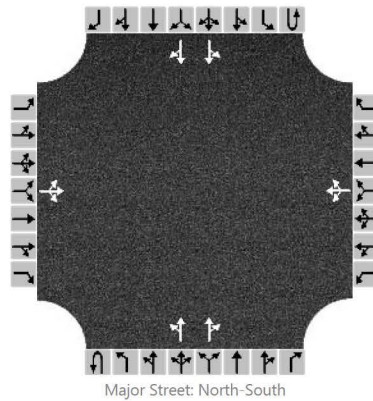
General Information

Analyst	LF
Agency/Co.	OTC, INC
Date Performed	12/29/2021
Analysis Year	2021
Time Analyzed	PM PEAK HOUR
Intersection Orientation	North-South
Project Description	EXISTING

Site Information

Intersection	2
Jurisdiction	LOS ANGELES
East/West Street	LEXINGTON AV
North/South Street	CAHUENGA BL
Peak Hour Factor	0.99
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority		10	11	12		7	8	9	1U	1	2	3	4U	4	5	6
Number of Lanes		0	1	0		0	1	0	0	0	2	0	0	0	2	0
Configuration			LTR				LTR			LT		TR		LT		TR
Volume, V (veh/h)		26	186	63		10	81	53		49	482	61		47	763	34
Percent Heavy Vehicles (%)		3	3	3		3	3	3		3				3		
Proportion Time Blocked																
Percent Grade (%)	0				0											
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)		7.5	6.5	6.9		7.5	6.5	6.9		4.1				4.1		
Critical Headway (sec)		7.56	6.56	6.96		7.56	6.56	6.96		4.16				4.16		
Base Follow-Up Headway (sec)		3.5	4.0	3.3		3.5	4.0	3.3		2.2				2.2		
Follow-Up Headway (sec)		3.53	4.03	3.33		3.53	4.03	3.33		2.23				2.23		

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)			278				146			49				47		
Capacity, c (veh/h)			85							786				1003		
v/c Ratio			3.27							0.06				0.05		
95% Queue Length, Q ₉₅ (veh)			27.9							0.2				0.1		
Control Delay (s/veh)			1124.5							9.9				8.8		
Level of Service, LOS			F							A				A		
Approach Delay (s/veh)	1124.5								1.1				0.8			
Approach LOS	F															

HCS 2010 Two-Way Stop-Control Report

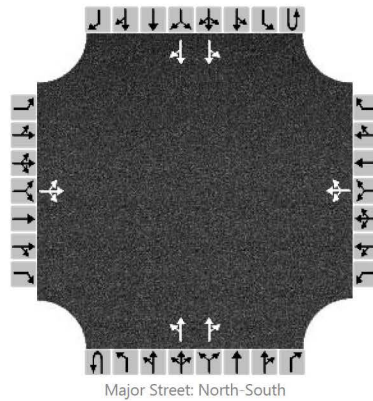
General Information

Analyst	LF
Agency/Co.	OTC, INC
Date Performed	12/29/2021
Analysis Year	2021
Time Analyzed	PM PEAK HOUR
Intersection Orientation	North-South
Project Description	EXISTING + PROJECT

Site Information

Intersection	2
Jurisdiction	LOS ANGELES
East/West Street	LEXINGTON AV
North/South Street	CAHUENGA BL
Peak Hour Factor	0.99
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority		10	11	12		7	8	9	1U	1	2	3	4U	4	5	6
Number of Lanes		0	1	0		0	1	0	0	0	2	0	0	0	2	0
Configuration			LTR				LTR			LT		TR		LT		TR
Volume, V (veh/h)		26	186	63		16	84	62		49	482	62		48	766	34
Percent Heavy Vehicles (%)		3	3	3		3	3	3		3				3		
Proportion Time Blocked																
Percent Grade (%)	0				0											
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)		7.5	6.5	6.9		7.5	6.5	6.9		4.1				4.1		
Critical Headway (sec)		7.56	6.56	6.96		7.56	6.56	6.96		4.16				4.16		
Base Follow-Up Headway (sec)		3.5	4.0	3.3		3.5	4.0	3.3		2.2				2.2		
Follow-Up Headway (sec)		3.53	4.03	3.33		3.53	4.03	3.33		2.23				2.23		

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)			278				164			49				48		
Capacity, c (veh/h)			75							782				1002		
v/c Ratio			3.70							0.06				0.05		
95% Queue Length, Q ₉₅ (veh)			29.0							0.2				0.2		
Control Delay (s/veh)			1329.5							9.9				8.8		
Level of Service, LOS			F							A				A		
Approach Delay (s/veh)	1329.5								1.1				0.8			
Approach LOS	F															

HCS 2010 Two-Way Stop-Control Report

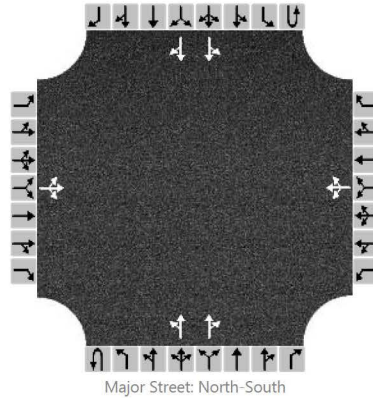
General Information

Analyst	LF
Agency/Co.	OTC, INC
Date Performed	12/29/2021
Analysis Year	2024
Time Analyzed	PM PEAK HOUR
Intersection Orientation	North-South
Project Description	FUTURE WO PROJECT

Site Information

Intersection	2
Jurisdiction	LOS ANGELES
East/West Street	LEXINGTON AV
North/South Street	CAHUENGA BL
Peak Hour Factor	0.99
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority		10	11	12		7	8	9	1U	1	2	3	4U	4	5	6
Number of Lanes		0	1	0		0	1	0	0	0	2	0	0	0	2	0
Configuration			LTR				LTR			LT		TR		LT		TR
Volume, V (veh/h)		27	197	72		18	90	55		51	575	63		64	859	51
Percent Heavy Vehicles (%)		3	3	3		3	3	3		3				3		
Proportion Time Blocked																
Percent Grade (%)	0				0											
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)		7.5	6.5	6.9		7.5	6.5	6.9		4.1				4.1		
Critical Headway (sec)		7.56	6.56	6.96		7.56	6.56	6.96		4.16				4.16		
Base Follow-Up Headway (sec)		3.5	4.0	3.3		3.5	4.0	3.3		2.2				2.2		
Follow-Up Headway (sec)		3.53	4.03	3.33		3.53	4.03	3.33		2.23				2.23		

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)			299				165			52				65		
Capacity, c (veh/h)										710				923		
v/c Ratio										0.07				0.07		
95% Queue Length, Q ₉₅ (veh)										0.2				0.2		
Control Delay (s/veh)										10.5				9.2		
Level of Service, LOS										B				A		
Approach Delay (s/veh)									1.2				1.1			
Approach LOS																

HCS 2010 Two-Way Stop-Control Report

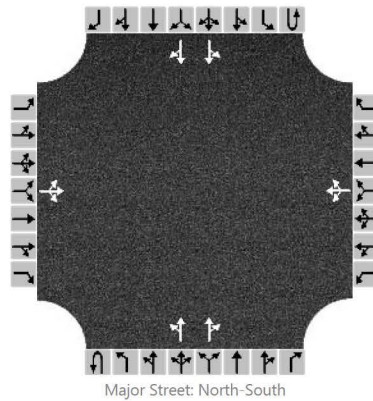
General Information

Analyst	LF
Agency/Co.	OTC, INC
Date Performed	12/29/2021
Analysis Year	2024
Time Analyzed	PM PEAK HOUR
Intersection Orientation	North-South
Project Description	FUTURE WITH PROJECT

Site Information

Intersection	2
Jurisdiction	LOS ANGELES
East/West Street	LEXINGTON AV
North/South Street	CAHUENGA BL
Peak Hour Factor	0.99
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority		10	11	12		7	8	9	1U	1	2	3	4U	4	5	6
Number of Lanes		0	1	0		0	1	0	0	0	2	0	0	0	2	0
Configuration			LTR				LTR			LT		TR		LT		TR
Volume, V (veh/h)		27	197	72		24	93	64		51	575	64		65	862	51
Percent Heavy Vehicles (%)		3	3	3		3	3	3		3				3		
Proportion Time Blocked																
Percent Grade (%)	0				0											
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)		7.5	6.5	6.9		7.5	6.5	6.9		4.1				4.1		
Critical Headway (sec)		7.56	6.56	6.96		7.56	6.56	6.96		4.16				4.16		
Base Follow-Up Headway (sec)		3.5	4.0	3.3		3.5	4.0	3.3		2.2				2.2		
Follow-Up Headway (sec)		3.53	4.03	3.33		3.53	4.03	3.33		2.23				2.23		

Delay, Queue Length, and Level of Service

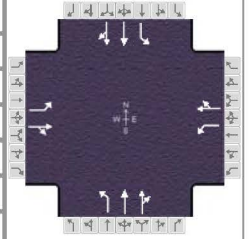
Flow Rate, v (veh/h)			299				183			52				66		
Capacity, c (veh/h)										707				921		
v/c Ratio										0.07				0.07		
95% Queue Length, Q ₉₅ (veh)										0.2				0.2		
Control Delay (s/veh)										10.5				9.2		
Level of Service, LOS										B				A		
Approach Delay (s/veh)									1.2				1.1			
Approach LOS																

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS		
Analyst	LF	Analysis Date	12/29/2021
Jurisdiction	LOS ANGELES	Time Period	AM PEAK HOUR
Urban Street	VINE ST	Analysis Year	2021
Intersection	FOUNTAIN AV	File Name	3 VINE & FOUNTAIN
Project Description	EXISTING		

Intersection Information



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	71	236	42	79	411	44	40	980	38	21	1284	87

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	30.8	21.2	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		6.0		6.0		6.0		6.0
Phase Duration, s		25.2		25.2		34.8		34.8
Change Period, ($Y+R_c$), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.2		3.2		0.0		0.0
Queue Clearance Time (g_s), s		19.8		15.3				
Green Extension Time (g_e), s		1.3		1.7		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		0.37		0.08				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h	74	290		82	474		42	541	519	22	731	698
Adjusted Saturation Flow Rate (s), veh/h/ln	921	1837		1092	1855		378	1900	1824	532	1900	1799
Queue Service Time (g_s), s	4.6	7.3		3.8	13.3		5.9	11.6	11.6	1.7	18.2	18.4
Cycle Queue Clearance Time (g_c), s	17.8	7.3		11.0	13.3		24.4	11.6	11.6	13.4	18.2	18.4
Green Ratio (g/C)	0.35	0.35		0.35	0.35		0.51	0.51	0.51	0.51	0.51	0.51
Capacity (c), veh/h	240	647		373	653		198	978	939	290	978	926
Volume-to-Capacity Ratio (X)	0.308	0.448		0.221	0.726		0.210	0.553	0.553	0.075	0.747	0.753
Back of Queue (Q), ft/ln (85 th percentile)	41.9	109.3		39.4	189.8		27.3	164.1	159.3	10.3	253.9	247.7
Back of Queue (Q), veh/ln (85 th percentile)	1.7	4.4		1.6	7.6		1.1	6.6	6.4	0.4	10.2	9.9
Queue Storage Ratio (RQ) (85 th percentile)	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d_1), s/veh	24.7	15.0		19.2	16.9		21.2	9.9	9.9	14.4	11.5	11.5
Incremental Delay (d_2), s/veh	0.3	0.2		0.1	1.8		2.4	2.3	2.3	0.5	5.2	5.6
Initial Queue Delay (d_3), s/veh	0.0	0.0		0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh	24.9	15.1		19.3	18.7		23.6	12.1	12.2	14.9	16.7	17.2
Level of Service (LOS)	C	B		B	B		C	B	B	B	B	B
Approach Delay, s/veh / LOS	17.1	B		18.8	B		12.6	B		16.9	B	
Intersection Delay, s/veh / LOS	15.9						B					

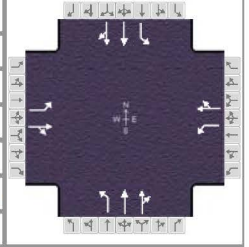
Multimodal Results

	EB		WB		NB		SB	
Pedestrian LOS Score / LOS	2.8	C	2.8	C	2.2	B	2.2	B
Bicycle LOS Score / LOS	1.1	A	1.4	A	1.4	A	1.7	A

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	AM PEAK HOUR	PHF	0.96
Urban Street	VINE ST	Analysis Year	2021	Analysis Period	1> 7:00
Intersection	FOUNTAIN AV	File Name	3 VINE & FOUNTAIN AM EXISTING+PROJECT.xus		
Project Description	EXISTING+PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	71	236	42	79	411	44	40	975	37	21	1285	87

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	30.8	21.2	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		6.0		6.0		6.0		6.0
Phase Duration, s		25.2		25.2		34.8		34.8
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.2		3.2		0.0		0.0
Queue Clearance Time (g _s), s		19.8		15.3				
Green Extension Time (g _e), s		1.3		1.7		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		0.37		0.08				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h	74	290		82	474		42	538	516	22	731	698
Adjusted Saturation Flow Rate (s), veh/h/ln	921	1837		1092	1854		378	1900	1824	534	1900	1798
Queue Service Time (g _s), s	4.6	7.3		3.8	13.3		5.9	11.5	11.5	1.7	18.2	18.5
Cycle Queue Clearance Time (g _c), s	17.8	7.3		11.0	13.3		24.5	11.5	11.5	13.3	18.2	18.5
Green Ratio (g/C)	0.35	0.35		0.35	0.35		0.51	0.51	0.51	0.51	0.51	0.51
Capacity (c), veh/h	240	647		373	653		198	978	939	292	978	925
Volume-to-Capacity Ratio (X)	0.308	0.448		0.221	0.726		0.211	0.550	0.550	0.075	0.748	0.754
Back of Queue (Q), ft/ln (85 th percentile)	41.9	109.3		39.4	189.9		27.3	163.1	158.4	10.2	254.2	248.5
Back of Queue (Q), veh/ln (85 th percentile)	1.7	4.4		1.6	7.6		1.1	6.5	6.3	0.4	10.2	9.9
Queue Storage Ratio (RQ) (85 th percentile)	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d ₁), s/veh	24.7	15.0		19.2	16.9		21.3	9.9	9.9	14.4	11.5	11.5
Incremental Delay (d ₂), s/veh	0.3	0.2		0.1	1.8		2.4	2.2	2.3	0.5	5.2	5.7
Initial Queue Delay (d ₃), s/veh	0.0	0.0		0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh	24.9	15.1		19.3	18.7		23.7	12.1	12.2	14.9	16.7	17.2
Level of Service (LOS)	C	B		B	B		C	B	B	B	B	B
Approach Delay, s/veh / LOS	17.1	B		18.8	B		12.6	B		16.9	B	
Intersection Delay, s/veh / LOS	15.9						B					

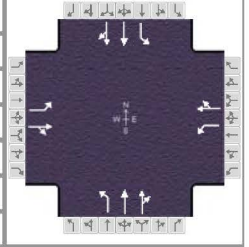
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.2	B		2.2	B	
Bicycle LOS Score / LOS	1.1	A		1.4	A		1.4	A		1.7	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	AM PEAK HOUR	PHF	0.96
Urban Street	VINE ST	Analysis Year	2024	Analysis Period	1> 7:00
Intersection	FOUNTAIN AV	File Name	3 VINE & FOUNTAIN AM FUTURE WO PROJEC...		
Project Description	FUTURE WITHOUT PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	117	254	74	81	442	46	86	1098	39	29	1400	148

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	27.8	24.2	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		6.0		6.0		6.0		6.0
Phase Duration, s		28.2		28.2		31.8		31.8
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g _s), s		23.3		15.5				
Green Extension Time (g _e), s		0.9		2.1		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		1.00		0.13				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h	122	342		84	508		90	604	581	30	827	786
Adjusted Saturation Flow Rate (s), veh/h/ln	894	1809		1044	1857		317	1900	1825	474	1900	1760
Queue Service Time (g _s), s	7.8	8.3		3.9	13.5		1.8	15.0	15.0	3.2	24.8	26.0
Cycle Queue Clearance Time (g _c), s	21.3	8.3		12.2	13.5		27.8	15.0	15.0	18.2	24.8	26.0
Green Ratio (g/C)	0.40	0.40		0.40	0.40		0.46	0.46	0.46	0.46	0.46	0.46
Capacity (c), veh/h	279	729		396	748		130	881	846	221	881	816
Volume-to-Capacity Ratio (X)	0.436	0.469		0.213	0.679		0.690	0.685	0.686	0.137	0.939	0.963
Back of Queue (Q), ft/ln (85 th percentile)	68.7	117.4		38.4	187.4		91.9	219.9	214	18.1	421.1	437
Back of Queue (Q), veh/ln (85 th percentile)	2.7	4.7		1.5	7.5		3.7	8.8	8.6	0.7	16.8	17.5
Queue Storage Ratio (RQ) (85 th percentile)	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d ₁), s/veh	23.5	13.2		17.7	14.7		29.9	12.7	12.7	19.8	15.3	15.6
Incremental Delay (d ₂), s/veh	0.4	0.2		0.1	1.6		26.1	4.3	4.5	1.3	18.6	23.7
Initial Queue Delay (d ₃), s/veh	0.0	0.0		0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh	23.9	13.4		17.8	16.3		56.0	17.0	17.2	21.1	33.9	39.3
Level of Service (LOS)	C	B		B	B		E	B	B	C	C	D
Approach Delay, s/veh / LOS	16.1	B		16.5	B		19.8	B		36.2	D	
Intersection Delay, s/veh / LOS	25.7						C					

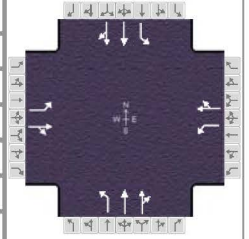
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.2	B		2.2	B	
Bicycle LOS Score / LOS	1.3	A		1.5	A		1.5	A		1.8	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	AM PEAK HOUR	PHF	0.96
Urban Street	VINE ST	Analysis Year	2024	Analysis Period	1> 7:00
Intersection	FOUNTAIN AV	File Name	3 VINE & FOUNTAIN AM FUTURE WITH PROJE...		
Project Description	FUTURE WITH PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	117	254	74	81	442	46	86	1093	38	29	1401	148

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	27.8	24.2	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		6.0		6.0		6.0		6.0
Phase Duration, s		28.2		28.2		31.8		31.8
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g _s), s		23.3		15.5				
Green Extension Time (g _e), s		0.9		2.1		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		1.00		0.13				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h	122	342		84	508		90	601	577	30	828	786
Adjusted Saturation Flow Rate (s), veh/h/ln	894	1809		1043	1857		317	1900	1825	476	1900	1758
Queue Service Time (g _s), s	7.8	8.3		3.9	13.5		1.8	14.9	14.9	3.2	24.8	26.0
Cycle Queue Clearance Time (g _c), s	21.3	8.3		12.2	13.5		27.8	14.9	14.9	18.1	24.8	26.0
Green Ratio (g/C)	0.40	0.40		0.40	0.40		0.46	0.46	0.46	0.46	0.46	0.46
Capacity (c), veh/h	279	729		396	748		129	881	846	222	881	815
Volume-to-Capacity Ratio (X)	0.436	0.469		0.213	0.679		0.693	0.682	0.683	0.136	0.940	0.965
Back of Queue (Q), ft/ln (85 th percentile)	68.7	117.4		38.4	187.4		92.2	218.6	212.7	18	423	439
Back of Queue (Q), veh/ln (85 th percentile)	2.7	4.7		1.5	7.5		3.7	8.7	8.5	0.7	16.9	17.6
Queue Storage Ratio (RQ) (85 th percentile)	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d ₁), s/veh	23.5	13.2		17.7	14.7		29.9	12.6	12.6	19.7	15.3	15.6
Incremental Delay (d ₂), s/veh	0.4	0.2		0.1	1.6		26.4	4.3	4.4	1.3	18.8	24.0
Initial Queue Delay (d ₃), s/veh	0.0	0.0		0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh	23.9	13.4		17.8	16.3		56.3	16.9	17.1	21.0	34.1	39.6
Level of Service (LOS)	C	B		B	B		E	B	B	C	C	D
Approach Delay, s/veh / LOS	16.1	B		16.5	B		19.8	B		36.5	D	
Intersection Delay, s/veh / LOS	25.8						C					

Multimodal Results

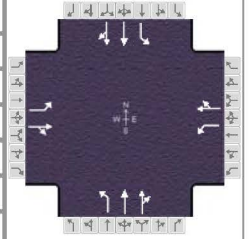
	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.2	B		2.2	B	
Bicycle LOS Score / LOS	1.3	A		1.5	A		1.5	A		1.8	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS		
Analyst	LF	Analysis Date	12/29/2021
Jurisdiction	LOS ANGELES	Time Period	PM PEAK HOUR
Urban Street	VINE ST	Analysis Year	2021
Intersection	FOUNTAIN AV	File Name	3 VINE & FOUNTAIN
Project Description	EXISTING		

Intersection Information



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	124	521	44	81	337	52	61	1168	58	51	1100	105

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	26.8	25.2	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		6.0		6.0		6.0		6.0
Phase Duration, s		29.2		29.2		30.8		30.8
Change Period, ($Y+R_c$), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g_s), s		19.1		24.5				
Green Extension Time (g_e), s		2.1		0.6		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		0.42		1.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h	132	601		86	414		65	668	636	54	667	615
Adjusted Saturation Flow Rate (s), veh/h/ln	977	1866		824	1844		431	1900	1800	423	1900	1740
Queue Service Time (g_s), s	7.0	16.5		6.0	10.1		8.7	18.0	18.1	7.6	17.9	18.1
Cycle Queue Clearance Time (g_c), s	17.1	16.5		22.5	10.1		26.8	18.0	18.1	25.7	17.9	18.1
Green Ratio (g/C)	0.42	0.42		0.42	0.42		0.45	0.45	0.45	0.45	0.45	0.45
Capacity (c), veh/h	366	783		239	774		182	849	805	181	849	778
Volume-to-Capacity Ratio (X)	0.360	0.768		0.361	0.535		0.356	0.787	0.790	0.299	0.785	0.791
Back of Queue (Q), ft/ln (85 th percentile)	65.2	233.8		49.3	138.4		50.6	273.8	266	40.8	272.4	260.2
Back of Queue (Q), veh/ln (85 th percentile)	2.6	9.4		2.0	5.5		2.0	11.0	10.6	1.6	10.9	10.4
Queue Storage Ratio (RQ) (85 th percentile)	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d_1), s/veh	19.4	14.9		24.6	13.0		25.8	14.2	14.2	25.2	14.1	14.2
Incremental Delay (d_2), s/veh	0.2	3.9		0.3	0.3		5.4	7.3	7.8	4.2	7.2	8.1
Initial Queue Delay (d_3), s/veh	0.0	0.0		0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh	19.6	18.8		24.9	13.3		31.2	21.4	22.0	29.4	21.3	22.2
Level of Service (LOS)	B	B		C	B		C	C	C	C	C	C
Approach Delay, s/veh / LOS	18.9	B		15.3	B		22.1	C		22.1	C	
Intersection Delay, s/veh / LOS	20.7						C					

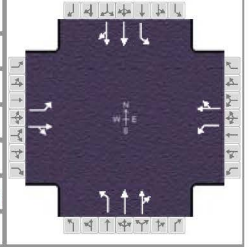
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.2	B		2.2	B	
Bicycle LOS Score / LOS	1.7	A		1.3	A		1.6	A		1.6	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	PM PEAK HOUR	PHF	0.94
Urban Street	VINE ST	Analysis Year	2021	Analysis Period	1> 7:00
Intersection	FOUNTAIN AV	File Name	3 VINE & FOUNTAIN PM EXISTING+PROJECT.xus		
Project Description	EXISTING+PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	124	521	44	81	337	52	61	1177	59	51	1101	105

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	26.8	25.2	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		6.0		6.0		6.0		6.0
Phase Duration, s		29.2		29.2		30.8		30.8
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g _s), s		19.1		24.5				
Green Extension Time (g _e), s		2.1		0.6		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		0.43		1.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h	132	601		86	414		65	674	641	54	668	615
Adjusted Saturation Flow Rate (s), veh/h/ln	977	1865		823	1843		431	1900	1798	418	1900	1737
Queue Service Time (g _s), s	7.0	16.6		6.0	10.1		8.6	18.2	18.4	7.7	18.0	18.2
Cycle Queue Clearance Time (g _c), s	17.1	16.6		22.5	10.1		26.8	18.2	18.4	26.1	18.0	18.2
Green Ratio (g/C)	0.42	0.42		0.42	0.42		0.45	0.45	0.45	0.45	0.45	0.45
Capacity (c), veh/h	366	783		239	774		182	849	804	179	849	777
Volume-to-Capacity Ratio (X)	0.361	0.768		0.361	0.535		0.357	0.794	0.797	0.303	0.786	0.792
Back of Queue (Q), ft/ln (85 th percentile)	65.2	233.9		49.3	138.4		50.6	277.8	269.9	41.1	273.6	260.6
Back of Queue (Q), veh/ln (85 th percentile)	2.6	9.4		2.0	5.5		2.0	11.1	10.8	1.6	10.9	10.4
Queue Storage Ratio (RQ) (85 th percentile)	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d ₁), s/veh	19.4	14.9		24.6	13.0		25.9	14.2	14.3	25.5	14.1	14.2
Incremental Delay (d ₂), s/veh	0.2	3.9		0.3	0.3		5.4	7.5	8.1	4.3	7.3	8.1
Initial Queue Delay (d ₃), s/veh	0.0	0.0		0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh	19.6	18.8		24.9	13.3		31.3	21.8	22.4	29.8	21.4	22.3
Level of Service (LOS)	B	B		C	B		C	C	C	C	C	C
Approach Delay, s/veh / LOS	18.9	B		15.3	B		22.5	C		22.2	C	
Intersection Delay, s/veh / LOS	20.8						C					

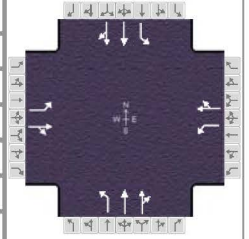
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.2	B		2.2	B	
Bicycle LOS Score / LOS	1.7	A		1.3	A		1.6	A		1.6	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	PM PEAK HOUR	PHF	0.94
Urban Street	VINE ST	Analysis Year	2024	Analysis Period	1> 7:00
Intersection	FOUNTAIN AV	File Name	3 VINE & FOUNTAIN PM FUTURE WO PROJEC...		
Project Description	FUTURE WITHOUT PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	180	555	90	83	363	53	106	1284	60	64	1164	166

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	26.0	26.0	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		6.0		6.0		6.0		6.0
Phase Duration, s		30.0		30.0		30.0		30.0
Change Period, ($Y+R_c$), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.4		3.4		0.0		0.0
Queue Clearance Time (g_s), s		24.0		28.0				
Green Extension Time (g_e), s		1.0		0.0		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		1.00		1.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h	191	686		88	443		113	731	699	68	743	672
Adjusted Saturation Flow Rate (s), veh/h/ln	952	1839		762	1846		381	1900	1802	376	1900	1682
Queue Service Time (g_s), s	11.3	20.2		5.8	10.7		3.4	21.3	21.5	4.5	21.8	22.6
Cycle Queue Clearance Time (g_c), s	22.0	20.2		26.0	10.7		26.0	21.3	21.5	26.0	21.8	22.6
Green Ratio (g/C)	0.43	0.43		0.43	0.43		0.43	0.43	0.43	0.43	0.43	0.43
Capacity (c), veh/h	362	797		193	800		142	823	781	148	823	729
Volume-to-Capacity Ratio (X)	0.528	0.861		0.457	0.553		0.797	0.888	0.895	0.460	0.903	0.922
Back of Queue (Q), ft/ln (85 th percentile)	97.2	300.9		55.3	145.2		117.9	350.5	345.5	59.9	366.1	358.4
Back of Queue (Q), veh/ln (85 th percentile)	3.9	12.0		2.2	5.8		4.7	14.0	13.8	2.4	14.6	14.3
Queue Storage Ratio (RQ) (85 th percentile)	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d_1), s/veh	20.9	15.4		27.6	12.7		29.7	15.7	15.7	29.1	15.8	16.0
Incremental Delay (d_2), s/veh	0.7	9.1		0.6	0.5		35.8	13.6	14.9	10.0	15.1	18.9
Initial Queue Delay (d_3), s/veh	0.0	0.0		0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh	21.6	24.4		28.2	13.2		65.5	29.3	30.7	39.0	30.9	35.0
Level of Service (LOS)	C	C		C	B		E	C	C	D	C	C
Approach Delay, s/veh / LOS	23.8	C		15.7	B		32.6	C		33.1	C	
Intersection Delay, s/veh / LOS	29.0						C					

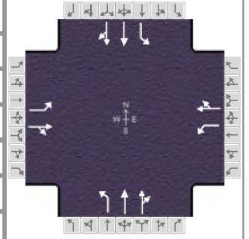
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.2	B		2.2	B	
Bicycle LOS Score / LOS	1.9	A		1.4	A		1.8	A		1.7	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	PM PEAK HOUR	PHF	0.94
Urban Street	VINE ST	Analysis Year	2024	Analysis Period	1> 7:00
Intersection	FOUNTAIN AV	File Name	3 VINE & FOUNTAIN PM FUTURE WITH PROJE...		
Project Description	FUTURE WITH PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	180	555	90	83	363	53	106	1293	61	64	1165	166

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	26.0	26.0	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		6.0		6.0		6.0		6.0
Phase Duration, s		30.0		30.0		30.0		30.0
Change Period, ($Y+R_c$), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.4		3.4		0.0		0.0
Queue Clearance Time (g_s), s		24.0		28.0				
Green Extension Time (g_e), s		1.0		0.0		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		1.00		1.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h	191	686		88	443		113	737	704	68	744	672
Adjusted Saturation Flow Rate (s), veh/h/ln	952	1839		762	1846		381	1900	1800	372	1900	1678
Queue Service Time (g_s), s	11.3	20.2		5.8	10.7		3.3	21.5	21.8	4.2	21.9	22.7
Cycle Queue Clearance Time (g_c), s	22.0	20.2		26.0	10.7		26.0	21.5	21.8	26.0	21.9	22.7
Green Ratio (g/C)	0.43	0.43		0.43	0.43		0.43	0.43	0.43	0.43	0.43	0.43
Capacity (c), veh/h	362	797		193	800		141	823	780	146	823	727
Volume-to-Capacity Ratio (X)	0.528	0.861		0.457	0.553		0.800	0.895	0.902	0.467	0.904	0.924
Back of Queue (Q), ft/ln (85 th percentile)	97.2	301		55.3	145.2		118.4	357.6	353	60.3	367.5	360.4
Back of Queue (Q), veh/ln (85 th percentile)	3.9	12.0		2.2	5.8		4.7	14.3	14.1	2.4	14.7	14.4
Queue Storage Ratio (RQ) (85 th percentile)	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d_1), s/veh	20.9	15.4		27.6	12.7		29.7	15.7	15.8	29.2	15.8	16.1
Incremental Delay (d_2), s/veh	0.7	9.1		0.6	0.5		36.3	14.3	15.7	10.4	15.2	19.2
Initial Queue Delay (d_3), s/veh	0.0	0.0		0.0	0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh	21.6	24.5		28.2	13.2		66.0	30.0	31.5	39.6	31.1	35.3
Level of Service (LOS)	C	C		C	B		E	C	C	D	C	D
Approach Delay, s/veh / LOS	23.8	C		15.7	B		33.3	C		33.4	C	
Intersection Delay, s/veh / LOS	29.4						C					

Multimodal Results

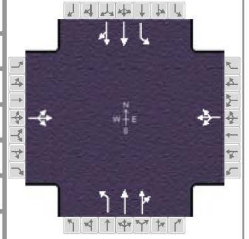
	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.2	B		2.2	B	
Bicycle LOS Score / LOS	1.9	A		1.4	A		1.8	A		1.7	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS		
Analyst	LF	Analysis Date	12/29/2021
Jurisdiction	LOS ANGELES	Time Period	AM PEAK HOUR
Urban Street	VINE ST	Analysis Year	2021
Intersection	LEXINGTON AV	File Name	4 VINE & LEXING
Project Description	EXISTING		

Intersection Information



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	19	34	33	28	69	29	27	1028	14	17	1287	53

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	45.3	6.7	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		6.0		6.0
Phase Duration, s		10.7		10.7		49.3		49.3
Change Period, ($Y+R_c$), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.2		3.2		0.0		0.0
Queue Clearance Time (g_s), s		5.0		6.5				
Green Extension Time (g_e), s		0.4		0.4		0.0		0.0
Phase Call Probability		0.98		0.98				
Max Out Probability		0.00		0.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		91			133		28	555	542	18	717	694
Adjusted Saturation Flow Rate (s), veh/h/ln		1662			1686		385	1900	1857	518	1900	1832
Queue Service Time (g_s), s		0.0			1.5		1.9	6.1	6.1	0.7	8.9	9.0
Cycle Queue Clearance Time (g_c), s		3.0			4.5		10.9	6.1	6.1	6.8	8.9	9.0
Green Ratio (g/C)		0.11			0.11		0.75	0.75	0.75	0.75	0.75	0.75
Capacity (c), veh/h		259			262		353	1434	1402	459	1434	1383
Volume-to-Capacity Ratio (X)		0.349			0.507		0.080	0.387	0.387	0.039	0.500	0.502
Back of Queue (Q), ft/ln (85 th percentile)		51.2			77		6.7	48.8	48	3.1	73.4	72
Back of Queue (Q), veh/ln (85 th percentile)		2.0			3.1		0.3	2.0	1.9	0.1	2.9	2.9
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d_1), s/veh		25.0			25.6		5.0	2.5	2.5	3.7	2.9	2.9
Incremental Delay (d_2), s/veh		0.3			0.6		0.4	0.8	0.8	0.2	1.2	1.3
Initial Queue Delay (d_3), s/veh		0.0			0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh		25.3			26.2		5.5	3.3	3.4	3.9	4.1	4.2
Level of Service (LOS)		C			C		A	A	A	A	A	A
Approach Delay, s/veh / LOS	25.3	C		26.2	C		3.4	A		4.2	A	
Intersection Delay, s/veh / LOS	5.6						A					

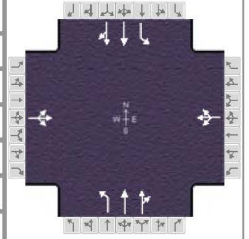
Multimodal Results

	EB		WB		NB		SB	
Pedestrian LOS Score / LOS	2.8	C	2.8	C	2.0	B	2.0	B
Bicycle LOS Score / LOS	0.6	A	0.7	A	1.4	A	1.7	A

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	AM PEAK HOUR	PHF	0.95
Urban Street	VINE ST	Analysis Year	2021	Analysis Period	1 > 7:00
Intersection	LEXINGTON AV	File Name	4 VINE & LEXINGTON AM EXISTING+PROJECT...		
Project Description	EXISTING+PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	16	30	28	28	70	29	28	1028	14	17	1285	54

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	45.3	6.7	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		6.0		6.0
Phase Duration, s		10.7		10.7		49.3		49.3
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.2		3.2		0.0		0.0
Queue Clearance Time (g _s), s		4.5		6.5				
Green Extension Time (g _e), s		0.4		0.4		0.0		0.0
Phase Call Probability		0.97		0.97				
Max Out Probability		0.00		0.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		78			134		29	555	542	18	716	693
Adjusted Saturation Flow Rate (s), veh/h/ln		1665			1683		386	1900	1856	518	1900	1830
Queue Service Time (g _s), s		0.0			2.0		2.0	6.1	6.1	0.7	8.9	9.0
Cycle Queue Clearance Time (g _c), s		2.5			4.5		10.9	6.1	6.1	6.8	8.9	9.0
Green Ratio (g/C)		0.11			0.11		0.75	0.75	0.75	0.75	0.75	0.75
Capacity (c), veh/h		259			261		353	1434	1402	459	1434	1382
Volume-to-Capacity Ratio (X)		0.301			0.512		0.083	0.387	0.387	0.039	0.499	0.502
Back of Queue (Q), ft/ln (85 th percentile)		43.6			77.6		7	48.8	48	3.1	73.4	71.9
Back of Queue (Q), veh/ln (85 th percentile)		1.7			3.1		0.3	2.0	1.9	0.1	2.9	2.9
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d ₁), s/veh		24.8			25.6		5.1	2.5	2.5	3.7	2.9	2.9
Incremental Delay (d ₂), s/veh		0.2			0.6		0.5	0.8	0.8	0.2	1.2	1.3
Initial Queue Delay (d ₃), s/veh		0.0			0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh		25.0			26.2		5.5	3.3	3.4	3.9	4.1	4.2
Level of Service (LOS)		C			C		A	A	A	A	A	A
Approach Delay, s/veh / LOS	25.0	C		26.2	C		3.4	A		4.2	A	
Intersection Delay, s/veh / LOS	5.5						A					

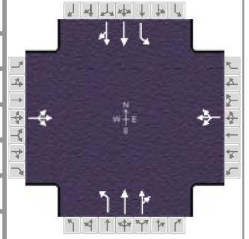
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.0	B		2.0	B	
Bicycle LOS Score / LOS	0.6	A		0.7	A		1.4	A		1.7	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	AM PEAK HOUR	PHF	0.95
Urban Street	VINE ST	Analysis Year	2024	Analysis Period	1> 7:00
Intersection	LEXINGTON AV	File Name	4 VINE & LEXINGTON AM FUTURE WO PROJE...		
Project Description	FUTURE WITHOUT PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	32	36	44	29	73	30	43	1178	15	25	1426	54

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	45.0	7.0	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		6.0		6.0
Phase Duration, s		11.0		11.0		49.0		49.0
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g _s), s		6.0		6.6				
Green Extension Time (g _e), s		0.5		0.5		0.0		0.0
Phase Call Probability		0.99		0.99				
Max Out Probability		0.00		0.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		118			139		45	635	621	26	790	768
Adjusted Saturation Flow Rate (s), veh/h/ln		1623			1696		335	1900	1857	446	1900	1834
Queue Service Time (g _s), s		0.0			0.6		4.0	7.5	7.5	1.4	10.7	10.8
Cycle Queue Clearance Time (g _c), s		4.0			4.6		14.9	7.5	7.5	9.0	10.7	10.8
Green Ratio (g/C)		0.12			0.12		0.75	0.75	0.75	0.75	0.75	0.75
Capacity (c), veh/h		267			271		311	1425	1393	398	1425	1375
Volume-to-Capacity Ratio (X)		0.442			0.512		0.146	0.446	0.446	0.066	0.554	0.558
Back of Queue (Q), ft/ln (85 th percentile)		67.6			79.7		13.4	64	63	5.6	89	88.7
Back of Queue (Q), veh/ln (85 th percentile)		2.7			3.2		0.5	2.6	2.5	0.2	3.6	3.5
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d ₁), s/veh		25.1			25.4		6.4	2.8	2.8	4.5	3.2	3.2
Incremental Delay (d ₂), s/veh		0.4			0.6		1.0	1.0	1.0	0.3	1.6	1.6
Initial Queue Delay (d ₃), s/veh		0.0			0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh		25.6			26.0		7.4	3.8	3.9	4.8	4.8	4.9
Level of Service (LOS)		C			C		A	A	A	A	A	A
Approach Delay, s/veh / LOS	25.6	C		26.0	C		4.0	A		4.8	A	
Intersection Delay, s/veh / LOS	6.2						A					

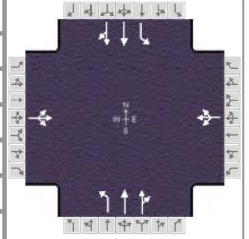
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.0	B		2.0	B	
Bicycle LOS Score / LOS	0.7	A		0.7	A		1.6	A		1.8	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	AM PEAK HOUR	PHF	0.95
Urban Street	VINE ST	Analysis Year	2024	Analysis Period	1> 7:00
Intersection	LEXINGTON AV	File Name	4 VINE & LEXINGTON AM FUTURE WITH PROJ...		
Project Description	FUTURE WITH PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	29	32	39	29	74	30	44	1178	15	25	1424	55

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	45.0	7.0	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		6.0		6.0
Phase Duration, s		11.0		11.0		49.0		49.0
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g _s), s		5.5		6.7				
Green Extension Time (g _e), s		0.5		0.4		0.0		0.0
Phase Call Probability		0.98		0.98				
Max Out Probability		0.00		0.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		105			140		46	635	621	26	790	767
Adjusted Saturation Flow Rate (s), veh/h/ln		1622			1693		335	1900	1857	446	1900	1833
Queue Service Time (g _s), s		0.0			1.2		4.1	7.5	7.5	1.4	10.7	10.8
Cycle Queue Clearance Time (g _c), s		3.5			4.7		15.0	7.5	7.5	9.0	10.7	10.8
Green Ratio (g/C)		0.12			0.12		0.75	0.75	0.75	0.75	0.75	0.75
Capacity (c), veh/h		267			271		311	1424	1392	398	1424	1374
Volume-to-Capacity Ratio (X)		0.394			0.516		0.149	0.446	0.446	0.066	0.554	0.558
Back of Queue (Q), ft/ln (85 th percentile)		59.7			80.2		13.8	64	63.1	5.6	89	88.6
Back of Queue (Q), veh/ln (85 th percentile)		2.4			3.2		0.6	2.6	2.5	0.2	3.6	3.5
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d ₁), s/veh		24.9			25.4		6.5	2.8	2.8	4.5	3.2	3.2
Incremental Delay (d ₂), s/veh		0.4			0.6		1.0	1.0	1.0	0.3	1.6	1.6
Initial Queue Delay (d ₃), s/veh		0.0			0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh		25.3			26.0		7.5	3.8	3.9	4.8	4.8	4.9
Level of Service (LOS)		C			C		A	A	A	A	A	A
Approach Delay, s/veh / LOS	25.3	C		26.0	C		4.0	A		4.8	A	
Intersection Delay, s/veh / LOS	6.1						A					

Multimodal Results

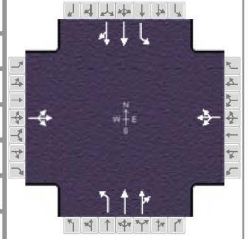
	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.0	B		2.0	B	
Bicycle LOS Score / LOS	0.7	A		0.7	A		1.6	A		1.8	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS		
Analyst	LF	Analysis Date	12/29/2021
Jurisdiction	LOS ANGELES	Time Period	PM PEAK HOUR
Urban Street	VINE ST	Analysis Year	2021
Intersection	LEXINGTON AV	File Name	4 VINE & LEXING
Project Description	EXISTING		

Intersection Information



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	41	124	46	21	45	53	19	1188	37	28	1212	29

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	41.9	10.1	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		6.0		6.0
Phase Duration, s		14.1		14.1		45.9		45.9
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g _s), s		9.5		6.1				
Green Extension Time (g _e), s		0.6		0.7		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		0.00		0.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		222			125		20	655	634	29	663	644
Adjusted Saturation Flow Rate (s), veh/h/ln		1676			1637		423	1900	1836	431	1900	1843
Queue Service Time (g _s), s		3.5			0.0		1.4	9.5	9.6	2.0	9.7	9.7
Cycle Queue Clearance Time (g _c), s		7.5			4.1		11.1	9.5	9.6	11.6	9.7	9.7
Green Ratio (g/C)		0.17			0.17		0.70	0.70	0.70	0.70	0.70	0.70
Capacity (c), veh/h		355			347		347	1326	1282	352	1326	1286
Volume-to-Capacity Ratio (X)		0.626			0.361		0.058	0.494	0.495	0.084	0.500	0.501
Back of Queue (Q), ft/ln (85 th percentile)		113.7			66.5		5.8	100.8	98.8	8.6	102.5	100.7
Back of Queue (Q), veh/ln (85 th percentile)		4.5			2.7		0.2	4.0	4.0	0.3	4.1	4.0
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d ₁), s/veh		23.8			22.4		6.8	4.2	4.2	6.9	4.2	4.2
Incremental Delay (d ₂), s/veh		0.7			0.2		0.3	1.3	1.4	0.5	1.3	1.4
Initial Queue Delay (d ₃), s/veh		0.0			0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh		24.4			22.6		7.1	5.5	5.6	7.3	5.6	5.6
Level of Service (LOS)		C			C		A	A	A	A	A	A
Approach Delay, s/veh / LOS	24.4	C		22.6	C		5.5	A		5.6	A	
Intersection Delay, s/veh / LOS	7.7						A					

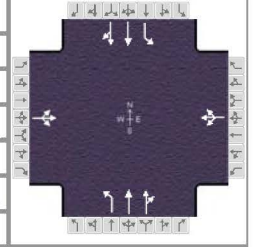
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.0	B		2.0	B	
Bicycle LOS Score / LOS	0.9	A		0.7	A		1.6	A		1.6	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	PM PEAK HOUR	PHF	0.95
Urban Street	VINE ST	Analysis Year	2021	Analysis Period	1> 7:00
Intersection	LEXINGTON AV	File Name	4 VINE & LEXINGTON PM EXISTING+PROJECT...		
Project Description	EXISTING+PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	47	132	55	21	46	53	20	1188	37	28	1215	29

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	40.9	11.1	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		6.0		6.0
Phase Duration, s		15.1		15.1		44.9		44.9
Change Period, (Y+R _c), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g _s), s		10.4		6.0				
Green Extension Time (g _e), s		0.7		0.7		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		0.00		0.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		246			126		21	655	634	29	664	645
Adjusted Saturation Flow Rate (s), veh/h/ln		1666			1644		422	1900	1836	430	1900	1842
Queue Service Time (g _s), s		4.4			0.0		1.5	10.0	10.1	2.1	10.2	10.3
Cycle Queue Clearance Time (g _c), s		8.4			4.0		11.8	10.0	10.1	12.2	10.2	10.3
Green Ratio (g/C)		0.18			0.18		0.68	0.68	0.68	0.68	0.68	0.68
Capacity (c), veh/h		379			373		336	1297	1253	342	1297	1257
Volume-to-Capacity Ratio (X)		0.650			0.338		0.063	0.505	0.506	0.086	0.512	0.513
Back of Queue (Q), ft/ln (85 th percentile)		123			65.3		6.5	110	107.7	9.2	112	110
Back of Queue (Q), veh/ln (85 th percentile)		4.9			2.6		0.3	4.4	4.3	0.4	4.5	4.4
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d ₁), s/veh		23.3			21.6		7.5	4.6	4.6	7.6	4.7	4.7
Incremental Delay (d ₂), s/veh		0.7			0.2		0.4	1.4	1.5	0.5	1.4	1.5
Initial Queue Delay (d ₃), s/veh		0.0			0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh		24.0			21.8		7.9	6.0	6.1	8.1	6.1	6.2
Level of Service (LOS)		C			C		A	A	A	A	A	A
Approach Delay, s/veh / LOS	24.0	C		21.8	C		6.1	A		6.2	A	
Intersection Delay, s/veh / LOS	8.2						A					

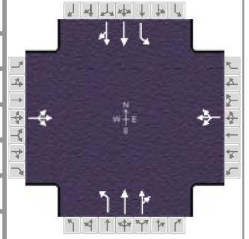
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.0	B		2.0	B	
Bicycle LOS Score / LOS	0.9	A		0.7	A		1.6	A		1.6	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	PM PEAK HOUR	PHF	0.95
Urban Street	VINE ST	Analysis Year	2024	Analysis Period	1> 7:00
Intersection	LEXINGTON AV	File Name	4 VINE & LEXINGTON PM FUTURE WO PROJE...		
Project Description	FUTURE WITHOUT PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	51	130	63	21	48	54	33	1338	38	41	1359	30

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	40.5	11.5	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		6.0		6.0
Phase Duration, s		15.5		15.5		44.5		44.5
Change Period, ($Y+R_c$), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g_s), s		10.8		6.1				
Green Extension Time (g_e), s		0.7		0.8		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		0.00		0.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		257			129		35	735	714	43	741	721
Adjusted Saturation Flow Rate (s), veh/h/ln		1651			1648		365	1900	1839	371	1900	1844
Queue Service Time (g_s), s		4.8			0.0		3.4	12.3	12.4	4.2	12.5	12.5
Cycle Queue Clearance Time (g_c), s		8.8			4.1		15.9	12.3	12.4	16.6	12.5	12.5
Green Ratio (g/C)		0.19			0.19		0.67	0.67	0.67	0.67	0.67	0.67
Capacity (c), veh/h		390			387		290	1282	1240	293	1282	1244
Volume-to-Capacity Ratio (X)		0.659			0.335		0.120	0.573	0.575	0.147	0.578	0.580
Back of Queue (Q), ft/ln (85 th percentile)		126.8			66.3		13	134.2	132.5	16.5	136	133.8
Back of Queue (Q), veh/ln (85 th percentile)		5.1			2.7		0.5	5.4	5.3	0.7	5.4	5.4
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d_1), s/veh		23.0			21.2		9.5	5.2	5.2	9.6	5.2	5.2
Incremental Delay (d_2), s/veh		0.7			0.2		0.8	1.9	1.9	1.1	1.9	2.0
Initial Queue Delay (d_3), s/veh		0.0			0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh		23.8			21.4		10.3	7.0	7.1	10.7	7.1	7.2
Level of Service (LOS)		C			C		B	A	A	B	A	A
Approach Delay, s/veh / LOS	23.8	C		21.4	C		7.2	A		7.3	A	
Intersection Delay, s/veh / LOS	9.0						A					

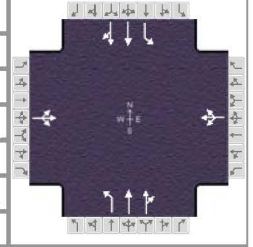
Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.0	B		2.0	B	
Bicycle LOS Score / LOS	0.9	A		0.7	A		1.7	A		1.7	A	

HCS 2010 Signalized Intersection Results Summary

General Information

Agency	OVERLAND TRAFFIC CONSULTANTS			Duration, h	0.25
Analyst	LF	Analysis Date	12/29/2021	Area Type	Other
Jurisdiction	LOS ANGELES	Time Period	PM PEAK HOUR	PHF	0.95
Urban Street	VINE ST	Analysis Year	2024	Analysis Period	1 > 7:00
Intersection	LEXINGTON AV	File Name	4 VINE & LEXINGTON PM FUTURE WITH PROJ...		
Project Description	FUTURE WITH PROJECT				



Demand Information

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Demand (v), veh/h	57	138	72	21	49	54	34	1338	38	41	1362	30

Signal Information

Cycle, s	60.0	Reference Phase	2									
Offset, s	0	Reference Point	End									
Uncoordinated	No	Simult. Gap E/W	On	Green	39.6	12.4	0.0	0.0	0.0	0.0		
Force Mode	Fixed	Simult. Gap N/S	On	Yellow	4.0	4.0	0.0	0.0	0.0	0.0		
				Red	0.0	0.0	0.0	0.0	0.0	0.0		

Timer Results

	EBL	EBT	WBL	WBT	NBL	NBT	SBL	SBT
Assigned Phase		8		4		6		2
Case Number		8.0		8.0		6.0		6.0
Phase Duration, s		16.4		16.4		43.6		43.6
Change Period, ($Y+R_c$), s		4.0		4.0		4.0		4.0
Max Allow Headway (MAH), s		3.3		3.3		0.0		0.0
Queue Clearance Time (g_s), s		11.7		6.0				
Green Extension Time (g_e), s		0.7		0.8		0.0		0.0
Phase Call Probability		1.00		1.00				
Max Out Probability		0.00		0.00				

Movement Group Results

	EB			WB			NB			SB		
Approach Movement	L	T	R	L	T	R	L	T	R	L	T	R
Assigned Movement	3	8	18	7	4	14	1	6	16	5	2	12
Adjusted Flow Rate (v), veh/h		281			131		36	735	714	43	742	723
Adjusted Saturation Flow Rate (s), veh/h/ln		1643			1652		364	1900	1838	370	1900	1843
Queue Service Time (g_s), s		5.7			0.0		3.7	12.9	13.0	4.4	13.1	13.2
Cycle Queue Clearance Time (g_c), s		9.7			4.0		16.9	12.9	13.0	17.4	13.1	13.2
Green Ratio (g/C)		0.21			0.21		0.66	0.66	0.66	0.66	0.66	0.66
Capacity (c), veh/h		414			413		280	1252	1211	284	1252	1215
Volume-to-Capacity Ratio (X)		0.679			0.316		0.128	0.587	0.589	0.152	0.593	0.595
Back of Queue (Q), ft/ln (85 th percentile)		136			65.1		14.4	145.2	143.2	17.6	147.4	145.6
Back of Queue (Q), veh/ln (85 th percentile)		5.4			2.6		0.6	5.8	5.7	0.7	5.9	5.8
Queue Storage Ratio (RQ) (85 th percentile)		0.00			0.00		0.00	0.00	0.00	0.00	0.00	0.00
Uniform Delay (d_1), s/veh		22.6			20.4		10.5	5.7	5.7	10.5	5.7	5.7
Incremental Delay (d_2), s/veh		0.7			0.2		0.9	2.0	2.1	1.1	2.1	2.2
Initial Queue Delay (d_3), s/veh		0.0			0.0		0.0	0.0	0.0	0.0	0.0	0.0
Control Delay (d), s/veh		23.3			20.6		11.4	7.7	7.8	11.7	7.8	7.9
Level of Service (LOS)		C			C		B	A	A	B	A	A
Approach Delay, s/veh / LOS	23.3	C		20.6	C		7.8	A		7.9	A	
Intersection Delay, s/veh / LOS	9.7						A					

Multimodal Results

	EB			WB			NB			SB		
Pedestrian LOS Score / LOS	2.8	C		2.8	C		2.0	B		2.0	B	
Bicycle LOS Score / LOS	1.0	A		0.7	A		1.7	A		1.7	A	

HCS 2010 Two-Way Stop-Control Report

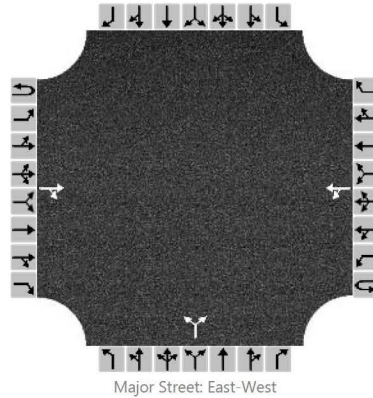
General Information

Analyst	LF
Agency/Co.	OTC, INC
Date Performed	12/29/2021
Analysis Year	2024
Time Analyzed	AM PEAK HOUR
Intersection Orientation	East-West
Project Description	EXISTING

Site Information

Intersection	A
Jurisdiction	LOS ANGELES
East/West Street	LA MIRADA
North/South Street	PROJECT DRIVEWAY
Peak Hour Factor	0.92
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority	1U	1	2	3	4U	4	5	6		7	8	9		10	11	12
Number of Lanes	0	0	1	0	0	0	1	0		0	0	0		0	0	0
Configuration				TR		LT					LR					
Volume, V (veh/h)			157	9		11	143			2		3				
Percent Heavy Vehicles (%)						3				3		3				
Proportion Time Blocked																
Percent Grade (%)									0							
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)						4.1				7.1		6.2				
Critical Headway (sec)						4.13				6.43		6.23				
Base Follow-Up Headway (sec)						2.2				3.5		3.3				
Follow-Up Headway (sec)						2.23				3.53		3.33				

Delay, Queue Length, and Level of Service

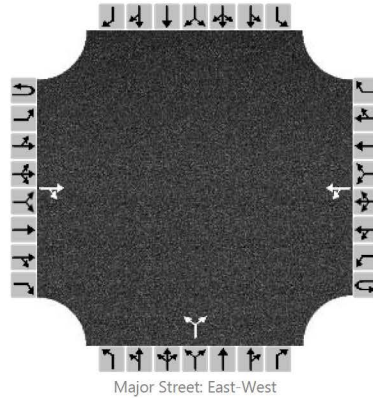
Flow Rate, v (veh/h)						12					5					
Capacity, c (veh/h)						1387					747					
v/c Ratio						0.01					0.01					
95% Queue Length, Q ₉₅ (veh)						0.0					0.0					
Control Delay (s/veh)						7.6					9.9					
Level of Service, LOS						A					A					
Approach Delay (s/veh)					0.6				9.9							
Approach LOS									A							

HCS 2010 Two-Way Stop-Control Report

General Information

Analyst	LF	Intersection	A
Agency/Co.	OTC, INC	Jurisdiction	LOS ANGELES
Date Performed	12/29/2021	East/West Street	LA MIRADA
Analysis Year	2024	North/South Street	PROJECT DRIVEWAY
Time Analyzed	PM PEAK HOUR	Peak Hour Factor	0.92
Intersection Orientation	East-West	Analysis Time Period (hrs)	0.25
Project Description	EXISTING		

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority	1U	1	2	3	4U	4	5	6		7	8	9		10	11	12
Number of Lanes	0	0	1	0	0	0	1	0		0	0	0		0	0	0
Configuration				TR		LT					LR					
Volume, V (veh/h)			30	2		2	55			8		10				
Percent Heavy Vehicles (%)						3				3		3				
Proportion Time Blocked																
Percent Grade (%)									0							
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)						4.1				7.1		6.2				
Critical Headway (sec)						4.13				6.43		6.23				
Base Follow-Up Headway (sec)						2.2				3.5		3.3				
Follow-Up Headway (sec)						2.23				3.53		3.33				

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)						2					20					
Capacity, c (veh/h)						1568					957					
v/c Ratio						0.00					0.02					
95% Queue Length, Q ₉₅ (veh)						0.0					0.1					
Control Delay (s/veh)						7.3					8.8					
Level of Service, LOS						A					A					
Approach Delay (s/veh)					0.2				8.8							
Approach LOS									A							

HCS7 Two-Way Stop-Control Report

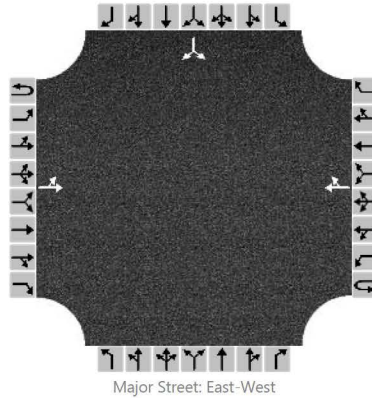
General Information

Analyst	LF
Agency/Co.	OTC, INC
Date Performed	12/29/2021
Analysis Year	2024
Time Analyzed	AM PEAK HOUR
Intersection Orientation	East-West
Project Description	EXISTING

Site Information

Intersection	AB
Jurisdiction	LOS ANGELES
East/West Street	LEXINGTON AV
North/South Street	WEST PROJECT DRIVEWAY
Peak Hour Factor	0.92
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority	1U	1	2	3	4U	4	5	6		7	8	9		10	11	12
Number of Lanes	0	0	1	0	0	0	1	0		0	0	0		0	1	0
Configuration		LT						TR							LR	
Volume, V (veh/h)		6	157				143	7						1		1
Percent Heavy Vehicles (%)		3												3		3
Proportion Time Blocked																
Percent Grade (%)													0			
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)		4.1												7.1		6.2
Critical Headway (sec)		4.13												6.43		6.23
Base Follow-Up Headway (sec)		2.2												3.5		3.3
Follow-Up Headway (sec)		2.23												3.53		3.33

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)		7													2	
Capacity, c (veh/h)		1408													739	
v/c Ratio		0.00													0.00	
95% Queue Length, Q ₉₅ (veh)		0.0													0.0	
Control Delay (s/veh)		7.6													9.9	
Level of Service, LOS		A													A	
Approach Delay (s/veh)	0.3												9.9			
Approach LOS													A			

HCS7 Two-Way Stop-Control Report

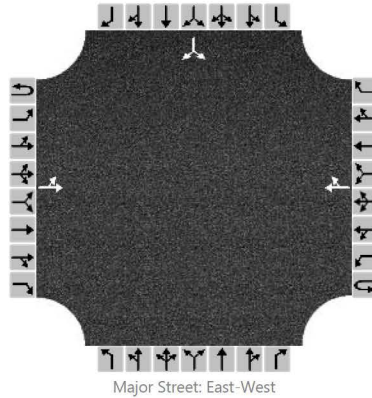
General Information

Analyst	LF
Agency/Co.	OTC, INC
Date Performed	12/29/2021
Analysis Year	2024
Time Analyzed	PM PEAK HOUR
Intersection Orientation	East-West
Project Description	EXISTING

Site Information

Intersection	B
Jurisdiction	LOS ANGELES
East/West Street	LEXINGTON AV
North/South Street	WEST PROJECT DRIVEWAY
Peak Hour Factor	0.92
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority	1U	1	2	3	4U	4	5	6		7	8	9		10	11	12
Number of Lanes	0	0	1	0	0	0	1	0		0	0	0		0	1	0
Configuration		LT						TR							LR	
Volume, V (veh/h)		1	30				55	1						6		4
Percent Heavy Vehicles (%)		3												3		3
Proportion Time Blocked																
Percent Grade (%)													0			
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)		4.1												7.1		6.2
Critical Headway (sec)		4.13												6.43		6.23
Base Follow-Up Headway (sec)		2.2												3.5		3.3
Follow-Up Headway (sec)		2.23												3.53		3.33

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)		1													11	
Capacity, c (veh/h)		1534													928	
v/c Ratio		0.00													0.01	
95% Queue Length, Q ₉₅ (veh)		0.0													0.0	
Control Delay (s/veh)		7.3													8.9	
Level of Service, LOS		A													A	
Approach Delay (s/veh)	0.2												8.9			
Approach LOS													A			

HCS7 Two-Way Stop-Control Report

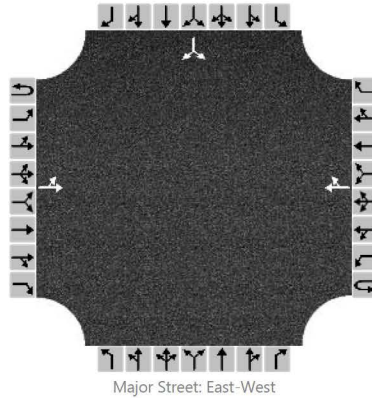
General Information

Analyst	LF
Agency/Co.	OTC, INC
Date Performed	12/29/2021
Analysis Year	2024
Time Analyzed	AM PEAK HOUR
Intersection Orientation	East-West
Project Description	EXISTING

Site Information

Intersection	⌚
Jurisdiction	LOS ANGELES
East/West Street	LEXINGTON AV
North/South Street	EAST PROJECT DRIVEWAY
Peak Hour Factor	0.92
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority	1U	1	2	3	4U	4	5	6		7	8	9		10	11	12
Number of Lanes	0	0	1	0	0	0	1	0		0	0	0		0	1	0
Configuration		LT						TR							LR	
Volume, V (veh/h)		31	157				143	27						5		6
Percent Heavy Vehicles (%)		3												3		3
Proportion Time Blocked																
Percent Grade (%)													0			
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)		4.1												7.1		6.2
Critical Headway (sec)		4.13												6.43		6.23
Base Follow-Up Headway (sec)		2.2												3.5		3.3
Follow-Up Headway (sec)		2.23												3.53		3.33

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)		34													12	
Capacity, c (veh/h)		1382													703	
v/c Ratio		0.02													0.02	
95% Queue Length, Q ₉₅ (veh)		0.1													0.1	
Control Delay (s/veh)		7.7													10.2	
Level of Service, LOS		A													B	
Approach Delay (s/veh)	1.4												10.2			
Approach LOS													B			

HCS 2010 Two-Way Stop-Control Report

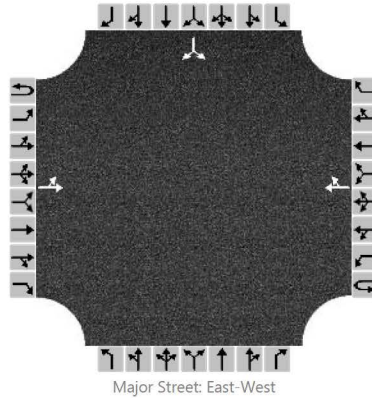
General Information

Analyst	LF
Agency/Co.	OTC, INC
Date Performed	12/29/2021
Analysis Year	2024
Time Analyzed	PM PEAK HOUR
Intersection Orientation	East-West
Project Description	EXISTING

Site Information

Intersection	Ⓐ
Jurisdiction	LOS ANGELES
East/West Street	LEXINGTON AV
North/South Street	EAST PROJECT DRIVEWAY
Peak Hour Factor	0.92
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
Movement	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Priority	1U	1	2	3	4U	4	5	6		7	8	9		10	11	12
Number of Lanes	0	0	1	0	0	0	1	0		0	0	0		0	0	0
Configuration		LT						TR							LR	
Volume, V (veh/h)		6	31				55	6						23		27
Percent Heavy Vehicles (%)		3												3		3
Proportion Time Blocked																
Percent Grade (%)													0			
Right Turn Channelized	No				No				No				No			
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)		4.1												7.1		6.2
Critical Headway (sec)		4.13												6.43		6.23
Base Follow-Up Headway (sec)		2.2												3.5		3.3
Follow-Up Headway (sec)		2.23												3.53		3.33

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)		7													54	
Capacity, c (veh/h)		1526													929	
v/c Ratio		0.00													0.06	
95% Queue Length, Q ₉₅ (veh)		0.0													0.2	
Control Delay (s/veh)		7.4													9.1	
Level of Service, LOS		A													A	
Approach Delay (s/veh)	1.3												9.1			
Approach LOS													A			

SIGNAL WARRANT WORKSHEETS

Traffic Signal Warrants Worksheet

SR#

DATE 1-3-22 PREPARER LF REVIEWER _____MAJOR ST: CAHUENGA BOULEVARDMINOR ST: LEXINGTON STREET

Critical Approach Speed	}	or	Speed Limit	}
Speed limit or critical speed on major street traffic > 40 mph.....	☐	} RURAL (R)		☒ URBAN (U)
In built up area of isolated community of < 10,000 population.....	☐			

SIX HOURS OF

Eight-Hour Vehicular Volume

N/A ☐SATISFIED YES ☒NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Condition A or Condition B or combination of 80% of both parts A and B must be satisfied.
- A 6-hour Manual Count may be used in a determination that this warrant is not met. However, supplement manual counts should be taken during separate hours for a determination that this warrant is met.
- In applying each condition, the major street and minor street volumes shall be for the same hours. On the minor street, the higher volume does not need to be the same approach during each of the hours.
- The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count.
- Figure 4C-103(CA) should be used for new intersections, significantly reconstructed intersections, where near-term land development will result in increased volumes, or where it is not reasonable to use current traffic volumes.
- Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. This site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles. Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher volume of the major-street left-turn volumes plus the higher volume minor-street approach as the "minor street" volume and both approaches of the major street minus the higher of the major-street left-turn volume as "major street" volume. In these cases, engineering judgment should be used to determine if left-turn phasing is necessary to accommodate the high volume of left-turn traffic.

Eight-Hour Vehicular Volume



(continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

Condition A

Minimum Vehicle Volume

SATISFIED	YES	NO
100%	☐	☒
80%	☐	☒
RIGHT TURN REDUCTION APPLICATION MINOR STREET (If Yes, fill in percentage)		☐ 100 %

APPROACH LANES	MINIMUM REQUIREMENTS (80% SHOW IN BRACKETS)				Hours						
	U	R	U	R	7AM	8AM	9AM	3PM	4PM	5PM	
Both Approach Major Street	500 (400)	350 (280)	600 (480)	420 (336)	1421	1759	1401	1541	1376	1437	
Highest Approach Minor Street	150 (120)	105 (84)	200 (160)	140 (112)	111	97	149	170	125	212	

Condition B

Interruption of Continuous Traffic

SATISFIED	YES	NO
100%	☒	☐
80%	☒	☐
RIGHT TURN REDUCTION APPLICATION MINOR STREET (If Yes, fill in percentage)		☐ 100 %

APPROACH LANES	MINIMUM REQUIREMENTS (80% SHOW IN BRACKETS)				Hours						
	U	R	U	R	7AM	8AM	9AM	3PM	4PM	5PM	
Both Approach Major Street	750 (600)	525 (420)	900 (720)	630 (504)	1421	1759	1401	1541	1376	1437	
Highest Approach Minor Street	75 (60)	53 (42)	100 (80)	70 (56)	111	97	149	170	125	212	

COMBINATION OF A & B

SATISFIED	YES	NO
	☐	☒

REQUIREMENT	CONDITION	✓	FULFILLED	
			YES	NO
TWO CONDITIONS SATISFIED 80%	A. MINIMUM VEHICULAR VOLUME		☐	☒
	AND B. INTERRUPTION OF CONTINUOUS TRAFFIC		☐	☐
AND AN ADEQUATE TRIAL OF OTHER ALTERNATIVES THAT COULD CAUSE LESS DELAY AND INCOVENIENCE TO TRAFFIC HAS FAILED TO SOLVE THE TRAFFIC PROBLEMS			☐	☐

WARRANT 1 Eight-Hour Vehicular Volume(continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

Projected Volumes

N/A

☒

SATISFIED	YES	NO

Figure 4C-103 (CA). Traffic Signal Warrants Worksheet (Average Traffic Estimate Form)
Based on Estimated Average Daily Traffic - see *Note**

URBAN ☐		RURAL ☐		Minimum Requirements Estimated Average Daily Traffic			
CONDITION A - Minimum Vehicular Volume Satisfied ☐ Not Satisfied ☐				Vehicles Per Day On Major Street (Total of Both Approaches)		Vehicles Per Day On Higher-Volume Minor Street Approach (One Direction Only)	
Number of lanes for moving traffic on each approach				Urban	Rural	Urban	Rural
Major Street	Minor Street	Major Street	Minor Street				
1.....	1.....	1.....	1.....	8,000	5,600	2,400	1,680
2 or More.....	1.....	2 or More.....	1.....	9,600	6,720	2,400	1,680
2 or More.....	2 or More.....	2 or More.....	2 or More.....	9,600	6,720	3,200	2,240
1.....	2 or More.....	1.....	2 or More.....	8,000	5,600	3,200	2,240
CONDITION B - Interruption of Continuous Traffic Satisfied ☐ Not Satisfied ☐				Vehicles Per Day On Major Street (Total of Both Approaches)		Vehicles Per Day On Higher-Volume Minor Street Approach (One Direction Only)	
Number of lanes for moving traffic on each approach				Urban	Rural	Urban	Rural
Minor Street	Minor Street	Minor Street	Minor Street				
1.....	1.....	1.....	1.....	12,000	8,400	1,200	850
2 or More.....	1.....	2 or More.....	1.....	14,400	10,080	1,200	850
2 or More.....	2 or More.....	2 or More.....	2 or More.....	14,400	10,080	1,600	1,120
1.....	2 or More.....	1.....	2 or More.....	12,000	8,400	1,600	1,120
Combination of CONDITIONS A + B Satisfied ☐ Not Satisfied ☐				2 CONDITIONS 80%		2 CONDITIONS 80%	
<u>No one condition satisfied</u> , but following conditions fulfilled 80% or more..... <u> </u> <u> </u> A B							

* **Note:** To be used only for NEW INTERSECTIONS or other locations where it is not reasonable to count actual traffic volumes

Four-Hour Vehicular Volume



N/A ☐

SATISFIED YES ☒

NO ☐

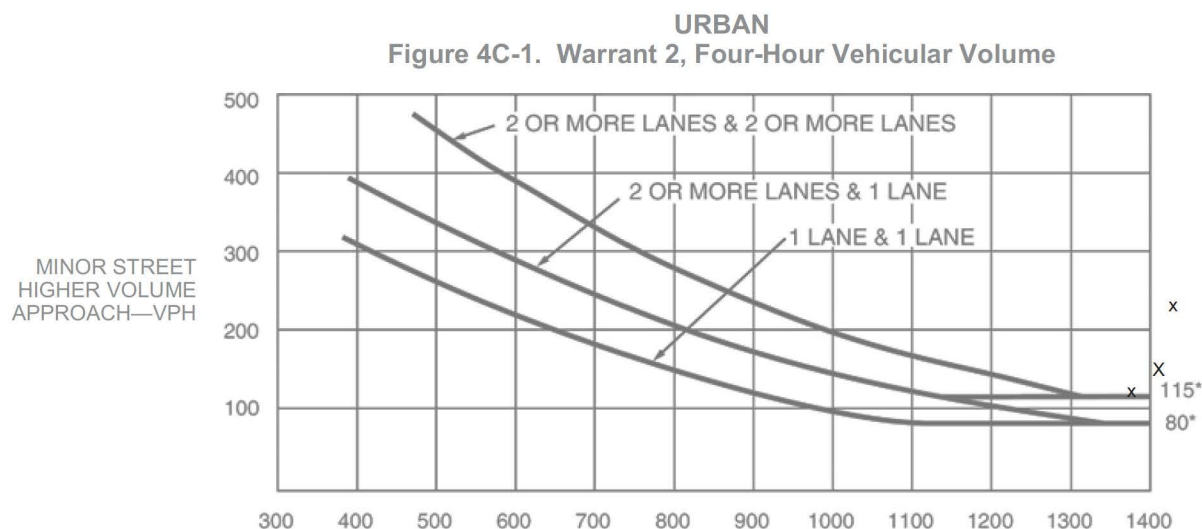
★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Record hourly vehicle volumes for the highest four hours of an average day.
- In applying each condition, the major street and minor street volumes shall be for the same hours. On the minor street, the higher volume does not need to be the same approach during each of the hours.
- The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count.
- Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. This site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles. Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher volume of the major-street left-turn volumes plus the higher volume minor-street approach as the "minor street" volume and both approaches of the major street minus the higher of the major-street left-turn volume as "major street" volume. In these cases, engineering judgment should be used to determine if left-turn phasing is necessary to accommodate the high volume of left-turn traffic.

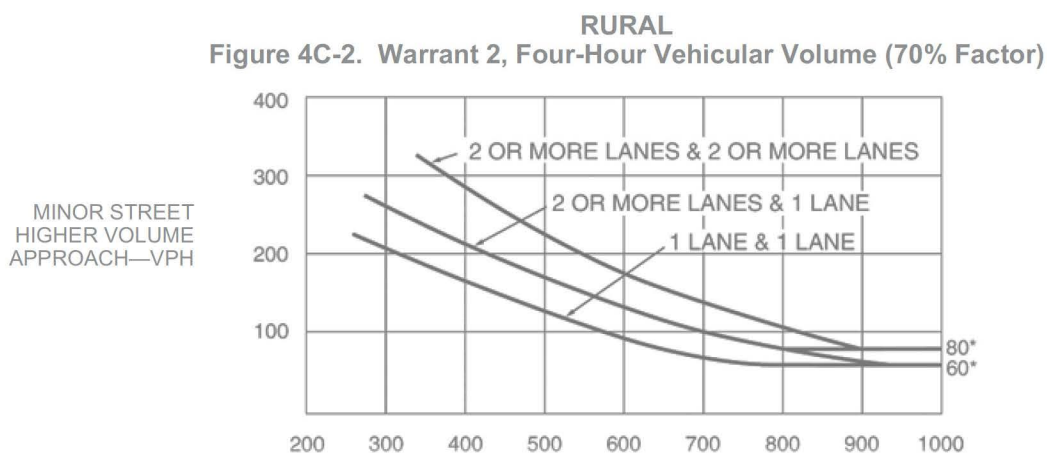
APPROACH LANES			Hours					YES	NO
	One	2 or More	10am	4pm	5pm	6pm			
Both Approaches - Major Street		✓	1401	1541	1376	1437	RIGHT TURN REDUCTION APPLICATION MINOR STREET (If Yes, fill in percentage)	☒	☐
Higher Approach - Minor Street	✓		149	170	125	212		100 %	
* All plotted points fall above the applicable curve in Figure 4C-1. (URBAN AREAS)								☒	☐
OR, All plotted points fall above the applicable curve in Figure 4C-2. (RURAL AREAS)									

Four-Hour Vehicular Volume WARRANT 2 (continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★



*Note: 115 vph applies as the lower threshold volume for a minor-street approach with two or more lanes and 80 vph applies as the lower threshold volume for a minor-street approach with one lane.



*Note: 80 vph applies as the lower threshold volume for a minor-street approach with two or more lanes and 60 vph applies as the lower threshold volume for a minor-street approach with one lane.

Peak Hour

WARRANT
3

N/A

☒

SATISFIED

YES

☐

NO

☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Part A or Part B must be satisfied.
- b. This signal warrant shall be applied only in unusual cases, such as office complexes, manufacturing plants, industrial complexes, or high-occupancy vehicle facilities that attract or discharge large numbers of vehicles over a short time.
- c. In applying each condition, the major street and minor street volumes shall be for the same hours.
- d. The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count.
- e. Estimated Peak Hour Volumes may be used for new intersections, significantly reconstructed intersections, or where near-term land development will result in increased volumes.
- f. Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. This site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles. Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- g. At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher volume of the major-street left-turn volumes plus the higher volume minor-street approach as the "minor street" volume and both approaches of the major street minus the higher of the major-street left-turn volume as "major street" volume. In these cases, engineering judgment should be used to determine if left-turn phasing is necessary to accommodate the high volume of left-turn traffic.

Unusual facility per Note b.

YES ☐

NO ☐

Name _____

PART A

All parts 1, 2, and 3 below must be satisfied for the same one hour, for any four consecutive 15-minute periods)

	YES	NO	N/A
1. The total delay experienced by traffic on one minor street approach (one direction only) controlled by a STOP sign equals or exceeds four vehicle-hours for a one-lane approach, or five vehicle-hours for a two-lane approach; <u>AND</u>	☐	☐	☐
2. The volume on the same minor street approach (one direction only) equals or exceeds 100 vph for one moving lane of traffic or 150 vph for two moving lanes; <u>AND</u>	☐	☐	☐
3. The total entering volume serviced during the hour equals or exceeds 800 vph for intersections with four or more approaches or 650 vph for intersections with three approaches.	☐	☐	☐

PART B

				SATISFIED	YES	NO
				☐	☐	☐

APPROACH LANES	One	2 or More	Hour	
Both Approaches - Major Street		✓		
Higher Approach - Minor Street	✓		0	

RIGHT TURN REDUCTION APPLICATION MINOR STREET

(If Yes, fill in percentage)

YES

NO

☐

☐

YES

NO

☐

☐

The plotted point falls above the applicable curve in Figure 4C-3. (URBAN AREAS)

OR, The plotted point falls above the applicable curve in Figure 4C-4. (RURAL AREAS)

YES

NO

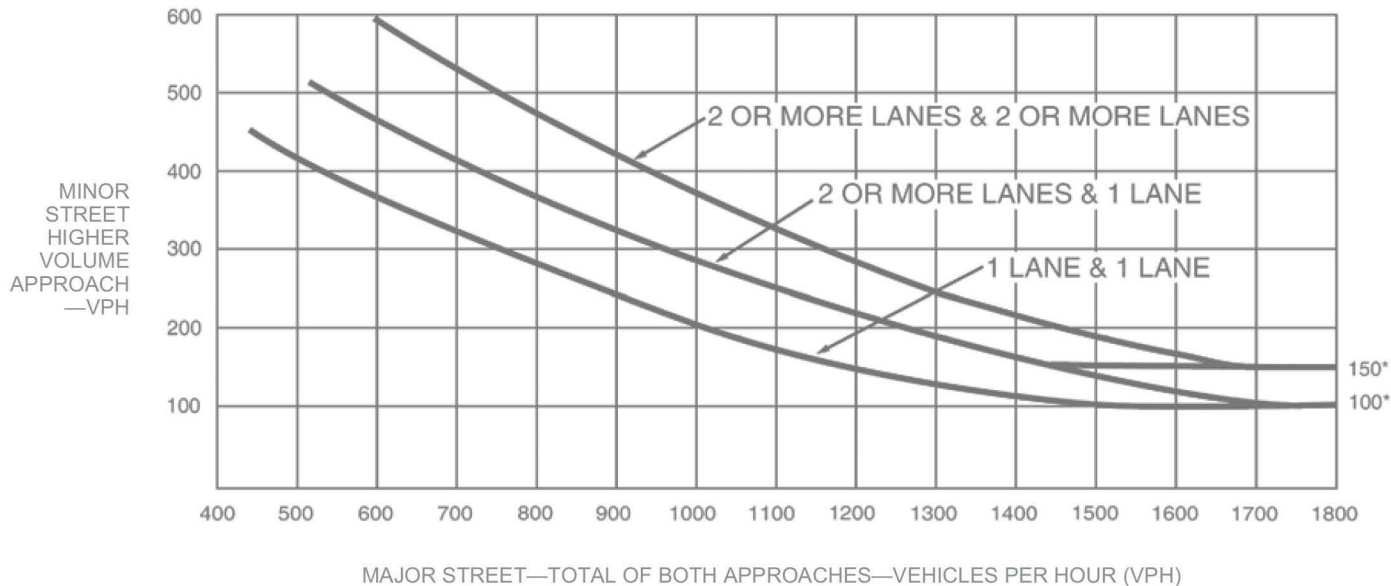
☐

☐

WARRANT 3 **Peak Hour** (continued)

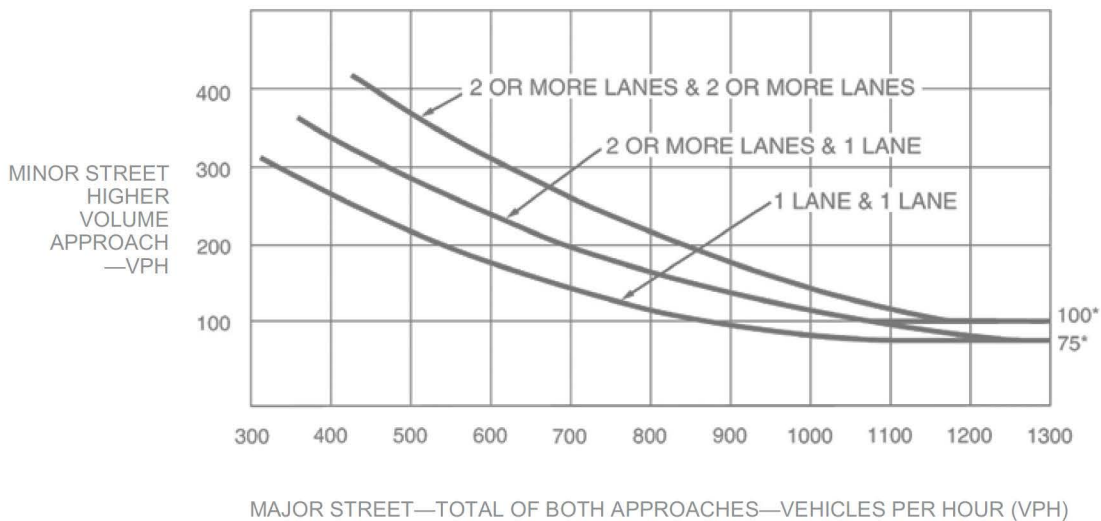
★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

URBAN
Figure 4C-3. Warrant 3, Peak Hour



* Note: 150 vph applies as the lower threshold volume for a minor street approach with two or more lanes and 100 vph applies as the lower threshold volume for a minor street approach with one lane.

RURAL
Figure 4C-4. Warrant 3, Peak Hour (70% Factor)
(COMMUNITY LESS THAN 10,000 POPULATION OR ABOVE 40 MPH ON MAJOR STREET)



* Note: 100 vph applies as the lower threshold volume for a minor street approach with two or more lanes and 75 vph applies as the lower threshold volume for a minor street approach with one lane.

Pedestrian Volume



N/A	☐
SATISFIED YES	☐
NO	☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Parts 1 and 2 shall be satisfied.
- The pedestrian volume criterion may be reduced by as much as 50% if the 15th percentile speed of the pedestrians is less than 3.5 feet/second.
- Estimated pedestrian volumes may be used where nearby, near-term land use development has been approved for construction.
- In applying each condition, the total vehicles per hour on the major street (on both approaches) and the total pedestrians per hour crossing the major street shall be for the same hours.
- The Pedestrian Volume signal warrants shall not be applied at locations where the distance to the nearest traffic control signal or STOP sign controlling the street that pedestrians desire to cross is less than 300 feet, unless the proposed traffic control signal will not restrict the progressive movement of traffic.
- Traffic control signal may not be needed at the study location if adjacent coordinated traffic control signals consistently provide gaps of adequate length for pedestrians to cross the street.
- If it is considered at a non-intersection crossing, the traffic control signal should be installed at least 100 feet from side streets or driveways that are controlled by STOP or YIELD signs. If the traffic control signal is installed at a non-intersection crossing, at least one of the signal faces should be over the traveled way for each approach, parking and other sight obstructions should be prohibited for at least 100 feet in advance of and at least 20 feet beyond the crosswalk or site accommodations should be made through curb extensions or other techniques to provide adequate sight distance, and the installation should include suitable standard signs and pavement markings.
- Bicycles may be counted as pedestrians.
- Pedestrian Hybrid Beacons may be considered instead of a traffic signal if a device is recommended based upon pedestrian needs

PART 1 (A or B must be satisfied)

SATISFIED	YES	NO
	☐	☒

A. FOUR-HOUR PEDESTRIAN VOLUMES	Hours			
	9am	10am	5pm	6pm
Vehicles per hour on major street for 4 hours	1759	1401	1376	1437
Pedestrians crossing major street per hour for highest 4 hours	25	21	24	21

(FIGURE 4C-5 OR 4C-6 SATISFIED)

SATISFIED	YES	NO
100%	☐	☒
80%	☐	☒
50%	☐	☒

15% WALKING RATE _____ fps

B. ONE HOUR PEDESTRIAN VOLUMES	Hour
	5pm
Vehicles per hour on major street for 1 hour	1376
Pedestrians crossing major street per hour for highest 1 hour	24

(FIGURE 4C-7 or 4C-8 SATISFIED)

SATISFIED	YES	NO
100%	☐	☒
80%	☐	☒
50%	☐	☒

15% WALKING RATE _____ fps

PART 2

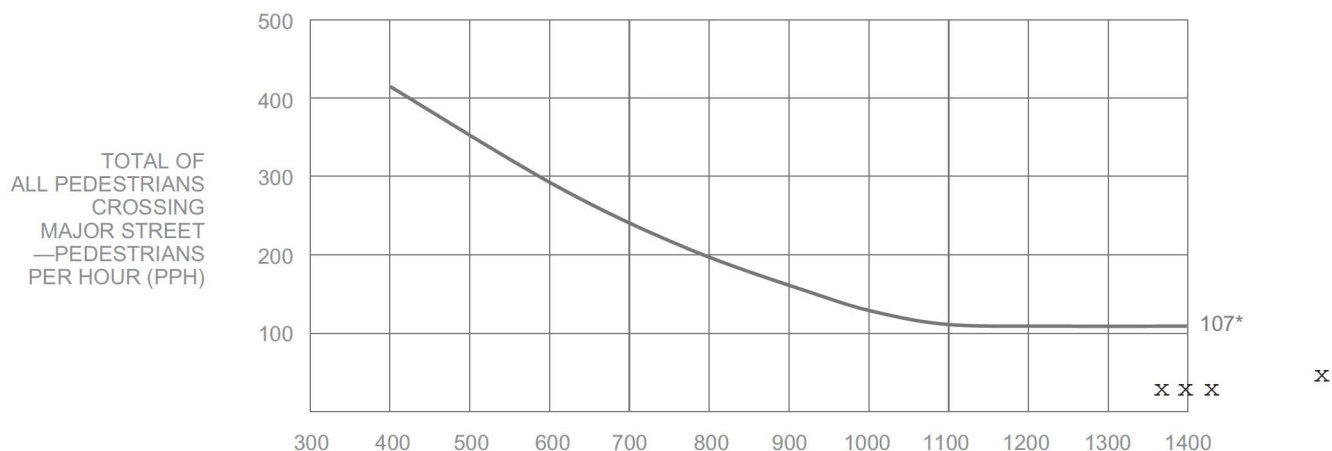
SATISFIED	YES	NO
	☐	☒

	YES	NO
<u>AND</u> , The distance to the nearest traffic signal along the major street is greater than 300 ft	☐	☐
<u>OR</u> , The proposed traffic signal will not restrict progressive traffic flow along the major street	☐	☒

WARRANT 4 **Pedestrian Volume** (continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

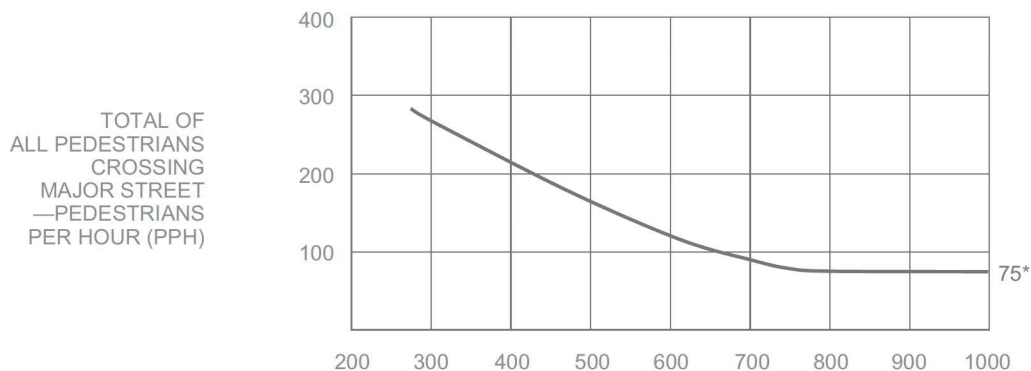
SPEED ≤ 35 MPH
Figure 4C-5. Warrant 4, Pedestrian Four-Hour Volume



MAJOR STREET—TOTAL OF BOTH APPROACHES—VEHICLES PER HOUR (VPH)

* Note: 107 pph applies as the lower threshold volume

SPEED > 35 MPH
Figure 4C-6. Warrant 4, Pedestrian Four-Hour Volume (70% Factor)



MAJOR STREET—TOTAL OF BOTH APPROACHES—VEHICLES PER HOUR (VPH)

* Note: 75 pph applies as the lower threshold volume

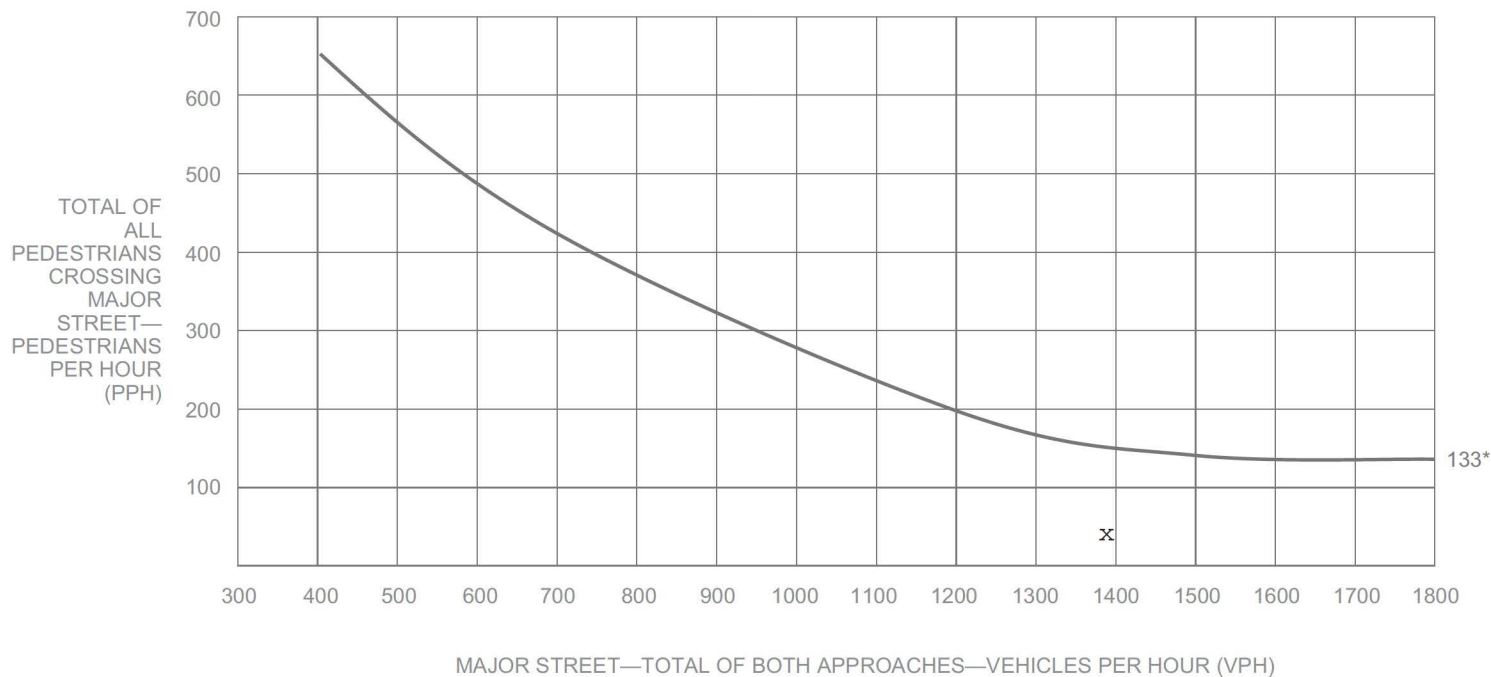
Pedestrian Volume

WARRANT
4

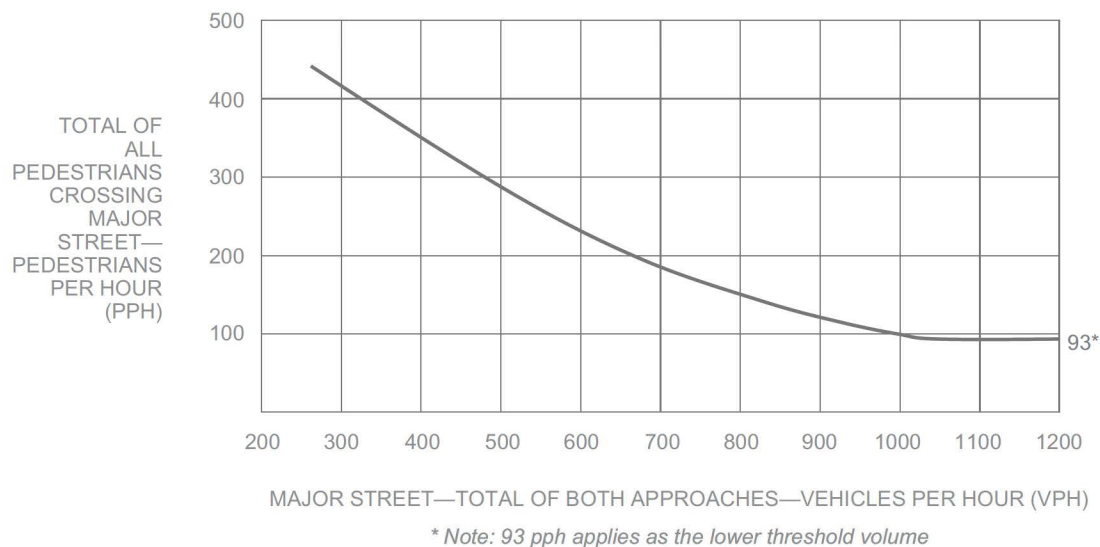
(continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

SPEED ≤ 35 MPH
Figure 4C-7. Warrant 4, Pedestrian Peak Hour



SPEED > 35 MPH
Figure 4C-8. Warrant 4, Pedestrian Peak Hour (70% Factor)



School Crossing

WARRANT
5

N/A ☐

SATISFIED YES ☐

NO ☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Part A and Part B shall be satisfied.
- b. For purposes of this warrant, schoolchildren include elementary through high school students.
- c. Estimated schoolchildren volumes may be used where a new school or expanded school has been approved for construction.
- d. The need for a traffic control signal shall be considered when an engineering study of the frequency and adequacy of gaps in the vehicular traffic stream as related to the number and size of groups of schoolchildren at an established school crossing across the major street shows that the number of adequate gaps in the traffic stream during the period when the schoolchildren are using the crossing is less than the number of minutes in the same period and there are a minimum of 20 schoolchildren during the highest crossing hour.
- e. The School Crossing signal warrant shall not be applied at locations where the distance to the nearest traffic control signal along the major street is less than 300 feet, unless the proposed traffic control signal will not restrict the progressive movement of traffic.
- f. Non-intersectional schoolchildren crosswalk locations may be signalized when justified.
- g. Pedestrian Hybrid Beacons may be considered instead of a traffic signal if a device is recommended based upon pedestrian needs

PART A

				SATISFIED	YES	NO
					☐	☒
Hour						
Gap / Minutes and # of Children				YES	NO	
Gaps vs Minutes	Minutes Children Using Crossing		Gaps < Minutes AND Children ≥ 20/hr	☐	☐	
	Number of Adequate Gaps			☐	☐	
School Age Pedestrians Crossing Street / hr						
AND , Consideration has been given to less restrictive remedial measures				☐	☐	

PART B

		SATISFIED	YES	NO
			☒	☐
		YES	NO	
The distance to the nearest traffic signal along the major street is greater than 300 ft		☒	☐	
OR , The proposed traffic signal will not restrict progressive movement of traffic		☐	☒	

Coordinated Signal System

WARRANT
6

N/A ☐

SATISFIED YES ☐

NO ☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. The Coordinated Signal System signal warrant should not be applied where the resultant spacing of traffic control signals would be less than 1,000 feet.
- b. All Parts must be satisfied.

MINIMUM REQUIREMENTS	DISTANCE TO NEAREST SIGNAL	YES	NO
≥ 1000 ft	N <u>625</u> ft, S <u>625</u> ft, E <u>625</u> ft, W <u>2900</u> ft	☐	☒
On a one-way street or a street that has traffic predominantly in one direction, the adjacent traffic control signals are so far apart that they do not provide the necessary degree of vehicular platooning.		☐	☐
OR , On a two-way street, adjacent traffic control signals do not provide the necessary degree of platooning and the proposed and adjacent traffic control signals will collectively provide a progressive operation.		☐	☐

Crash Experience Warrant



N/A	☐
SATISFIED YES	☐
NO	☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- All Parts must be satisfied.
- For locations that involve other agencies, crash data from other involved jurisdictions should be obtained.

		YES	NO
Adequate trial of alternatives with satisfactory observance and enforcement has failed to reduce the crash frequency		☐	☒
REQUIREMENTS	Number of crashes reported within a 12-month period susceptible to correction by a traffic signal:	☐	☒
5 OR MORE	Indicate Date(s): 6/21/2015, 4/3/2017, 6/4/2018		
REQUIREMENTS	CONDITIONS		
ONE CONDITION SATISFIED 80%	Warrant 1, Condition A - Minimum Vehicular Volume		
	OR, Warrant 1, Condition B - Interruption of Continuous Traffic	☐	☐
	OR, Warrant 4, Pedestrian Volume Condition - Ped Vol ≥ 80% for ped volumes per Figures 4C-5 to 4C-8		

Roadway Network



N/A	☐
SATISFIED YES	☐
NO	☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Existing traffic volumes with an ambient growth rate of 1% (or other LADOT approved ambient growth rate) may be used if projected volumes are not available.
- All Parts must be satisfied.

MINIMUM VOLUME REQUIREMENTS	ENTERING VOLUMES - ALL APPROACHES	✓	FULLFILLED	
			YES	NO
1000 Veh / Hr	During Typical Weekday Peak Hour _____ Veh/Hr AND has 5-year projected traffic volumes that meet one or more of Warrants 1,2, and 3 during an average weekday.		☐	☐
	OR During Each of Any 5 Hrs. of a Saturday or Sunday _____ Veh / Hr			
CHARACTERISTICS OF MAJOR ROUTES	MAJOR ROUTE A	MAJOR ROUTE B	YES	NO
Highway System Serving as Principal Network for Through Traffic	X			
Rural or Suburban Highway Outside Of, Entering, or Traversing a City	X			
Appears as Major Route on an Official Plan	X			
Any Major Route Characteristics Met, Both Streets			☐	☒

Intersection Near a Grade Crossing



N/A ☒

SATISFIED YES ☐

NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Both Parts A and B shall be satisfied.
- b. This Warrant shall only be applied after review and approval by the LADOT Railroad Crossing and Safety Section (RCOSS), subject to CPUC General Order approval.
- c. This Warrant does not apply for Pre-Signals and/or Queue-Cutter signals, as an alternative application of Pre-Signals (See 2012 CA MUTCD, Sec 8C.09). Pre-Signals shall only be applied after review and approval by RCOSS, subject to CPUC General Order approval.

	FULFILLED	
	YES	NO
PART A A grade crossing exists on an approach controlled by a STOP or YIELD sign and the center of the track nearest to the intersection is within 140 feet of the stop line or yield line on the approach. Track Center Line to Limit Line _____ ft	☐	☐
PART B There is one minor street approach lane at the track crossing - During the highest traffic volume hour during which rail traffic uses the crossing, the plotted point falls above the applicable curve in Figure 4C-9. Major Street - Total of both approaches: _____ VPH Minor Street - Crosses the track (one direction only, approaching the intersection): _____ VPH X AF (Use Tables 4C-2, 3, & 4 below to calculate AF) = _____ VPH	☐	☐
OR, There are two or more minor street approach lanes at the track crossing - During the highest traffic volume hour during which rail traffic uses the crossing, the plotted point falls above the applicable curve in Figure 4C-10. Major Street - Total of both approaches: _____ VPH Minor Street - Crosses the track (one direction only, approaching the intersection): _____ VPH X AF (Use Tables 4C-2, 3, & 4 below to calculate AF) = _____ VPH		

The minor street approach volume may be multiplied by up to three following adjustment factors (AF) as described in Section 4C-10.

1. Number of Rail Traffic per Day _____ Adjustment factor from Table 4C-2 _____
2. Percentage of High-Occupancy Buses on Minor Street Approach _____ Adjustment factor from Table 4C-3 _____
3. Percentage of Tractor-Trailer Trucks on Minor Street Approach _____ Adjustment factor from Table 4C-4 _____

NOTE: If no data is available or known, then use AF = 1 (no adjustment)

**Table 4C-2. Warrant 9,
Adjustment Factor for
Daily Frequency of Rail Traffic**

Rail Traffic per Day	Adjustment Factor
1	0.67
2	0.91
3 to 5	1.00
6 to 8	1.18
9 to 11	1.25
12 or more	1.33

**Table 4C-3. Warrant 9,
Adjustment Factor for
Percentage of High-Occupancy Buses**

% of High-Occupancy Buses * on Minor-Street Approach	Adjustment Factor
0 %	1.00
2 %	1.09
4 %	1.19
6 % or more	1.32

* A high-occupancy bus is defined as a bus occupied by at least 20 people

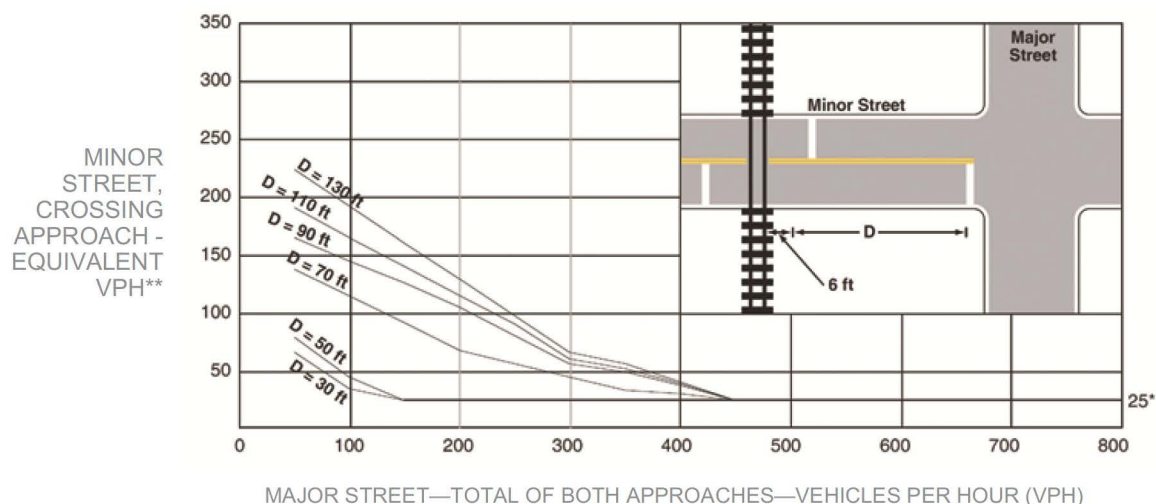
Intersection Near a Grade Crossing WARRANT 9 (continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

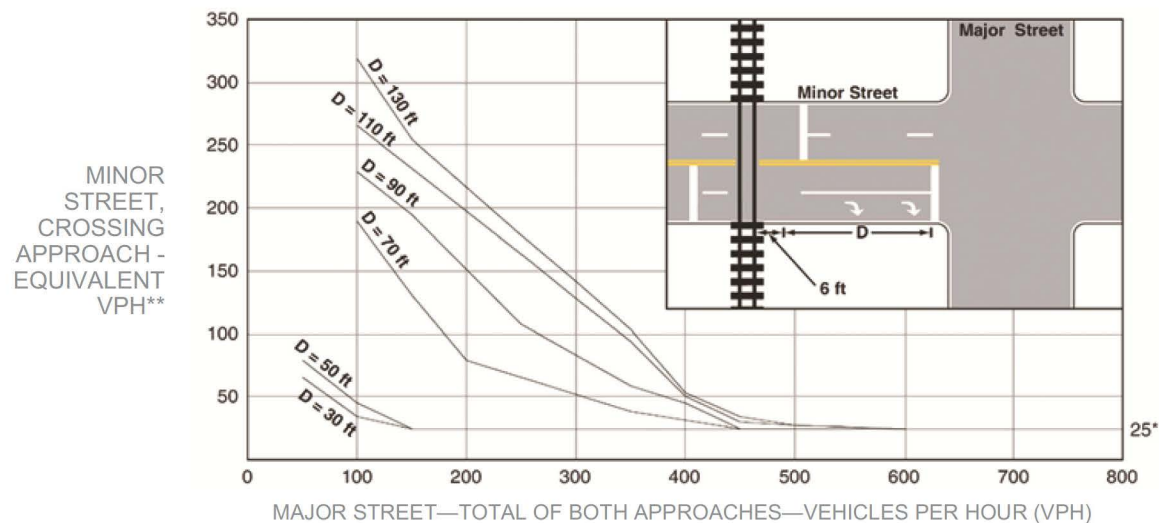
**Table 4C-4. Warrant 9,
Adjustment Factor for Percentage of Tractor-Trailer Trucks**

% of Tractor-Trailer Trucks on Minor-Street Approach	Adjustment Factor	
	D less than 70 feet	D of 70 feet or more
0% to 2.5%	0.50	0.50
2.6% to 7.5%	0.75	0.75
7.6% to 12.5%	1.00	1.00
12.6% to 17.5%	2.30	1.15
17.6% to 22.5%	2.70	1.35
22.6% to 27.5%	3.28	1.64
More than 27.5%	4.18	2.09

**Figure 4C-9. Warrant 9, Intersection Near a Grade Crossing
(One Approach Lane at the Track Crossing)**



**Figure 4C-10. Warrant 9, Intersection Near a Grade Crossing
(Two or More Approach Lanes at the Track Crossing)**



* 25 vph applies as the lower threshold volume

** VPH after applying the adjustment factors in Tables 4C-2, 4C-3, and/or 4C-4, if appropriate

The next two warrants are not included in the MUTCD (CA) standard warrants, but are added as optional warrants that an engineer may use with discretion to justify a traffic signal for special conditions where other traffic control devices could be considered, but where a traffic signal might be more appropriate

Bicycles

WARRANT
10

N/A
☒

SATISFIED

YES ☐
NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Part A and Part B shall be satisfied
- b. Per MUTCD (CA) Section 4C.01.15: "For signal warrant analysis, bicyclists may be counted as either vehicles or pedestrians."
- c. When performing a signal warrant analysis, bicyclists riding in the street with other vehicular traffic are usually counted as vehicles, and bicyclists who are clearly using pedestrian facilities are usually counted as pedestrians; however for this bicycle specific warrant, bicyclists are counted as bicyclists, regardless of where they are riding.
- d. Bicycle signal faces should be considered for use when this warrant is satisfied, with the final determination made during the signal design process. Refer to MUTCD (CA) Section 4D.104 (CA).
- e. Estimated peak hour bicycle volumes may be used for new intersections, significantly reconstructed intersections, or where new bicycle facilities or near-term land development are proposed which will result in increased bicycle volumes.

PART A and B must be satisfied

SATISFIED	YES	NO
☐	☐	☐

PART A (1 or 2 below must be satisfied)

	SATISFIED	YES	NO
1. Location meets the Department's guidelines for a marked crosswalk with Pedestrian Hybrid Beacons, where pedestrian units are replaced with bicyclists; AND the minor street is designated as part of the Neighborhood Enhanced Network in the Mobility Plan 2035 Element of the City's General Plan.	☐		☐
2. The intersection features a two-way bicycle or pedestrian path or trail within the median or alongside one of the roadways.	☐		☐

PART B (1, 2, or 3 below must be satisfied)

PART B (1, 2, or 3 below must be satisfied)		SATISFIED	YES	NO
1. Signal would be part of a corridor or area project to improve bicycle connectivity.*		☐	☐	☐
2. Signal is associated with a development project.*		☐	☐	☐
3. There have been at least 3 correctable collisions involving bicyclists in the last 1 year, 2 per year for the last 2 years, or 5 in the last 3 years of available data. Specify dates of correctable bicycle collisions:		☐	☐	☐

*The authority for a traffic signal justified using Part B.1 or B.2 shall be automatically rescinded three years after the date of approval if funding for construction of the traffic signal is not secured or project plans are not actively being reviewed for approval.

Pedestrian Activated Yellow Flashing Beacons

WARRANT
11

N/A ☒
SATISFIED YES ☐
NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. All Parts shall be satisfied.
- b. This warrant should be applied when Pedestrian Activated Yellow Flashing Beacons are recommended within 600 feet BOTH upstream and downstream of existing traffic signals.

PART A

	YES	NO
Location meets the guidelines for the installation of Pedestrian Activated Yellow Flashing Beacons as described in the LADOT Marked Crosswalk Guidelines.	☐	☐

PART B

MINIMUM REQUIREMENTS	DISTANCE TO NEAREST SIGNALS	YES	NO
≤ 600 ft	N _____ ft, S _____ ft, E _____ ft, W _____ ft	☐	☐

Traffic Signal Warrants Worksheet

SR#

DATE 1-3-22 PREPARER LF REVIEWER _____MAJOR ST: CAHUENGA BOULEVARDMINOR ST: LEXINGTON STREET

Critical Approach Speed	}	or	Speed Limit	}
Speed limit or critical speed on major street traffic > 40 mph.....	☐	} RURAL (R)	☒	URBAN (U)
In built up area of isolated community of < 10,000 population.....	☐			

SIX HOURS OF

Eight-Hour Vehicular Volume

N/A ☐SATISFIED YES ☒NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Condition A or Condition B or combination of 80% of both parts A and B must be satisfied.
- A 6-hour Manual Count may be used in a determination that this warrant is not met. However, supplement manual counts should be taken during separate hours for a determination that this warrant is met.
- In applying each condition, the major street and minor street volumes shall be for the same hours. On the minor street, the higher volume does not need to be the same approach during each of the hours.
- The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count.
- Figure 4C-103(CA) should be used for new intersections, significantly reconstructed intersections, where near-term land development will result in increased volumes, or where it is not reasonable to use current traffic volumes.
- Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. This site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles. Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher volume of the major-street left-turn volumes plus the higher volume minor-street approach as the "minor street" volume and both approaches of the major street minus the higher of the major-street left-turn volume as "major street" volume. In these cases, engineering judgment should be used to determine if left-turn phasing is necessary to accommodate the high volume of left-turn traffic.

Eight-Hour Vehicular Volume



(continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

Condition A

Minimum Vehicle Volume

SATISFIED	YES	NO
100%	☐	☒
80%	☐	☒
RIGHT TURN REDUCTION APPLICATION MINOR STREET (If Yes, fill in percentage)		☐ 100 %

APPROACH LANES	MINIMUM REQUIREMENTS (80% SHOW IN BRACKETS)				Hours						
	U	R	U	R	7AM	8AM	9AM	3PM	4PM	5PM	
Both Approach Major Street	500 (400)	350 (280)	600 (480)	420 (336)	1420	1758	1400	1546	1381	1442	
Highest Approach Minor Street	150 (120)	105 (84)	200 (160)	140 (112)	101	87	139	170	125	212	

Condition B

Interruption of Continuous Traffic

SATISFIED	YES	NO
100%	☒	☐
80%	☒	☐
RIGHT TURN REDUCTION APPLICATION MINOR STREET (If Yes, fill in percentage)		☐ 100 %

APPROACH LANES	MINIMUM REQUIREMENTS (80% SHOW IN BRACKETS)				Hours						
	U	R	U	R	7AM	8AM	9AM	3PM	4PM	5PM	
Both Approach Major Street	750 (600)	525 (420)	900 (720)	630 (504)	1420	1758	1400	1546	1381	1442	
Highest Approach Minor Street	75 (60)	53 (42)	100 (80)	70 (56)	101	87	139	170	125	212	

COMBINATION OF A & B

SATISFIED	YES	NO
	☐	☒

REQUIREMENT	CONDITION	✓	FULFILLED	
			YES	NO
TWO CONDITIONS SATISFIED 80%	A. MINIMUM VEHICULAR VOLUME		☐	☒
	AND B. INTERRUPTION OF CONTINUOUS TRAFFIC		☐	☐
AND AN ADEQUATE TRIAL OF OTHER ALTERNATIVES THAT COULD CAUSE LESS DELAY AND INCOVENIENCE TO TRAFFIC HAS FAILED TO SOLVE THE TRAFFIC PROBLEMS			☐	☐

WARRANT 1 Eight-Hour Vehicular Volume(continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

Projected Volumes

N/A
☒

SATISFIED	YES	NO
☐	☐	☐

Figure 4C-103 (CA). Traffic Signal Warrants Worksheet (Average Traffic Estimate Form)
Based on Estimated Average Daily Traffic - see *Note**

URBAN ☐	RURAL ☐	Minimum Requirements Estimated Average Daily Traffic			
CONDITION A - Minimum Vehicular Volume Satisfied ☐ Not Satisfied ☐		Vehicles Per Day On Major Street (Total of Both Approaches)		Vehicles Per Day On Higher-Volume Minor Street Approach (One Direction Only)	
Number of lanes for moving traffic on each approach		Urban	Rural	Urban	Rural
Major Street	Minor Street				
1.....	1.....	8,000	5,600	2,400	1,680
2 or More.....	1.....	9,600	6,720	2,400	1,680
2 or More.....	2 or More.....	9,600	6,720	3,200	2,240
1.....	2 or More.....	8,000	5,600	3,200	2,240
CONDITION B - Interruption of Continuous Traffic Satisfied ☐ Not Satisfied ☐		Vehicles Per Day On Major Street (Total of Both Approaches)		Vehicles Per Day On Higher-Volume Minor Street Approach (One Direction Only)	
Number of lanes for moving traffic on each approach		Urban	Rural	Urban	Rural
Minor Street	Minor Street				
1.....	1.....	12,000	8,400	1,200	850
2 or More.....	1.....	14,400	10,080	1,200	850
2 or More.....	2 or More.....	14,400	10,080	1,600	1,120
1.....	2 or More.....	12,000	8,400	1,600	1,120
Combination of CONDITIONS A + B Satisfied ☐ Not Satisfied ☐ <u>No one condition satisfied</u> , but following conditions fulfilled 80% or more..... <u> </u> <u> </u> A B		2 CONDITIONS 80%		2 CONDITIONS 80%	

* **Note:** To be used only for NEW INTERSECTIONS or other locations where it is not reasonable to count actual traffic volumes

Four-Hour Vehicular Volume

WARRANT

2

N/A ☐
YES ☒

NO ☐

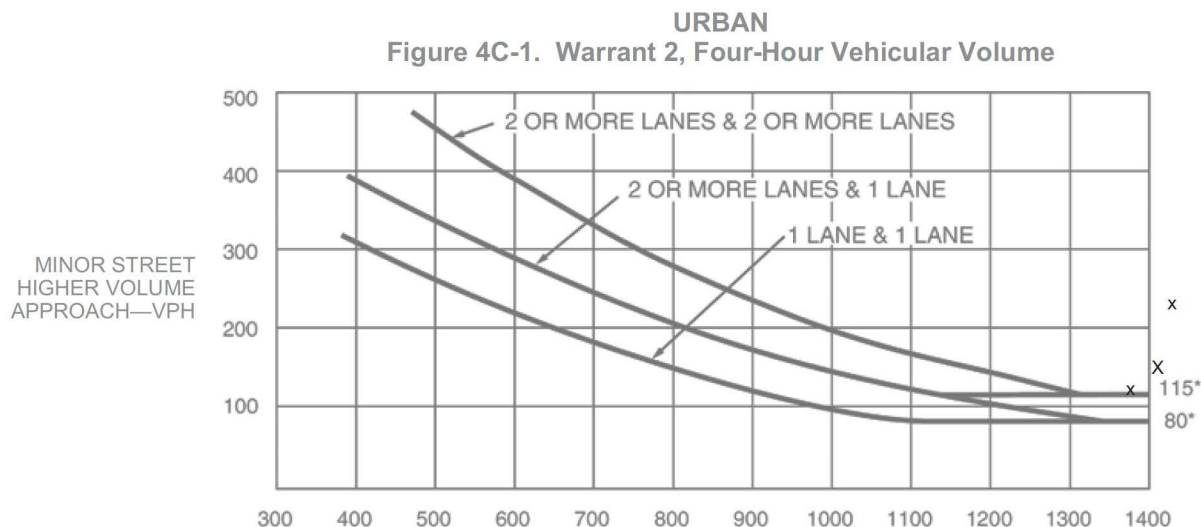
★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Record hourly vehicle volumes for the highest four hours of an average day.
- b. In applying each condition, the major street and minor street volumes shall be for the same hours. On the minor street, the higher volume does not need to be the same approach during each of the hours.
- c. The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count.
- d. Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. This site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles. Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- e. At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher volume of the major-street left-turn volumes plus the higher volume minor-street approach as the "minor street" volume and both approaches of the major street minus the higher of the major-street left-turn volume as "major street" volume. In these cases, engineering judgment should be used to determine if left-turn phasing is necessary to accommodate the high volume of left-turn traffic.

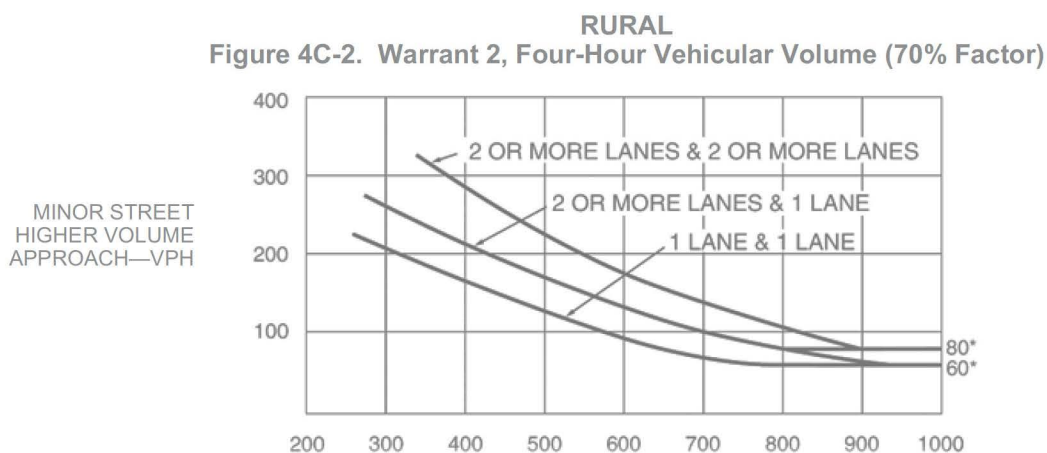
APPROACH LANES			Hours						
	One	2 or More	10am	4pm	5pm	6pm		YES	NO
Both Approaches - Major Street		✓	1401	1541	1376	1437	RIGHT TURN REDUCTION APPLICATION MINOR STREET <i>(If Yes, fill in percentage)</i>	☒	☐
Higher Approach - Minor Street	✓		139	170	125	212		100 %	
* All plotted points fall above the applicable curve in Figure 4C-1. (URBAN AREAS)								☒	☐
OR, All plotted points fall above the applicable curve in Figure 4C-2. (RURAL AREAS)								☐	☐

Four-Hour Vehicular Volume **WARRANT 2** (continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★



*Note: 115 vph applies as the lower threshold volume for a minor-street approach with two or more lanes and 80 vph applies as the lower threshold volume for a minor-street approach with one lane.



*Note: 80 vph applies as the lower threshold volume for a minor-street approach with two or more lanes and 60 vph applies as the lower threshold volume for a minor-street approach with one lane.

Peak Hour

WARRANT
3

N/A

☒

SATISFIED

YES

☐

NO

☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Part A or Part B must be satisfied.
- b. This signal warrant shall be applied only in unusual cases, such as office complexes, manufacturing plants, industrial complexes, or high-occupancy vehicle facilities that attract or discharge large numbers of vehicles over a short time.
- c. In applying each condition, the major street and minor street volumes shall be for the same hours.
- d. The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count.
- e. Estimated Peak Hour Volumes may be used for new intersections, significantly reconstructed intersections, or where near-term land development will result in increased volumes.
- f. Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. This site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles. Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- g. At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher volume of the major-street left-turn volumes plus the higher volume minor-street approach as the "minor street" volume and both approaches of the major street minus the higher of the major-street left-turn volume as "major street" volume. In these cases, engineering judgment should be used to determine if left-turn phasing is necessary to accommodate the high volume of left-turn traffic.

Unusual facility per Note b.

YES ☐

NO ☐

Name _____

PART A

All parts 1, 2, and 3 below must be satisfied for the same one hour, for any four consecutive 15-minute periods)

	YES	NO	N/A
1. The total delay experienced by traffic on one minor street approach (one direction only) controlled by a STOP sign equals or exceeds four vehicle-hours for a one-lane approach, or five vehicle-hours for a two-lane approach; <u>AND</u>	☐	☐	☐
2. The volume on the same minor street approach (one direction only) equals or exceeds 100 vph for one moving lane of traffic or 150 vph for two moving lanes; <u>AND</u>	☐	☐	☐
3. The total entering volume serviced during the hour equals or exceeds 800 vph for intersections with four or more approaches or 650 vph for intersections with three approaches.	☐	☐	☐

PART B

APPROACH LANES	One	2 or More	Hour
Both Approaches - Major Street		✓	
Higher Approach - Minor Street	✓		0

SATISFIED

YES ☐

NO ☐

RIGHT TURN REDUCTION APPLICATION MINOR STREET

(If Yes, fill in percentage)

YES ☐

NO ☐

The plotted point falls above the applicable curve in Figure 4C-3. (URBAN AREAS)

OR, The plotted point falls above the applicable curve in Figure 4C-4. (RURAL AREAS)

SATISFIED

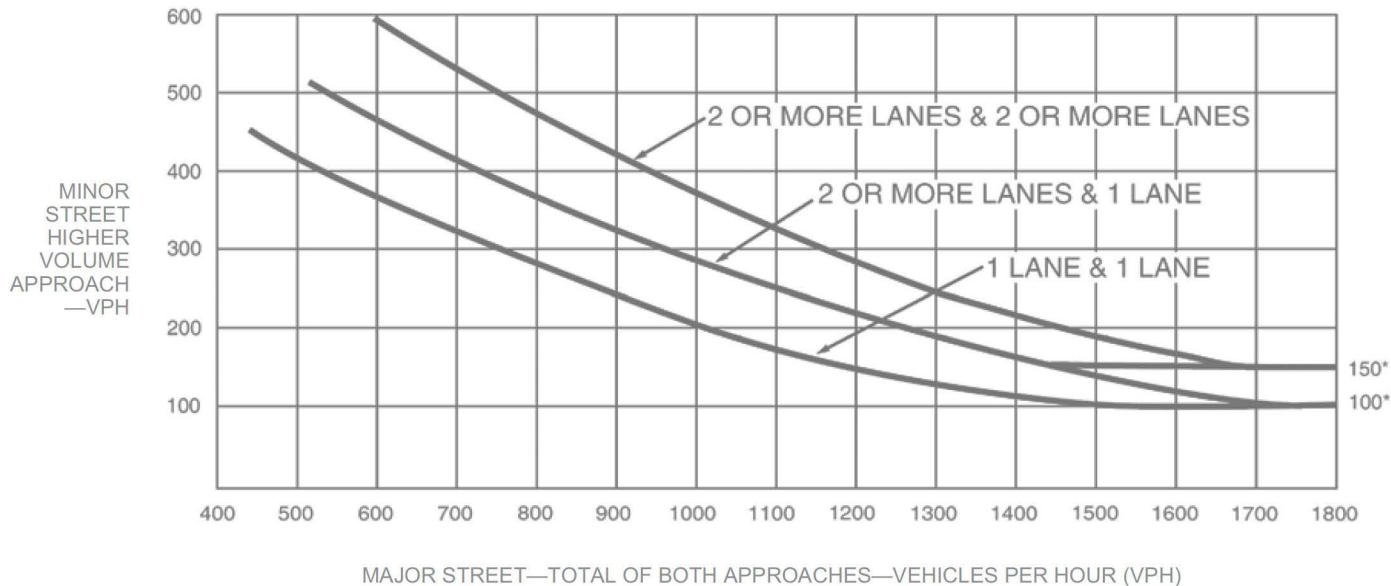
YES ☐

NO ☐

Peak Hour **WARRANT 3** (continued)

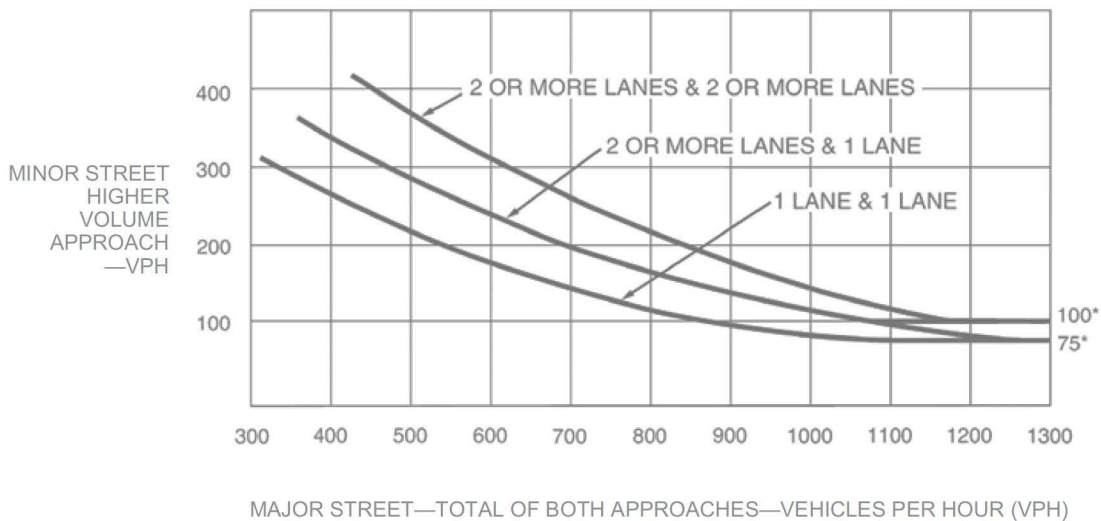
★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

URBAN
Figure 4C-3. Warrant 3, Peak Hour



* Note: 150 vph applies as the lower threshold volume for a minor street approach with two or more lanes and 100 vph applies as the lower threshold volume for a minor street approach with one lane.

RURAL
Figure 4C-4. Warrant 3, Peak Hour (70% Factor)
(COMMUNITY LESS THAN 10,000 POPULATION OR ABOVE 40 MPH ON MAJOR STREET)



* Note: 100 vph applies as the lower threshold volume for a minor street approach with two or more lanes and 75 vph applies as the lower threshold volume for a minor street approach with one lane.

Pedestrian Volume



N/A ☐

SATISFIED YES ☐

NO ☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Parts 1 and 2 shall be satisfied.
- The pedestrian volume criterion may be reduced by as much as 50% if the 15th percentile speed of the pedestrians is less than 3.5 feet/second.
- Estimated pedestrian volumes may be used where nearby, near-term land use development has been approved for construction.
- In applying each condition, the total vehicles per hour on the major street (on both approaches) and the total pedestrians per hour crossing the major street shall be for the same hours.
- The Pedestrian Volume signal warrants shall not be applied at locations where the distance to the nearest traffic control signal or STOP sign controlling the street that pedestrians desire to cross is less than 300 feet, unless the proposed traffic control signal will not restrict the progressive movement of traffic.
- Traffic control signal may not be needed at the study location if adjacent coordinated traffic control signals consistently provide gaps of adequate length for pedestrians to cross the street.
- If it is considered at a non-intersection crossing, the traffic control signal should be installed at least 100 feet from side streets or driveways that are controlled by STOP or YIELD signs. If the traffic control signal is installed at a non-intersection crossing, at least one of the signal faces should be over the traveled way for each approach, parking and other sight obstructions should be prohibited for at least 100 feet in advance of and at least 20 feet beyond the crosswalk or site accommodations should be made through curb extensions or other techniques to provide adequate sight distance, and the installation should include suitable standard signs and pavement markings.
- Bicycles may be counted as pedestrians.
- Pedestrian Hybrid Beacons may be considered instead of a traffic signal if a device is recommended based upon pedestrian needs

PART 1 (A or B must be satisfied)

SATISFIED YES NO
☐ ☒

A. FOUR-HOUR PEDESTRIAN VOLUMES	Hours			
	9am	10am	5pm	6pm
Vehicles per hour on major street for 4 hours	1758	1400	1381	1442
Pedestrians crossing major street per hour for highest 4 hours	30	26	29	26

(FIGURE 4C-5 OR 4C-6 SATISFIED)

SATISFIED	YES	NO
100%	☐	☒
80%	☐	☒
50%	☐	☒

15% WALKING RATE _____ fps

B. ONE HOUR PEDESTRIAN VOLUMES	Hour
	5pm
Vehicles per hour on major street for 1 hour	1381
Pedestrians crossing major street per hour for highest 1 hour	29

(FIGURE 4C-7 or 4C-8 SATISFIED)

SATISFIED	YES	NO
100%	☐	☒
80%	☐	☒
50%	☐	☒

15% WALKING RATE _____ fps

PART 2

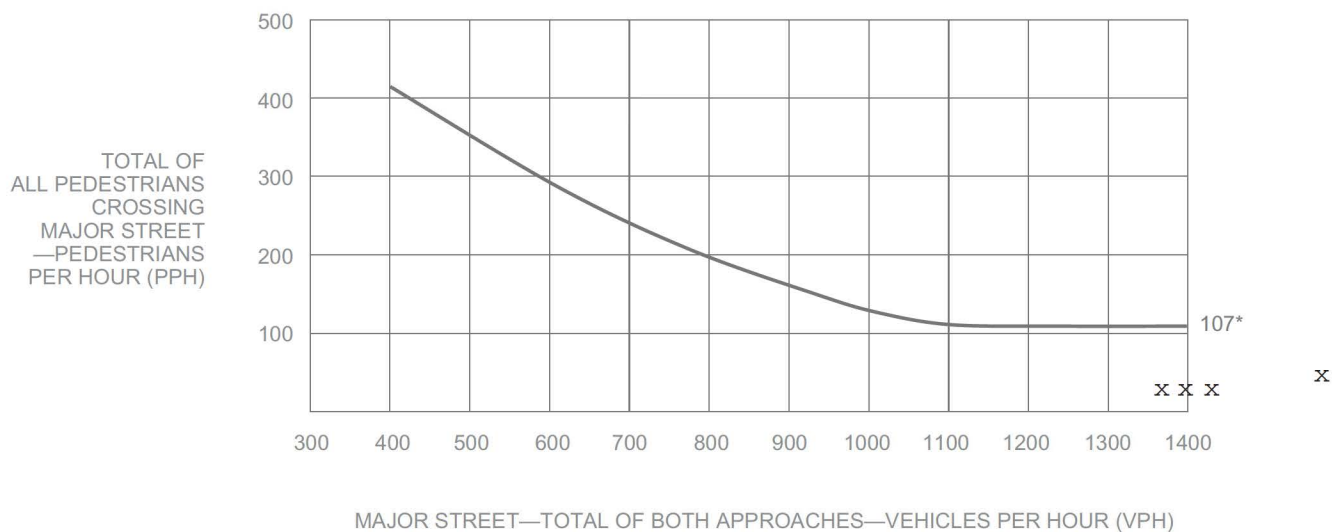
SATISFIED YES NO
☐ ☒

	YES	NO
<u>AND</u> , The distance to the nearest traffic signal along the major street is greater than 300 ft	☐	☐
<u>OR</u> , The proposed traffic signal will not restrict progressive traffic flow along the major street	☐	☒

WARRANT 4 **Pedestrian Volume** (continued)

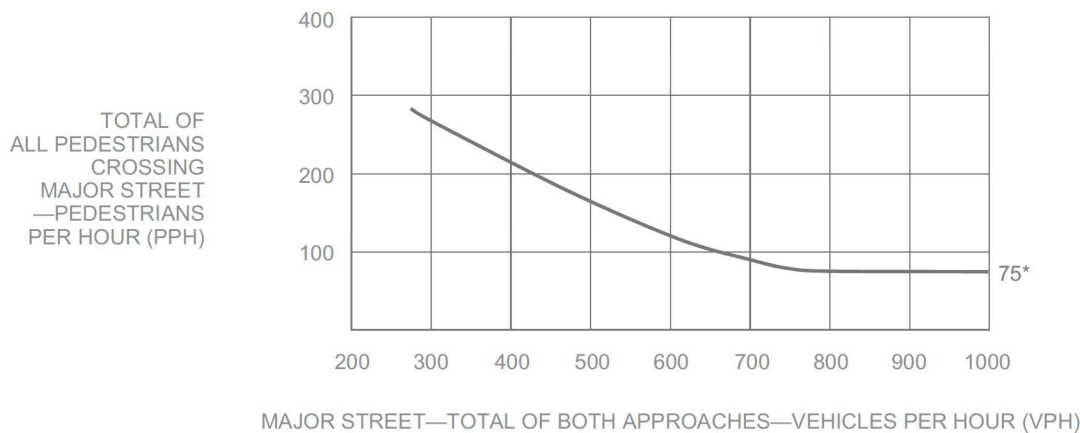
★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

SPEED ≤ 35 MPH
Figure 4C-5. Warrant 4, Pedestrian Four-Hour Volume



* Note: 107 pph applies as the lower threshold volume

SPEED > 35 MPH
Figure 4C-6. Warrant 4, Pedestrian Four-Hour Volume (70% Factor)



* Note: 75 pph applies as the lower threshold volume

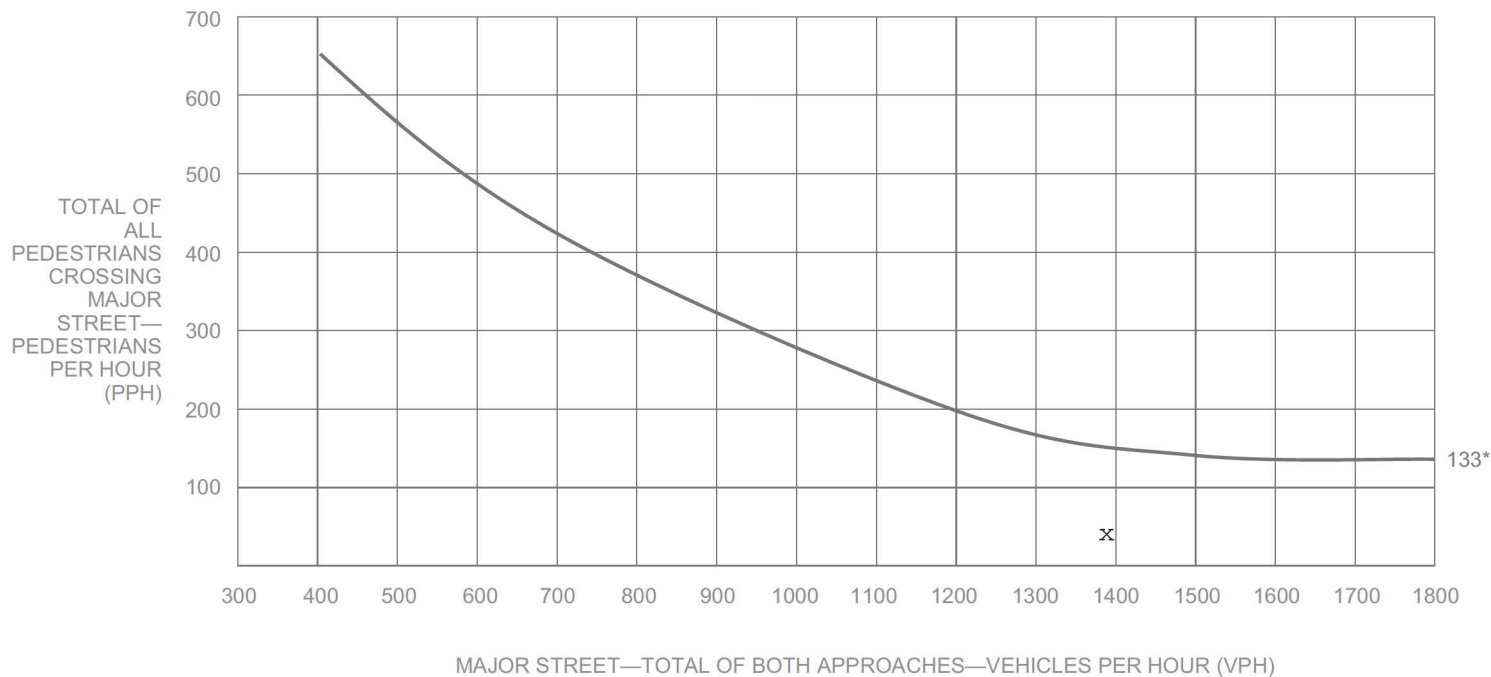
Pedestrian Volume

WARRANT
4

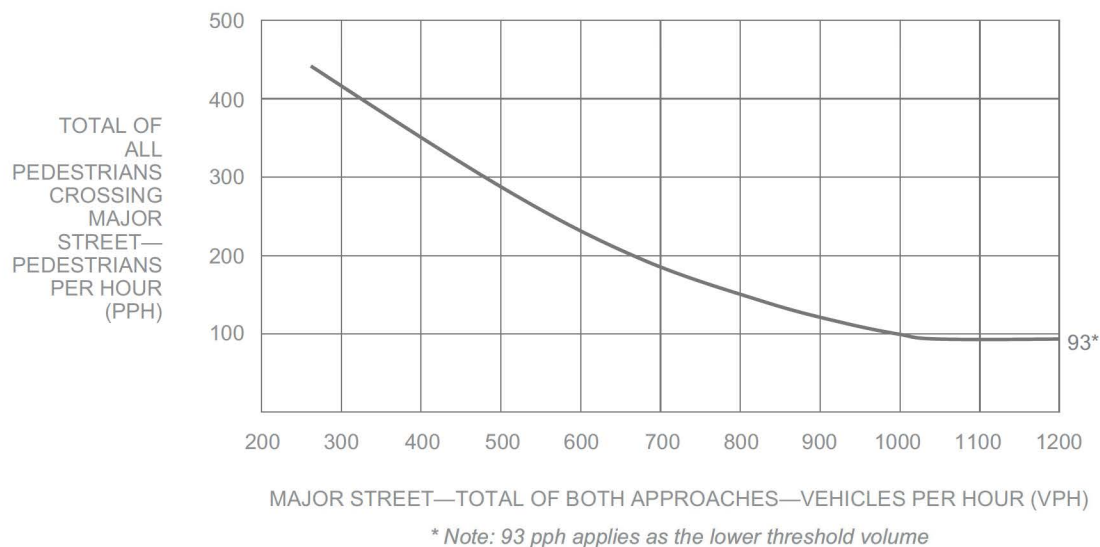
(continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

SPEED ≤ 35 MPH
Figure 4C-7. Warrant 4, Pedestrian Peak Hour



SPEED > 35 MPH
Figure 4C-8. Warrant 4, Pedestrian Peak Hour (70% Factor)



School Crossing

WARRANT

5

N/A ☐

SATISFIED YES ☐

NO ☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Part A and Part B shall be satisfied.
- b. For purposes of this warrant, schoolchildren include elementary through high school students.
- c. Estimated schoolchildren volumes may be used where a new school or expanded school has been approved for construction.
- d. The need for a traffic control signal shall be considered when an engineering study of the frequency and adequacy of gaps in the vehicular traffic stream as related to the number and size of groups of schoolchildren at an established school crossing across the major street shows that the number of adequate gaps in the traffic stream during the period when the schoolchildren are using the crossing is less than the number of minutes in the same period and there are a minimum of 20 schoolchildren during the highest crossing hour.
- e. The School Crossing signal warrant shall not be applied at locations where the distance to the nearest traffic control signal along the major street is less than 300 feet, unless the proposed traffic control signal will not restrict the progressive movement of traffic.
- f. Non-intersectional schoolchildren crosswalk locations may be signalized when justified.
- g. Pedestrian Hybrid Beacons may be considered instead of a traffic signal if a device is recommended based upon pedestrian needs

PART A

				SATISFIED		YES	NO
						☐	☒
Hour							
Gap / Minutes and # of Children							
Gaps vs Minutes	Minutes Children Using Crossing			YES	NO		
	Number of Adequate Gaps			☐	☐		
School Age Pedestrians Crossing Street / hr							
0							
AND, Consideration has been given to less restrictive remedial measures						☐	☐

PART B

		SATISFIED		YES	NO
				☒	☐
		YES	NO		
The distance to the nearest traffic signal along the major street is greater than 300 ft		☒	☐		
OR, The proposed traffic signal will not restrict progressive movement of traffic		☐	☒		

Coordinated Signal System

WARRANT

6

N/A ☐

SATISFIED YES ☐

NO ☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. The Coordinated Signal System signal warrant should not be applied where the resultant spacing of traffic control signals would be less than 1,000 feet.
- b. All Parts must be satisfied.

MINIMUM REQUIREMENTS	DISTANCE TO NEAREST SIGNAL	YES	NO
≥ 1000 ft	N <u>625</u> ft, S <u>625</u> ft, E <u>625</u> ft, W <u>2900</u> ft	☐	☒
On a one-way street or a street that has traffic predominantly in one direction, the adjacent traffic control signals are so far apart that they do not provide the necessary degree of vehicular platooning.		☐	☐
OR, On a two-way street, adjacent traffic control signals do not provide the necessary degree of platooning and the proposed and adjacent traffic control signals will collectively provide a progressive operation.		☐	☐

Crash Experience Warrant



N/A ☐

SATISFIED YES ☐

NO ☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- All Parts must be satisfied.
- For locations that involve other agencies, crash data from other involved jurisdictions should be obtained.

		YES	NO
Adequate trial of alternatives with satisfactory observance and enforcement has failed to reduce the crash frequency		☐	☒
REQUIREMENTS	Number of crashes reported within a 12-month period susceptible to correction by a traffic signal:	☐	☒
5 OR MORE	Indicate Date(s): 6/21/2015, 4/3/2017, 6/4/2018		
REQUIREMENTS	CONDITIONS		
ONE CONDITION SATISFIED 80%	Warrant 1, Condition A - Minimum Vehicular Volume		
	OR, Warrant 1, Condition B - Interruption of Continuous Traffic	☐	☐
	OR, Warrant 4, Pedestrian Volume Condition - Ped Vol ≥ 80% for ped volumes per Figures 4C-5 to 4C-8		

Roadway Network



N/A ☐

SATISFIED YES ☐

NO ☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Existing traffic volumes with an ambient growth rate of 1% (or other LADOT approved ambient growth rate) may be used if projected volumes are not available.
- All Parts must be satisfied.

MINIMUM VOLUME REQUIREMENTS	ENTERING VOLUMES - ALL APPROACHES	✓	FULLFILLED	
			YES	NO
1000 Veh / Hr	During Typical Weekday Peak Hour _____ Veh/Hr AND has 5-year projected traffic volumes that meet one or more of Warrants 1,2, and 3 during an average weekday.		☐	☐
	OR During Each of Any 5 Hrs. of a Saturday or Sunday _____ Veh / Hr			
CHARACTERISTICS OF MAJOR ROUTES				
Highway System Serving as Principal Network for Through Traffic	MAJOR ROUTE A	MAJOR ROUTE B		
Rural or Suburban Highway Outside Of, Entering, or Traversing a City	X			
Appears as Major Route on an Official Plan	X		YES	NO
Any Major Route Characteristics Met, Both Streets			☐	☒

Intersection Near a Grade Crossing



N/A ☒

SATISFIED YES ☐

NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Both Parts A and B shall be satisfied.
- b. This Warrant shall only be applied after review and approval by the LADOT Railroad Crossing and Safety Section (RCOSS), subject to CPUC General Order approval.
- c. This Warrant does not apply for Pre-Signals and/or Queue-Cutter signals, as an alternative application of Pre-Signals (See 2012 CA MUTCD, Sec 8C.09). Pre-Signals shall only be applied after review and approval by RCOSS, subject to CPUC General Order approval.

	FULFILLED	
	YES	NO
PART A A grade crossing exists on an approach controlled by a STOP or YIELD sign and the center of the track nearest to the intersection is within 140 feet of the stop line or yield line on the approach. Track Center Line to Limit Line _____ ft	☐	☐
PART B There is one minor street approach lane at the track crossing - During the highest traffic volume hour during which rail traffic uses the crossing, the plotted point falls above the applicable curve in Figure 4C-9. Major Street - Total of both approaches: _____ VPH Minor Street - Crosses the track (one direction only, approaching the intersection): _____ VPH X AF (Use Tables 4C-2, 3, & 4 below to calculate AF) = _____ VPH	☐	☐
OR, There are two or more minor street approach lanes at the track crossing - During the highest traffic volume hour during which rail traffic uses the crossing, the plotted point falls above the applicable curve in Figure 4C-10. Major Street - Total of both approaches: _____ VPH Minor Street - Crosses the track (one direction only, approaching the intersection): _____ VPH X AF (Use Tables 4C-2, 3, & 4 below to calculate AF) = _____ VPH		

The minor street approach volume may be multiplied by up to three following adjustment factors (AF) as described in Section 4C-10.

1. Number of Rail Traffic per Day _____ Adjustment factor from Table 4C-2 _____
2. Percentage of High-Occupancy Buses on Minor Street Approach _____ Adjustment factor from Table 4C-3 _____
3. Percentage of Tractor-Trailer Trucks on Minor Street Approach _____ Adjustment factor from Table 4C-4 _____

NOTE: If no data is available or known, then use AF = 1 (no adjustment)

**Table 4C-2. Warrant 9,
Adjustment Factor for
Daily Frequency of Rail Traffic**

Rail Traffic per Day	Adjustment Factor
1	0.67
2	0.91
3 to 5	1.00
6 to 8	1.18
9 to 11	1.25
12 or more	1.33

**Table 4C-3. Warrant 9,
Adjustment Factor for
Percentage of High-Occupancy Buses**

% of High-Occupancy Buses * on Minor-Street Approach	Adjustment Factor
0 %	1.00
2 %	1.09
4 %	1.19
6 % or more	1.32

* A high-occupancy bus is defined as a bus occupied by at least 20 people

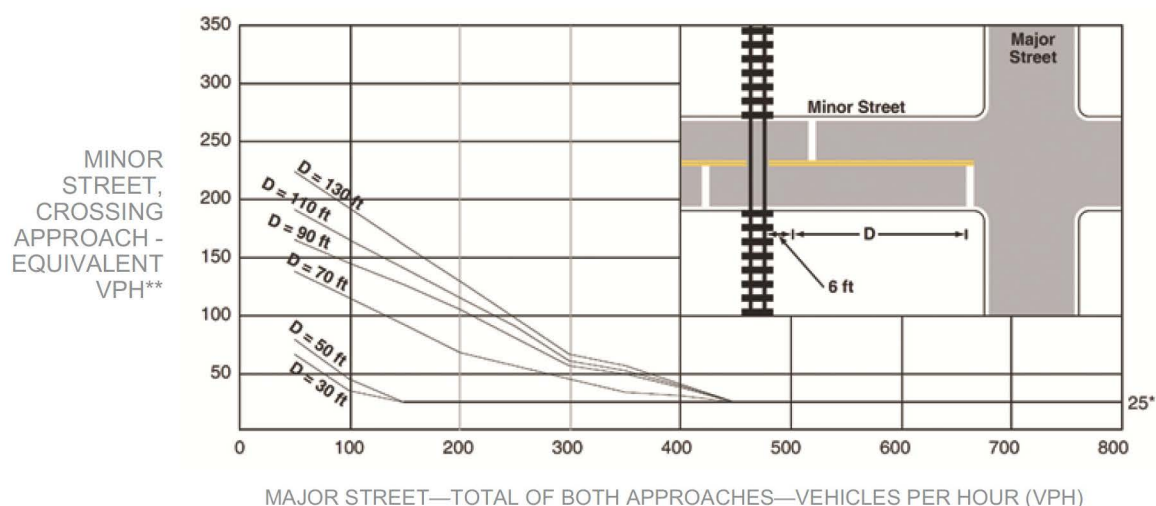
Intersection Near a Grade Crossing WARRANT 9 (continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

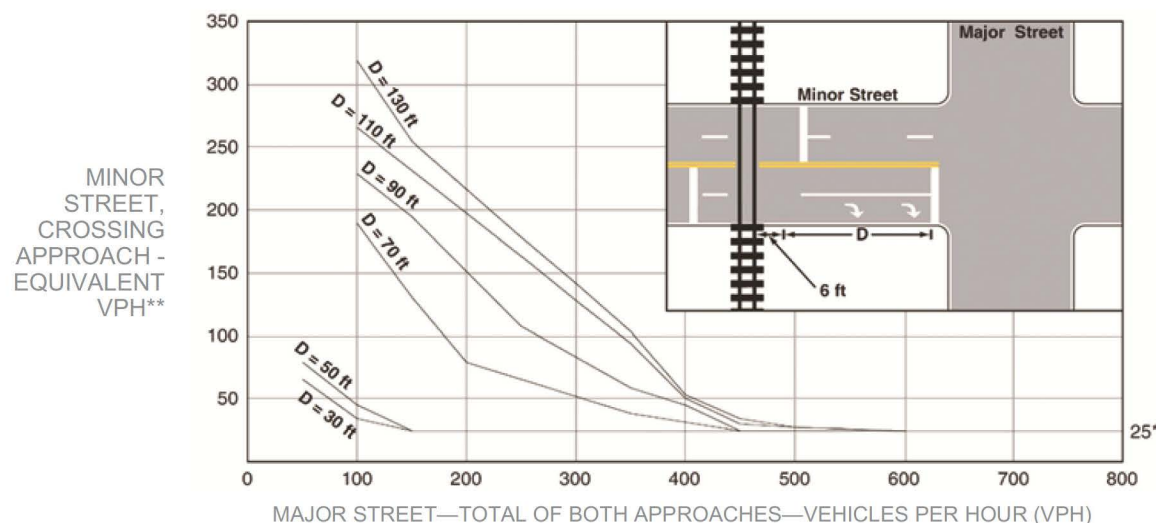
**Table 4C-4. Warrant 9,
Adjustment Factor for Percentage of Tractor-Trailer Trucks**

% of Tractor-Trailer Trucks on Minor-Street Approach	Adjustment Factor	
	D less than 70 feet	D of 70 feet or more
0% to 2.5%	0.50	0.50
2.6% to 7.5%	0.75	0.75
7.6% to 12.5%	1.00	1.00
12.6% to 17.5%	2.30	1.15
17.6% to 22.5%	2.70	1.35
22.6% to 27.5%	3.28	1.64
More than 27.5%	4.18	2.09

**Figure 4C-9. Warrant 9, Intersection Near a Grade Crossing
(One Approach Lane at the Track Crossing)**



**Figure 4C-10. Warrant 9, Intersection Near a Grade Crossing
(Two or More Approach Lanes at the Track Crossing)**



* 25 vph applies as the lower threshold volume

** VPH after applying the adjustment factors in Tables 4C-2, 4C-3, and/or 4C-4, if appropriate

The next two warrants are not included in the MUTCD (CA) standard warrants, but are added as optional warrants that an engineer may use with discretion to justify a traffic signal for special conditions where other traffic control devices could be considered, but where a traffic signal might be more appropriate

Bicycles

WARRANT
10

N/A
☒

SATISFIED

YES ☐
NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Part A and Part B shall be satisfied
- b. Per MUTCD (CA) Section 4C.01.15: "For signal warrant analysis, bicyclists may be counted as either vehicles or pedestrians."
- c. When performing a signal warrant analysis, bicyclists riding in the street with other vehicular traffic are usually counted as vehicles, and bicyclists who are clearly using pedestrian facilities are usually counted as pedestrians; however for this bicycle specific warrant, bicyclists are counted as bicyclists, regardless of where they are riding.
- d. Bicycle signal faces should be considered for use when this warrant is satisfied, with the final determination made during the signal design process. Refer to MUTCD (CA) Section 4D.104 (CA).
- e. Estimated peak hour bicycle volumes may be used for new intersections, significantly reconstructed intersections, or where new bicycle facilities or near-term land development are proposed which will result in increased bicycle volumes.

PART A and B must be satisfied

SATISFIED	YES	NO
☐	☐	☐

PART A (1 or 2 below must be satisfied)

	SATISFIED	YES	NO
1. Location meets the Department's guidelines for a marked crosswalk with Pedestrian Hybrid Beacons, where pedestrian units are replaced with bicyclists; AND the minor street is designated as part of the Neighborhood Enhanced Network in the Mobility Plan 2035 Element of the City's General Plan.	☐		☐
2. The intersection features a two-way bicycle or pedestrian path or trail within the median or alongside one of the roadways.	☐		☐

PART B (1, 2, or 3 below must be satisfied)

PART B (1, 2, or 3 below must be satisfied)		SATISFIED	YES	NO
1. Signal would be part of a corridor or area project to improve bicycle connectivity.*		☐	☐	☐
2. Signal is associated with a development project.*		☐	☐	☐
3. There have been at least 3 correctable collisions involving bicyclists in the last 1 year, 2 per year for the last 2 years, or 5 in the last 3 years of available data. Specify dates of correctable bicycle collisions:		☐	☐	☐
</				

*The authority for a traffic signal justified using Part B.1 or B.2 shall be automatically rescinded three years after the date of approval if funding for construction of the traffic signal is not secured or project plans are not actively being reviewed for approval.

Pedestrian Activated Yellow Flashing Beacons



N/A ☒

SATISFIED YES ☐
 NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. All Parts shall be satisfied.
- b. This warrant should be applied when Pedestrian Activated Yellow Flashing Beacons are recommended within 600 feet BOTH upstream and downstream of existing traffic signals.

PART A

	YES	NO
Location meets the guidelines for the installation of Pedestrian Activated Yellow Flashing Beacons as described in the LADOT Marked Crosswalk Guidelines.	☐	☐

PART B

MINIMUM REQUIREMENTS	DISTANCE TO NEAREST SIGNALS	YES	NO
≤ 600 ft	N _____ ft, S _____ ft, E _____ ft, W _____ ft	☐	☐

Traffic Signal Warrants Worksheet

SR#

DATE 1-3-22 PREPARER LF REVIEWER _____MAJOR ST: CAHUENGA BOULEVARDMINOR ST: LEXINGTON STREET

Critical Approach Speed	}	or	Speed Limit	}
Speed limit or critical speed on major street traffic > 40 mph.....	☐	} RURAL (R)	☒	URBAN (U)
In built up area of isolated community of < 10,000 population.....	☐			

SIX HOURS OF

Eight-Hour Vehicular Volume

N/A ☐SATISFIED YES ☒NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Condition A or Condition B or combination of 80% of both parts A and B must be satisfied.
- A 6-hour Manual Count may be used in a determination that this warrant is not met. However, supplement manual counts should be taken during separate hours for a determination that this warrant is met.
- In applying each condition, the major street and minor street volumes shall be for the same hours. On the minor street, the higher volume does not need to be the same approach during each of the hours.
- The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count.
- Figure 4C-103(CA) should be used for new intersections, significantly reconstructed intersections, where near-term land development will result in increased volumes, or where it is not reasonable to use current traffic volumes.
- Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. This site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles. Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher volume of the major-street left-turn volumes plus the higher volume minor-street approach as the "minor street" volume and both approaches of the major street minus the higher of the major-street left-turn volume as "major street" volume. In these cases, engineering judgment should be used to determine if left-turn phasing is necessary to accommodate the high volume of left-turn traffic.

Eight-Hour Vehicular Volume



(continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

Condition A

Minimum Vehicle Volume

SATISFIED	YES	NO
100%	☐	☒
80%	☐	☒
RIGHT TURN REDUCTION APPLICATION MINOR STREET (If Yes, fill in percentage)		☐ 100 %

APPROACH LANES	MINIMUM REQUIREMENTS (80% SHOW IN BRACKETS)				Hours						
	U	R	U	R	7AM	8AM	9AM	3PM	4PM	5PM	
Both Approach Major Street	500 (400)	350 (280)	600 (480)	420 (336)	1468	1817	1447	1592	1421	1484	
Highest Approach Minor Street	150 (120)	105 (84)	200 (160)	140 (112)	114	100	154	176	126	219	

Condition B

Interruption of Continuous Traffic

SATISFIED	YES	NO
100%	☒	☐
80%	☒	☐
RIGHT TURN REDUCTION APPLICATION MINOR STREET (If Yes, fill in percentage)		☐ 100 %

APPROACH LANES	MINIMUM REQUIREMENTS (80% SHOW IN BRACKETS)				Hours						
	U	R	U	R	7AM	8AM	9AM	3PM	4PM	5PM	
Both Approach Major Street	750 (600)	525 (420)	900 (720)	630 (504)	1468	1817	1447	1592	1421	1484	
Highest Approach Minor Street	75 (60)	53 (42)	100 (80)	70 (56)	114	100	154	176	126	219	

COMBINATION OF A & B

SATISFIED	YES	NO
	☐	☒

REQUIREMENT	CONDITION	✓	FULFILLED	
			YES	NO
TWO CONDITIONS SATISFIED 80%	A. MINIMUM VEHICULAR VOLUME		☐	☒
	AND B. INTERRUPTION OF CONTINUOUS TRAFFIC		☐	☐
AND AN ADEQUATE TRIAL OF OTHER ALTERNATIVES THAT COULD CAUSE LESS DELAY AND INCOVENIENCE TO TRAFFIC HAS FAILED TO SOLVE THE TRAFFIC PROBLEMS			☐	☐

Eight-Hour Vehicular Volume

WARRANT
1

(continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

Projected Volumes

N/A

☒

SATISFIED

YES

NO

☐

☐

Figure 4C-103 (CA). Traffic Signal Warrants Worksheet (Average Traffic Estimate Form)
Based on Estimated Average Daily Traffic - see *Note**

URBAN ☐		RURAL ☐		Minimum Requirements Estimated Average Daily Traffic			
CONDITION A - Minimum Vehicular Volume Satisfied ☐ Not Satisfied ☐				Vehicles Per Day On Major Street (Total of Both Approaches)		Vehicles Per Day On Higher-Volume Minor Street Approach (One Direction Only)	
Number of lanes for moving traffic on each approach				Urban	Rural	Urban	Rural
Major Street	Minor Street	Major Street	Minor Street				
1.....	1.....	1.....	1.....	8,000	5,600	2,400	1,680
2 or More.....	2 or More.....	2 or More.....	2 or More.....	9,600	6,720	2,400	1,680
2 or More.....	2 or More.....	2 or More.....	2 or More.....	9,600	6,720	3,200	2,240
1.....	2 or More.....	2 or More.....	2 or More.....	8,000	5,600	3,200	2,240
CONDITION B - Interruption of Continuous Traffic Satisfied ☐ Not Satisfied ☐				Vehicles Per Day On Major Street (Total of Both Approaches)		Vehicles Per Day On Higher-Volume Minor Street Approach (One Direction Only)	
Number of lanes for moving traffic on each approach				Urban	Rural	Urban	Rural
Minor Street	Minor Street	Minor Street	Minor Street				
1.....	1.....	1.....	1.....	12,000	8,400	1,200	850
2 or More.....	2 or More.....	2 or More.....	2 or More.....	14,400	10,080	1,200	850
2 or More.....	2 or More.....	2 or More.....	2 or More.....	14,400	10,080	1,600	1,120
1.....	2 or More.....	2 or More.....	2 or More.....	12,000	8,400	1,600	1,120
Combination of CONDITIONS A + B Satisfied ☐ Not Satisfied ☐ <u>No one condition satisfied</u> , but following conditions fulfilled 80% or more..... A B				2 CONDITIONS 80%		2 CONDITIONS 80%	

* **Note:** To be used only for NEW INTERSECTIONS or other locations where it is not reasonable to count actual traffic volumes

Four-Hour Vehicular Volume



N/A ☐

SATISFIED YES ☒

NO ☐

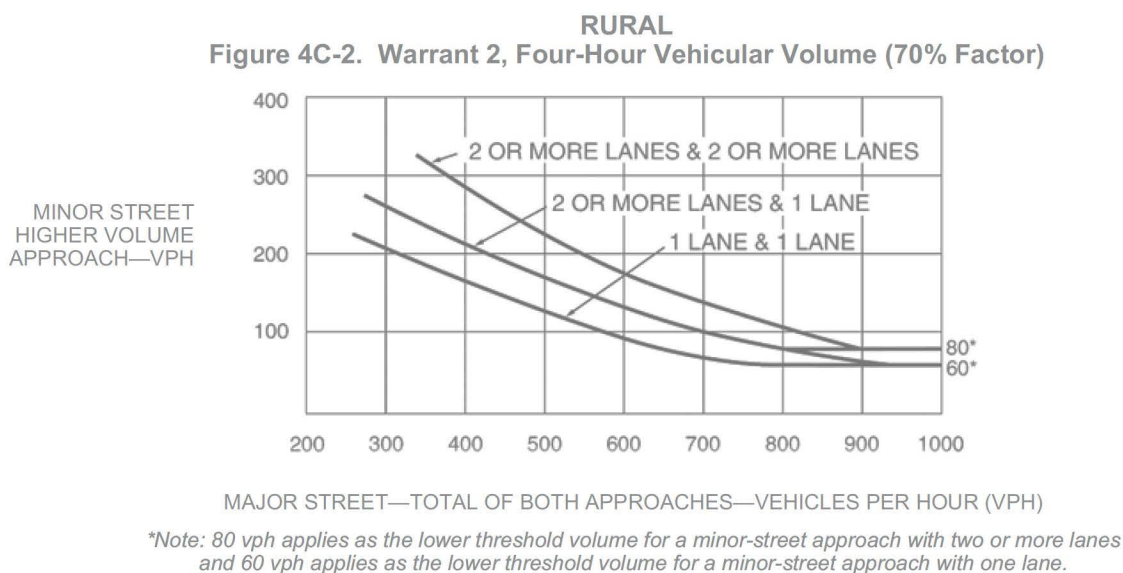
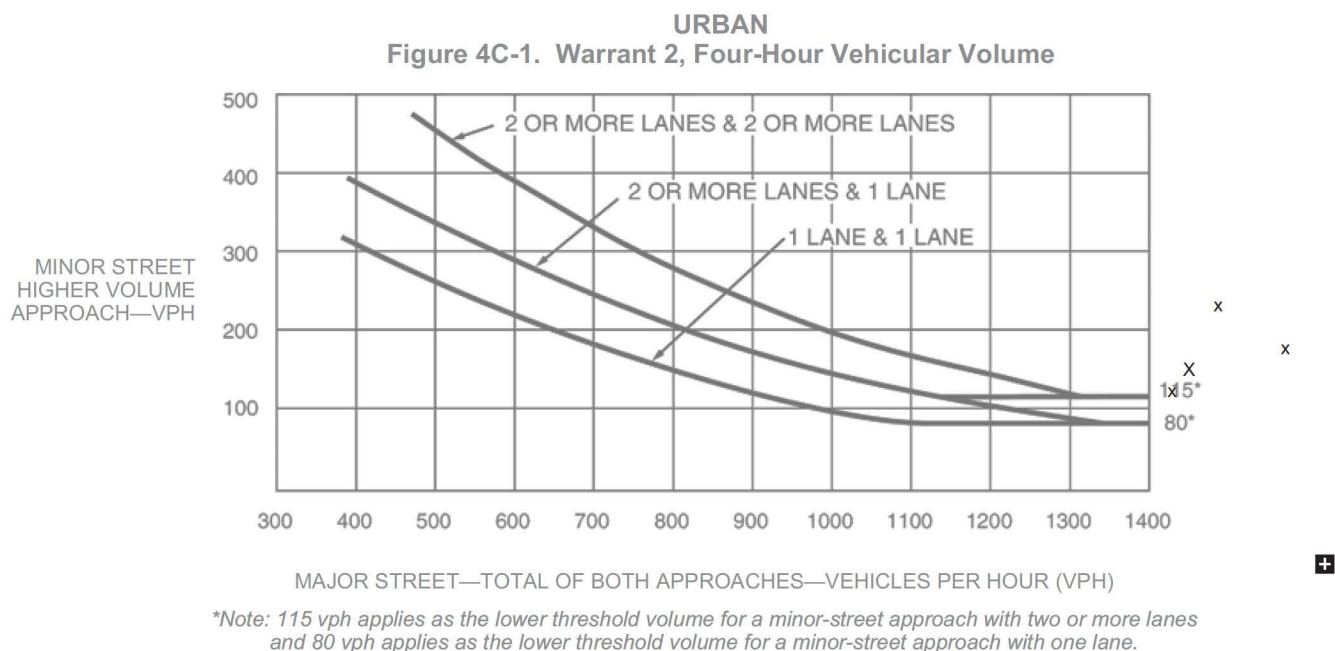
★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Record hourly vehicle volumes for the highest four hours of an average day.
- In applying each condition, the major street and minor street volumes shall be for the same hours. On the minor street, the higher volume does not need to be the same approach during each of the hours.
- The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count.
- Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. This site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles. Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher volume of the major-street left-turn volumes plus the higher volume minor-street approach as the "minor street" volume and both approaches of the major street minus the higher of the major-street left-turn volume as "major street" volume. In these cases, engineering judgment should be used to determine if left-turn phasing is necessary to accommodate the high volume of left-turn traffic.

APPROACH LANES			Hours						
	One	2 or More	10am	4pm	5pm	6pm		YES	NO
Both Approaches - Major Street		✓	1447	1592	1421	1484	RIGHT TURN REDUCTION APPLICATION MINOR STREET (If Yes, fill in percentage)	☒	☐
Higher Approach - Minor Street	✓		154	176	129	219		100 %	
* All plotted points fall above the applicable curve in Figure 4C-1. (URBAN AREAS)								☒	☐
OR, All plotted points fall above the applicable curve in Figure 4C-2. (RURAL AREAS)								☒	☐

Four-Hour Vehicular Volume WARRANT 2 (continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★



Peak Hour

WARRANT
3

N/A

☒

SATISFIED

YES

☐

NO

☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Part A or Part B must be satisfied.
- b. This signal warrant shall be applied only in unusual cases, such as office complexes, manufacturing plants, industrial complexes, or high-occupancy vehicle facilities that attract or discharge large numbers of vehicles over a short time.
- c. In applying each condition, the major street and minor street volumes shall be for the same hours.
- d. The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count.
- e. Estimated Peak Hour Volumes may be used for new intersections, significantly reconstructed intersections, or where near-term land development will result in increased volumes.
- f. Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. This site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles. Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- g. At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher volume of the major-street left-turn volumes plus the higher volume minor-street approach as the "minor street" volume and both approaches of the major street minus the higher of the major-street left-turn volume as "major street" volume. In these cases, engineering judgment should be used to determine if left-turn phasing is necessary to accommodate the high volume of left-turn traffic.

Unusual facility per Note b.

YES ☐

NO ☐

Name _____

PART A

All parts 1, 2, and 3 below must be satisfied for the same one hour, for any four consecutive 15-minute periods)

	YES	NO	N/A
1. The total delay experienced by traffic on one minor street approach (one direction only) controlled by a STOP sign equals or exceeds four vehicle-hours for a one-lane approach, or five vehicle-hours for a two-lane approach; <u>AND</u>	☐	☐	☐
2. The volume on the same minor street approach (one direction only) equals or exceeds 100 vph for one moving lane of traffic or 150 vph for two moving lanes; <u>AND</u>	☐	☐	☐
3. The total entering volume serviced during the hour equals or exceeds 800 vph for intersections with four or more approaches or 650 vph for intersections with three approaches.	☐	☐	☐

PART B

				SATISFIED	YES	NO
				☐	☐	☐
APPROACH LANES	One	2 or More	Hour			
Both Approaches - Major Street		✓				
Higher Approach - Minor Street	✓		0			

RIGHT TURN REDUCTION APPLICATION MINOR STREET

(If Yes, fill in percentage)

YES ☐

NO ☐

%

The plotted point falls above the applicable curve in Figure 4C-3. (URBAN AREAS)

OR, The plotted point falls above the applicable curve in Figure 4C-4. (RURAL AREAS)

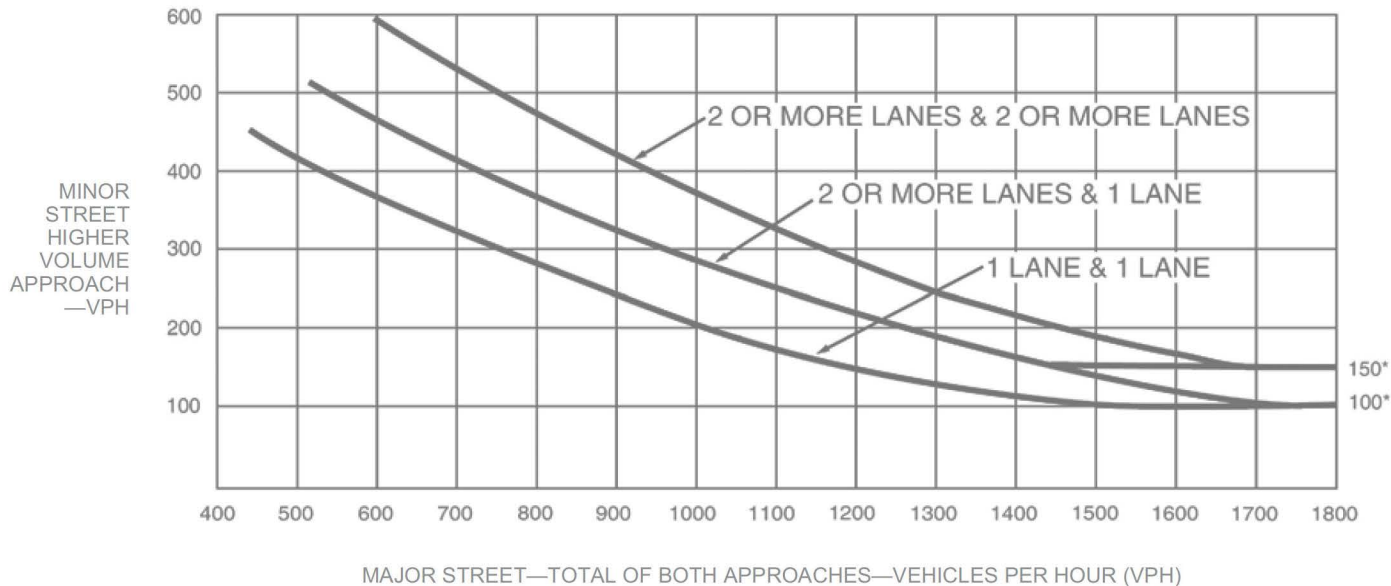
YES ☐

NO ☐

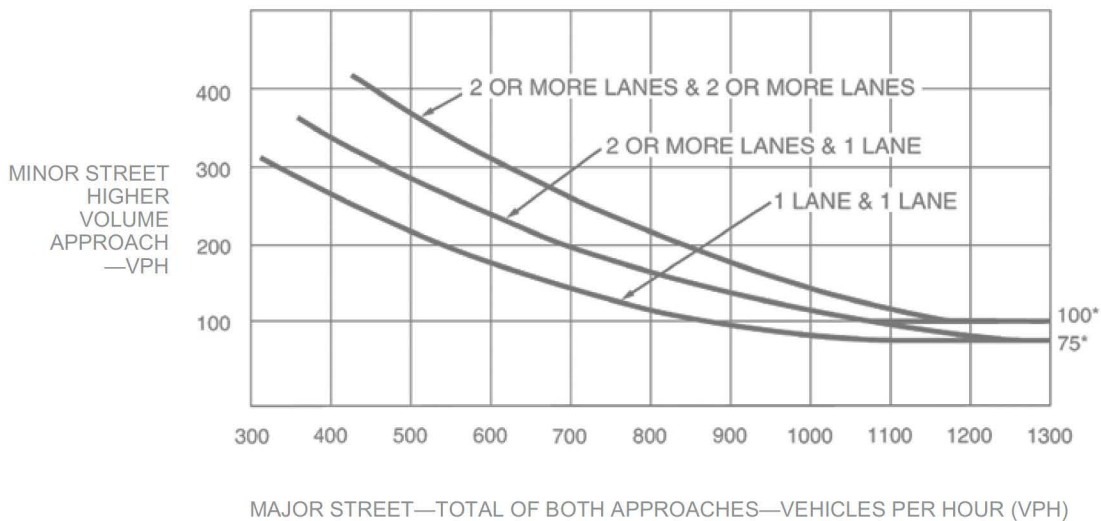
WARRANT 3 **Peak Hour** (continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

URBAN
Figure 4C-3. Warrant 3, Peak Hour



RURAL
Figure 4C-4. Warrant 3, Peak Hour (70% Factor)
(COMMUNITY LESS THAN 10,000 POPULATION OR ABOVE 40 MPH ON MAJOR STREET)



Pedestrian Volume



N/A ☐

SATISFIED YES ☐

NO ☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Parts 1 and 2 shall be satisfied.
- The pedestrian volume criterion may be reduced by as much as 50% if the 15th percentile speed of the pedestrians is less than 3.5 feet/second.
- Estimated pedestrian volumes may be used where nearby, near-term land use development has been approved for construction.
- In applying each condition, the total vehicles per hour on the major street (on both approaches) and the total pedestrians per hour crossing the major street shall be for the same hours.
- The Pedestrian Volume signal warrants shall not be applied at locations where the distance to the nearest traffic control signal or STOP sign controlling the street that pedestrians desire to cross is less than 300 feet, unless the proposed traffic control signal will not restrict the progressive movement of traffic.
- Traffic control signal may not be needed at the study location if adjacent coordinated traffic control signals consistently provide gaps of adequate length for pedestrians to cross the street.
- If it is considered at a non-intersection crossing, the traffic control signal should be installed at least 100 feet from side streets or driveways that are controlled by STOP or YIELD signs. If the traffic control signal is installed at a non-intersection crossing, at least one of the signal faces should be over the traveled way for each approach, parking and other sight obstructions should be prohibited for at least 100 feet in advance of and at least 20 feet beyond the crosswalk or site accommodations should be made through curb extensions or other techniques to provide adequate sight distance, and the installation should include suitable standard signs and pavement markings.
- Bicycles may be counted as pedestrians.
- Pedestrian Hybrid Beacons may be considered instead of a traffic signal if a device is recommended based upon pedestrian needs

PART 1 (A or B must be satisfied)

SATISFIED YES NO

☐ ☒

A. FOUR-HOUR PEDESTRIAN VOLUMES	Hours			
	9am	10am	5pm	6pm
Vehicles per hour on major street for 4 hours	1817	1447	1421	1484
Pedestrians crossing major street per hour for highest 4 hours	26	22	25	22

(FIGURE 4C-5 OR 4C-6 SATISFIED)

SATISFIED	YES	NO
100%	☐	☒
80%	☐	☒
50%	☐	☒

15% WALKING RATE _____ fps

B. ONE HOUR PEDESTRIAN VOLUMES	Hour
	5pm
Vehicles per hour on major street for 1 hour	1421
Pedestrians crossing major street per hour for highest 1 hour	25

(FIGURE 4C-7 or 4C-8 SATISFIED)

SATISFIED	YES	NO
100%	☐	☒
80%	☐	☒
50%	☐	☒

15% WALKING RATE _____ fps

PART 2

SATISFIED YES NO

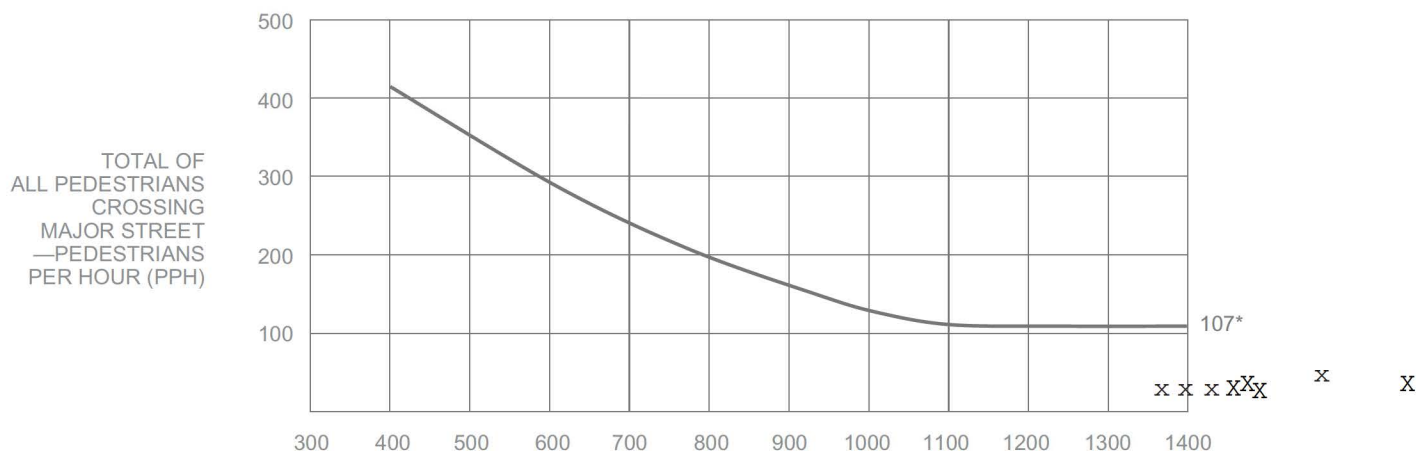
☐ ☒

	YES	NO
<u>AND</u> , The distance to the nearest traffic signal along the major street is greater than 300 ft	☐	☐
<u>OR</u> , The proposed traffic signal will not restrict progressive traffic flow along the major street	☐	☒

WARRANT 4 **Pedestrian Volume** (continued)

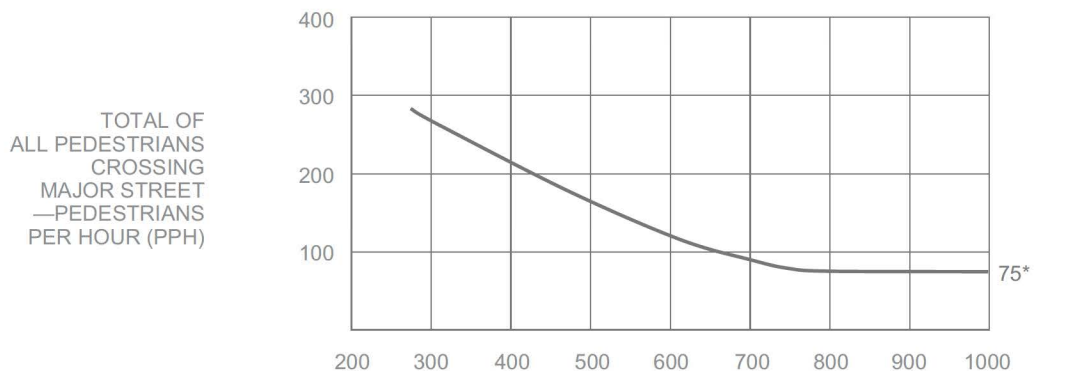
★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

SPEED ≤ 35 MPH
Figure 4C-5. Warrant 4, Pedestrian Four-Hour Volume



* Note: 107 pph applies as the lower threshold volume

SPEED > 35 MPH
Figure 4C-6. Warrant 4, Pedestrian Four-Hour Volume (70% Factor)

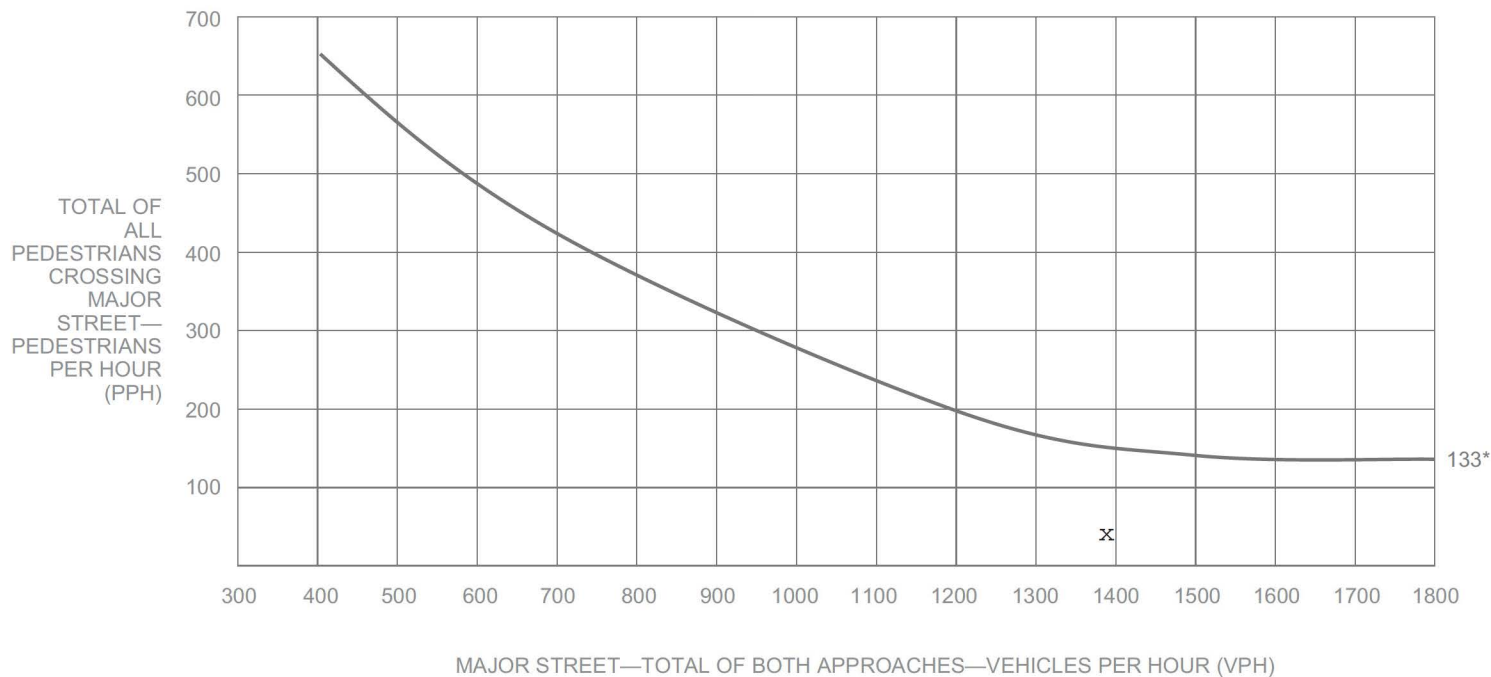


* Note: 75 pph applies as the lower threshold volume

Pedestrian Volume WARRANT 4 (continued)

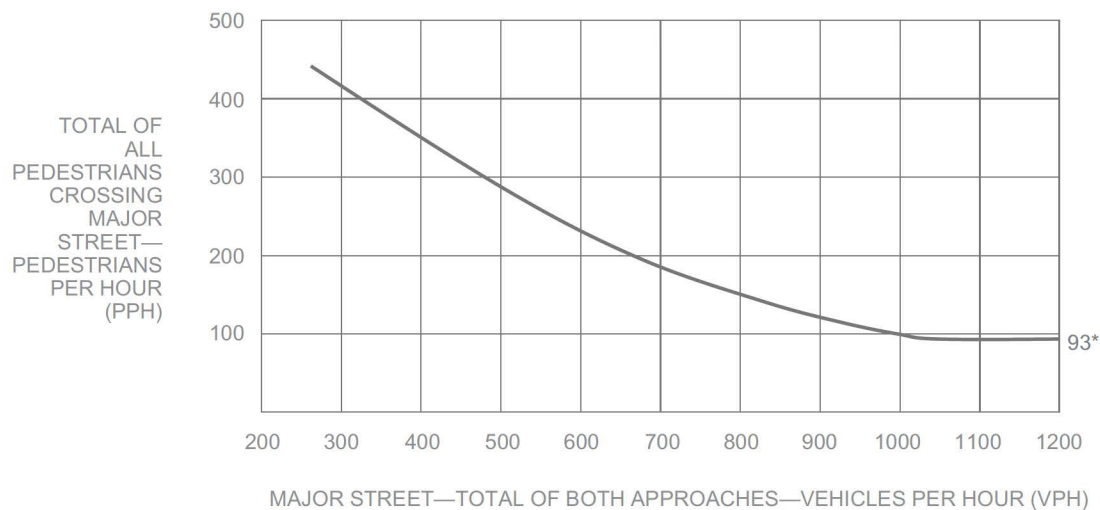
★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

SPEED ≤ 35 MPH
Figure 4C-7. Warrant 4, Pedestrian Peak Hour



* Note: 133 pph applies as the lower threshold volume

SPEED > 35 MPH
Figure 4C-8. Warrant 4, Pedestrian Peak Hour (70% Factor)



* Note: 93 pph applies as the lower threshold volume

School Crossing

WARRANT
5

N/A ☐

SATISFIED YES ☐

NO ☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Part A and Part B shall be satisfied.
- b. For purposes of this warrant, schoolchildren include elementary through high school students.
- c. Estimated schoolchildren volumes may be used where a new school or expanded school has been approved for construction.
- d. The need for a traffic control signal shall be considered when an engineering study of the frequency and adequacy of gaps in the vehicular traffic stream as related to the number and size of groups of schoolchildren at an established school crossing across the major street shows that the number of adequate gaps in the traffic stream during the period when the schoolchildren are using the crossing is less than the number of minutes in the same period and there are a minimum of 20 schoolchildren during the highest crossing hour.
- e. The School Crossing signal warrant shall not be applied at locations where the distance to the nearest traffic control signal along the major street is less than 300 feet, unless the proposed traffic control signal will not restrict the progressive movement of traffic.
- f. Non-intersectional schoolchildren crosswalk locations may be signalized when justified.
- g. Pedestrian Hybrid Beacons may be considered instead of a traffic signal if a device is recommended based upon pedestrian needs

PART A

				SATISFIED	YES	NO
					☐	☒
Hour						
Gap / Minutes and # of Children				YES	NO	
Gaps vs Minutes	Minutes Children Using Crossing		Gaps < Minutes AND Children ≥ 20/hr	☐	☐	
	Number of Adequate Gaps			☐	☐	
School Age Pedestrians Crossing Street / hr						
AND , Consideration has been given to less restrictive remedial measures				☐	☐	

PART B

				SATISFIED	YES	NO
					☒	☐
				YES	NO	
The distance to the nearest traffic signal along the major street is greater than 300 ft				☒	☐	
OR , The proposed traffic signal will not restrict progressive movement of traffic				☐	☒	

Coordinated Signal System

WARRANT
6

N/A ☐

SATISFIED YES ☐

NO ☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. The Coordinated Signal System signal warrant should not be applied where the resultant spacing of traffic control signals would be less than 1,000 feet.
- b. All Parts must be satisfied.

MINIMUM REQUIREMENTS	DISTANCE TO NEAREST SIGNAL	YES	NO
≥ 1000 ft	N <u>625</u> ft, S <u>625</u> ft, E <u>625</u> ft, W <u>2900</u> ft	☐	☒
On a one-way street or a street that has traffic predominantly in one direction, the adjacent traffic control signals are so far apart that they do not provide the necessary degree of vehicular platooning.		☐	☐
OR , On a two-way street, adjacent traffic control signals do not provide the necessary degree of platooning and the proposed and adjacent traffic control signals will collectively provide a progressive operation.		☐	☐

Crash Experience Warrant



N/A	☐
SATISFIED YES	☐
NO	☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- All Parts must be satisfied.
- For locations that involve other agencies, crash data from other involved jurisdictions should be obtained.

		YES	NO
Adequate trial of alternatives with satisfactory observance and enforcement has failed to reduce the crash frequency		☐	☐
REQUIREMENTS	Number of crashes reported within a 12-month period susceptible to correction by a traffic signal:	☐	☐
5 OR MORE	Indicate Date(s): 6/21/2015, 4/3/2017, 6/4/2018	☐	☐
REQUIREMENTS	CONDITIONS	☒	
ONE CONDITION SATISFIED 80%	Warrant 1, Condition A - Minimum Vehicular Volume		
	OR, Warrant 1, Condition B - Interruption of Continuous Traffic	☐	☐
	OR, Warrant 4, Pedestrian Volume Condition - Ped Vol ≥ 80% for ped volumes per Figures 4C-5 to 4C-8		

Roadway Network



N/A	☐
SATISFIED YES	☐
NO	☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Existing traffic volumes with an ambient growth rate of 1% (or other LADOT approved ambient growth rate) may be used if projected volumes are not available.
- All Parts must be satisfied.

MINIMUM VOLUME REQUIREMENTS	ENTERING VOLUMES - ALL APPROACHES	✓	FULLFILLED	
			YES	NO
1000 Veh / Hr	During Typical Weekday Peak Hour _____ Veh/Hr AND has 5-year projected traffic volumes that meet one or more of Warrants 1,2, and 3 during an average weekday.		☐	☐
	OR During Each of Any 5 Hrs. of a Saturday or Sunday _____ Veh / Hr			
CHARACTERISTICS OF MAJOR ROUTES	MAJOR ROUTE A	MAJOR ROUTE B	YES	NO
Highway System Serving as Principal Network for Through Traffic	X			
Rural or Suburban Highway Outside Of, Entering, or Traversing a City	X			
Appears as Major Route on an Official Plan	X			
Any Major Route Characteristics Met, Both Streets			☐	☒

Intersection Near a Grade Crossing



N/A ☒

SATISFIED YES ☐

NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Both Parts A and B shall be satisfied.
- b. This Warrant shall only be applied after review and approval by the LADOT Railroad Crossing and Safety Section (RCOSS), subject to CPUC General Order approval.
- c. This Warrant does not apply for Pre-Signals and/or Queue-Cutter signals, as an alternative application of Pre-Signals (See 2012 CA MUTCD, Sec 8C.09). Pre-Signals shall only be applied after review and approval by RCOSS, subject to CPUC General Order approval.

	FULFILLED	
	YES	NO
PART A A grade crossing exists on an approach controlled by a STOP or YIELD sign and the center of the track nearest to the intersection is within 140 feet of the stop line or yield line on the approach. Track Center Line to Limit Line _____ ft	☐	☐
PART B There is one minor street approach lane at the track crossing - During the highest traffic volume hour during which rail traffic uses the crossing, the plotted point falls above the applicable curve in Figure 4C-9. Major Street - Total of both approaches: _____ VPH Minor Street - Crosses the track (one direction only, approaching the intersection): _____ VPH X AF (Use Tables 4C-2, 3, & 4 below to calculate AF) = _____ VPH	☐	☐
OR, There are two or more minor street approach lanes at the track crossing - During the highest traffic volume hour during which rail traffic uses the crossing, the plotted point falls above the applicable curve in Figure 4C-10. Major Street - Total of both approaches: _____ VPH Minor Street - Crosses the track (one direction only, approaching the intersection): _____ VPH X AF (Use Tables 4C-2, 3, & 4 below to calculate AF) = _____ VPH		

The minor street approach volume may be multiplied by up to three following adjustment factors (AF) as described in Section 4C-10.

1. Number of Rail Traffic per Day _____ Adjustment factor from Table 4C-2 _____
2. Percentage of High-Occupancy Buses on Minor Street Approach _____ Adjustment factor from Table 4C-3 _____
3. Percentage of Tractor-Trailer Trucks on Minor Street Approach _____ Adjustment factor from Table 4C-4 _____

NOTE: If no data is available or known, then use AF = 1 (no adjustment)

**Table 4C-2. Warrant 9,
Adjustment Factor for
Daily Frequency of Rail Traffic**

Rail Traffic per Day	Adjustment Factor
1	0.67
2	0.91
3 to 5	1.00
6 to 8	1.18
9 to 11	1.25
12 or more	1.33

**Table 4C-3. Warrant 9,
Adjustment Factor for
Percentage of High-Occupancy Buses**

% of High-Occupancy Buses * on Minor-Street Approach	Adjustment Factor
0 %	1.00
2 %	1.09
4 %	1.19
6 % or more	1.32

* A high-occupancy bus is defined as a bus occupied by at least 20 people

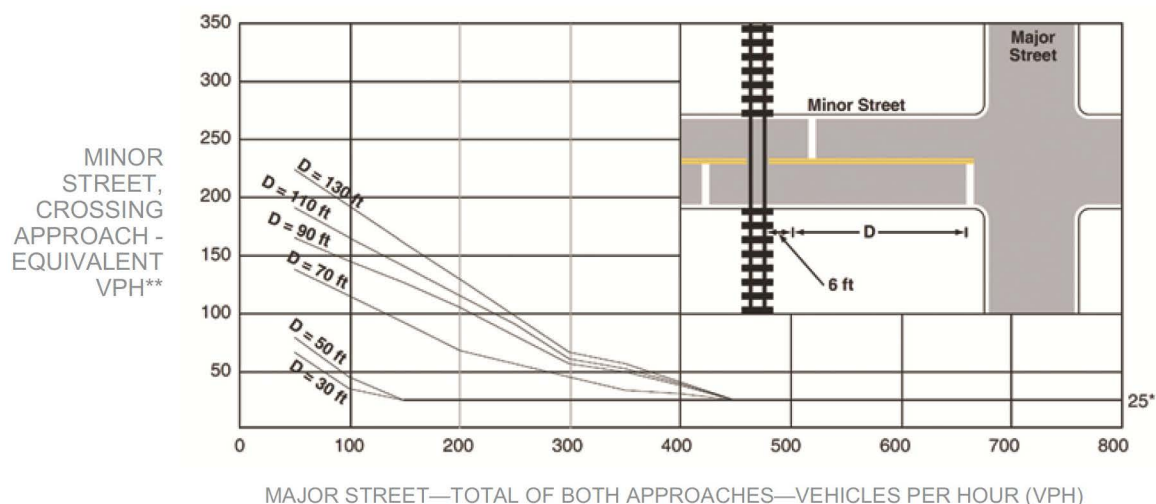
Intersection Near a Grade Crossing WARRANT 9 (continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

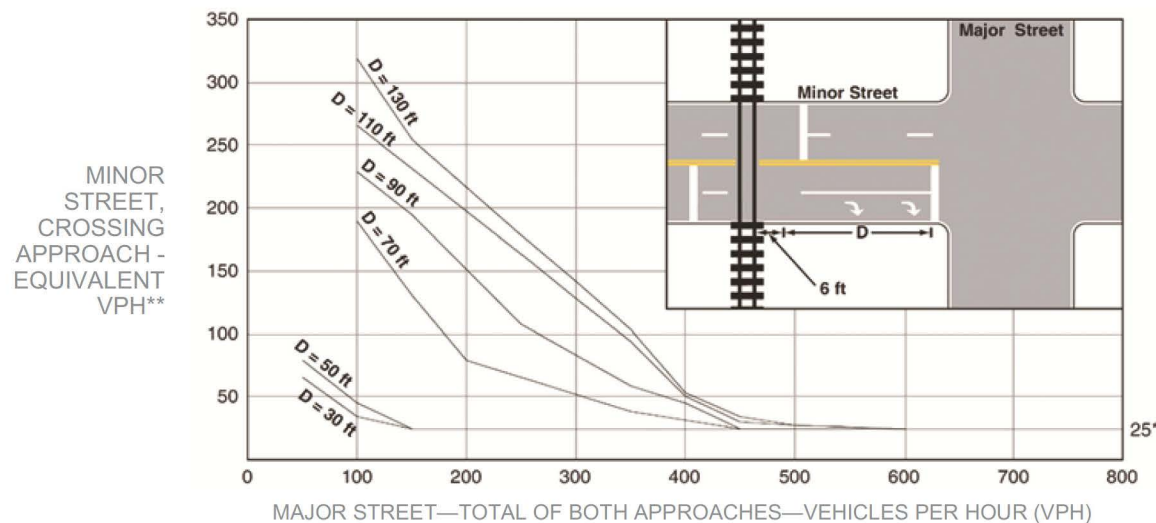
**Table 4C-4. Warrant 9,
Adjustment Factor for Percentage of Tractor-Trailer Trucks**

% of Tractor-Trailer Trucks on Minor-Street Approach	Adjustment Factor	
	D less than 70 feet	D of 70 feet or more
0% to 2.5%	0.50	0.50
2.6% to 7.5%	0.75	0.75
7.6% to 12.5%	1.00	1.00
12.6% to 17.5%	2.30	1.15
17.6% to 22.5%	2.70	1.35
22.6% to 27.5%	3.28	1.64
More than 27.5%	4.18	2.09

**Figure 4C-9. Warrant 9, Intersection Near a Grade Crossing
(One Approach Lane at the Track Crossing)**



**Figure 4C-10. Warrant 9, Intersection Near a Grade Crossing
(Two or More Approach Lanes at the Track Crossing)**



* 25 vph applies as the lower threshold volume

** VPH after applying the adjustment factors in Tables 4C-2, 4C-3, and/or 4C-4, if appropriate

The next two warrants are not included in the MUTCD (CA) standard warrants, but are added as optional warrants that an engineer may use with discretion to justify a traffic signal for special conditions where other traffic control devices could be considered, but where a traffic signal might be more appropriate

Bicycles

WARRANT

10

N/A
☒

SATISFIED

YES ☐
NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Part A and Part B shall be satisfied
- b. Per MUTCD (CA) Section 4C.01.15: "For signal warrant analysis, bicyclists may be counted as either vehicles or pedestrians."
- c. When performing a signal warrant analysis, bicyclists riding in the street with other vehicular traffic are usually counted as vehicles, and bicyclists who are clearly using pedestrian facilities are usually counted as pedestrians; however for this bicycle specific warrant, bicyclists are counted as bicyclists, regardless of where they are riding.
- d. Bicycle signal faces should be considered for use when this warrant is satisfied, with the final determination made during the signal design process. Refer to MUTCD (CA) Section 4D.104 (CA).
- e. Estimated peak hour bicycle volumes may be used for new intersections, significantly reconstructed intersections, or where new bicycle facilities or near-term land development are proposed which will result in increased bicycle volumes.

PART A and B must be satisfied

SATISFIED	YES	NO
☐	☐	☐

PART A (1 or 2 below must be satisfied)

	SATISFIED	YES	NO
1. Location meets the Department's guidelines for a marked crosswalk with Pedestrian Hybrid Beacons, where pedestrian units are replaced with bicyclists; AND the minor street is designated as part of the Neighborhood Enhanced Network in the Mobility Plan 2035 Element of the City's General Plan.	☐		☐
2. The intersection features a two-way bicycle or pedestrian path or trail within the median or alongside one of the roadways.	☐		☐

PART B (1, 2, or 3 below must be satisfied)

PART B (1, 2, or 3 below must be satisfied)		SATISFIED	YES	NO
1. Signal would be part of a corridor or area project to improve bicycle connectivity.*		☐	☐	☐
2. Signal is associated with a development project.*		☐	☐	☐
3. There have been at least 3 correctable collisions involving bicyclists in the last 1 year, 2 per year for the last 2 years, or 5 in the last 3 years of available data. Specify dates of correctable bicycle collisions:		☐	☐	☐
</				

*The authority for a traffic signal justified using Part B.1 or B.2 shall be automatically rescinded three years after the date of approval if funding for construction of the traffic signal is not secured or project plans are not actively being reviewed for approval.

Pedestrian Activated Yellow Flashing Beacons



N/A

☒

SATISFIED

YES

☐

NO

☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. All Parts shall be satisfied.
- b. This warrant should be applied when Pedestrian Activated Yellow Flashing Beacons are recommended within 600 feet BOTH upstream and downstream of existing traffic signals.

PART A	YES	NO
Location meets the guidelines for the installation of Pedestrian Activated Yellow Flashing Beacons as described in the LADOT Marked Crosswalk Guidelines.	☐	☐

PART B		YES	NO
MINIMUM REQUIREMENTS	DISTANCE TO NEAREST SIGNALS		
≤ 600 ft	N _____ ft, S _____ ft, E _____ ft, W _____ ft	☐	☐

Traffic Signal Warrants Worksheet

SR#

DATE 1-3-22 PREPARER LF REVIEWER _____MAJOR ST: CAHUENGA BOULEVARDMINOR ST: LEXINGTON STREET

Critical Approach Speed	} 	or	Speed Limit	} 
Speed limit or critical speed on major street traffic > 40 mph.....	☐	} RURAL (R)		☒ URBAN (U)
In built up area of isolated community of < 10,000 population.....	☐			

Eight-Hour Vehicular Volume

N/A ☐SATISFIED YES ☒NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Condition A or Condition B or combination of 80% of both parts A and B must be satisfied.
- A 6-hour Manual Count may be used in a determination that this warrant is not met. However, supplement manual counts should be taken during separate hours for a determination that this warrant is met.
- In applying each condition, the major street and minor street volumes shall be for the same hours. On the minor street, the higher volume does not need to be the same approach during each of the hours.
- The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count.
- Figure 4C-103(CA) should be used for new intersections, significantly reconstructed intersections, where near-term land development will result in increased volumes, or where it is not reasonable to use current traffic volumes.
- Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. This site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles. Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher volume of the major-street left-turn volumes plus the higher volume minor-street approach as the "minor street" volume and both approaches of the major street minus the higher of the major-street left-turn volume as "major street" volume. In these cases, engineering judgment should be used to determine if left-turn phasing is necessary to accommodate the high volume of left-turn traffic.

Eight-Hour Vehicular Volume WARRANT 1 (continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

Condition A

Minimum Vehicle Volume

SATISFIED	YES	NO
100%	☐	☒
80%	☐	☒
RIGHT TURN REDUCTION APPLICATION MINOR STREET (If Yes, fill in percentage)		☐ 100 %

MINIMUM REQUIREMENTS (80% SHOW IN BRACKETS)					Hours						
U	R	U	R		7AM	8AM	9AM	3PM	4PM	5PM	
1		2 or More									
APPROACH LANES											
Both Approach Major Street	500 (400)	350 (280)	600 (480)	420 (336)		1467	1816	1446	1597	1426	1489
Highest Approach Minor Street	150 (120)	105 (84)	200 (160)	140 (112)		104	90	144	176	129	219

Condition B

Interruption of Continuous Traffic

SATISFIED	YES	NO
100%	☒	☐
80%	☒	☐
RIGHT TURN REDUCTION APPLICATION MINOR STREET (If Yes, fill in percentage)		☐ 100 %

MINIMUM REQUIREMENTS (80% SHOW IN BRACKETS)					Hours						
U	R	U	R		7AM	8AM	9AM	3PM	4PM	5PM	
1		2 or More									
APPROACH LANES											
Both Approach Major Street	750 (600)	525 (420)	900 (720)	630 (504)		1467	1816	1446	1597	1426	1489
Highest Approach Minor Street	75 (60)	53 (42)	100 (80)	70 (56)		104	90	144	176	129	219

COMBINATION OF A & B

SATISFIED	YES	NO
	☐	☒

REQUIREMENT	CONDITION	✓	FULFILLED	
			YES	NO
TWO CONDITIONS SATISFIED 80%	A. MINIMUM VEHICULAR VOLUME			
	AND		☐	☒
	B. INTERRUPTION OF CONTINUOUS TRAFFIC			
	AND			
AN ADEQUATE TRIAL OF OTHER ALTERNATIVES THAT COULD CAUSE LESS DELAY AND INCOVENIENCE TO TRAFFIC HAS FAILED TO SOLVE THE TRAFFIC PROBLEMS			☐	☐

Eight-Hour Vehicular Volume WARRANT 1 (continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

Projected Volumes

N/A

☒

SATISFIED

YES

☐

NO

☐

Figure 4C-103 (CA). Traffic Signal Warrants Worksheet (Average Traffic Estimate Form)
Based on Estimated Average Daily Traffic - see *Note*★

URBAN ☐		RURAL ☐		Minimum Requirements Estimated Average Daily Traffic			
CONDITION A - Minimum Vehicular Volume Satisfied ☐ Not Satisfied ☐				Vehicles Per Day On Major Street (Total of Both Approaches)		Vehicles Per Day On Higher-Volume Minor Street Approach (One Direction Only)	
Number of lanes for moving traffic on each approach				Urban	Rural	Urban	Rural
Major Street	Minor Street	Major Street	Minor Street				
1.....	1.....	1.....	1.....	8,000	5,600	2,400	1,680
2 or More.....	1.....	2 or More.....	1.....	9,600	6,720	2,400	1,680
2 or More.....	2 or More.....	2 or More.....	2 or More.....	9,600	6,720	3,200	2,240
1.....	2 or More.....	1.....	2 or More.....	8,000	5,600	3,200	2,240
CONDITION B - Interruption of Continuous Traffic Satisfied ☐ Not Satisfied ☐				Vehicles Per Day On Major Street (Total of Both Approaches)		Vehicles Per Day On Higher-Volume Minor Street Approach (One Direction Only)	
Number of lanes for moving traffic on each approach				Urban	Rural	Urban	Rural
Minor Street	Minor Street	Minor Street	Minor Street				
1.....	1.....	1.....	1.....	12,000	8,400	1,200	850
2 or More.....	1.....	2 or More.....	1.....	14,400	10,080	1,200	850
2 or More.....	2 or More.....	2 or More.....	2 or More.....	14,400	10,080	1,600	1,120
1.....	2 or More.....	1.....	2 or More.....	12,000	8,400	1,600	1,120
Combination of CONDITIONS A + B Satisfied ☐ Not Satisfied ☐				2 CONDITIONS 80%		2 CONDITIONS 80%	
<u>No one condition satisfied</u> , but following conditions fulfilled 80% or more..... <u> </u> <u> </u> A B							

★ **Note:** To be used only for NEW INTERSECTIONS or other locations where it is not reasonable to count actual traffic volumes

Four-Hour Vehicular Volume



N/A ☐

SATISFIED YES ☒

NO ☐

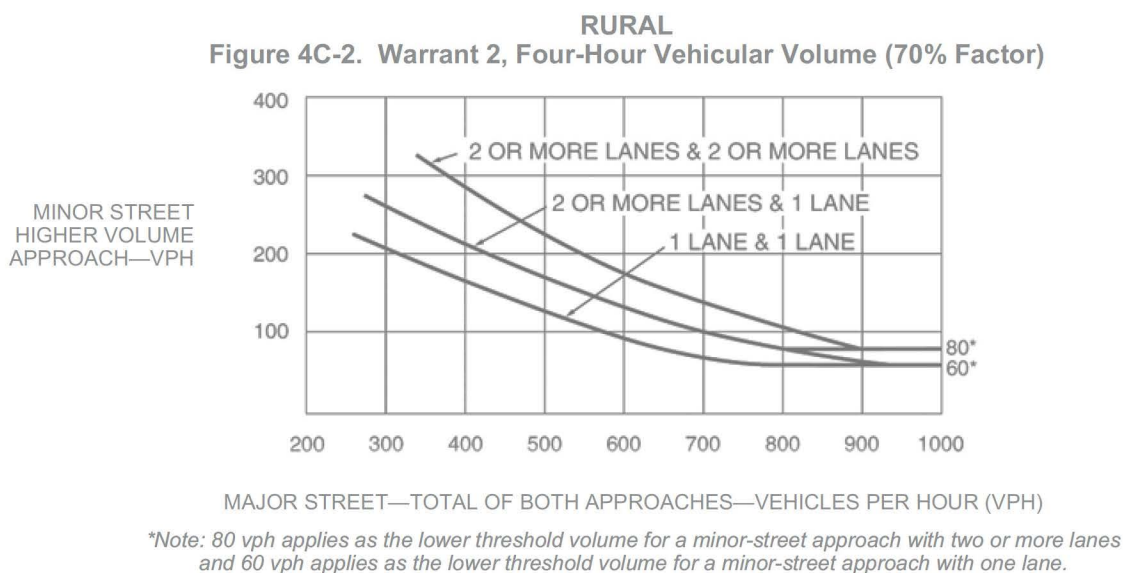
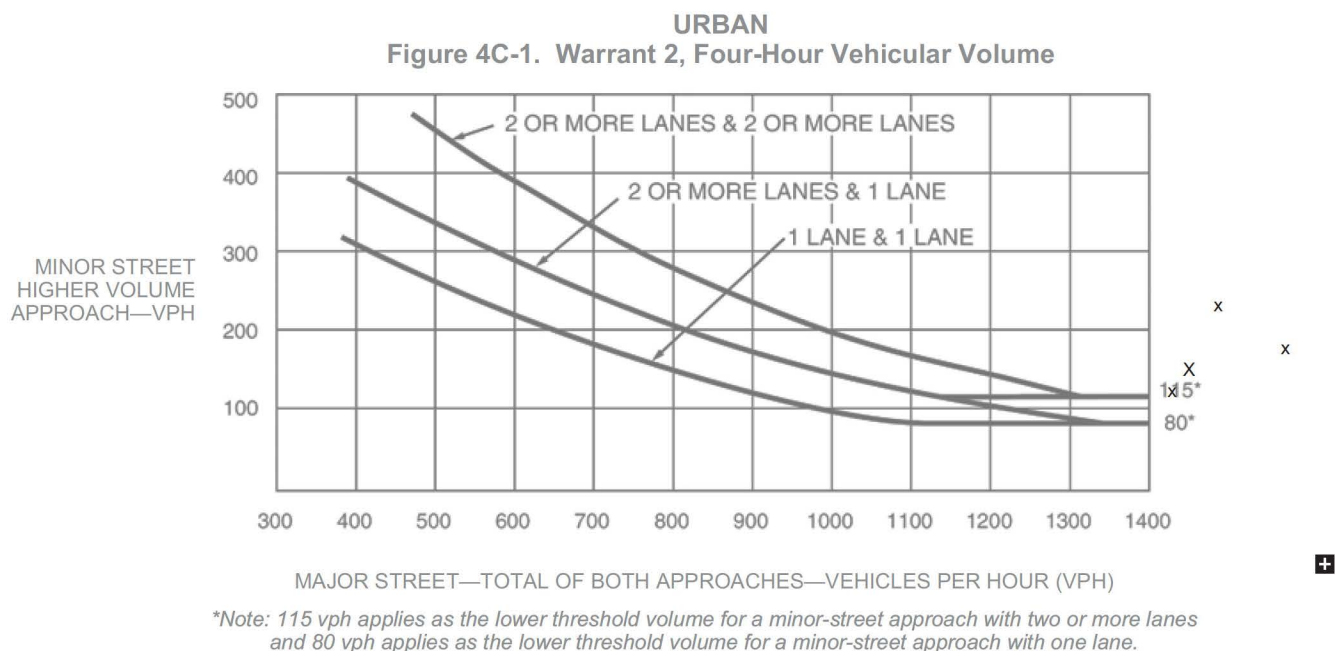
★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Record hourly vehicle volumes for the highest four hours of an average day.
- In applying each condition, the major street and minor street volumes shall be for the same hours. On the minor street, the higher volume does not need to be the same approach during each of the hours.
- The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count.
- Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. This site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles. Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher volume of the major-street left-turn volumes plus the higher volume minor-street approach as the "minor street" volume and both approaches of the major street minus the higher of the major-street left-turn volume as "major street" volume. In these cases, engineering judgment should be used to determine if left-turn phasing is necessary to accommodate the high volume of left-turn traffic.

APPROACH LANES	Hours							YES	NO
	One	2 or More	10am	4pm	5pm	6pm			
Both Approaches - Major Street		✓	1446	1597	1426	1489	RIGHT TURN REDUCTION APPLICATION MINOR STREET (If Yes, fill in percentage)	☒	☐
Higher Approach - Minor Street	✓		144	176	129	219		100 %	
* All plotted points fall above the applicable curve in Figure 4C-1. (URBAN AREAS)								☒	☐
OR, All plotted points fall above the applicable curve in Figure 4C-2. (RURAL AREAS)								☒	☐

Four-Hour Vehicular Volume WARRANT 2 (continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★



Peak Hour

WARRANT
3

N/A ☒

SATISFIED YES ☐

NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Part A or Part B must be satisfied.
- b. This signal warrant shall be applied only in unusual cases, such as office complexes, manufacturing plants, industrial complexes, or high-occupancy vehicle facilities that attract or discharge large numbers of vehicles over a short time.
- c. In applying each condition, the major street and minor street volumes shall be for the same hours.
- d. The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count.
- e. Estimated Peak Hour Volumes may be used for new intersections, significantly reconstructed intersections, or where near-term land development will result in increased volumes.
- f. Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. This site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles. Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- g. At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher volume of the major-street left-turn volumes plus the higher volume minor-street approach as the "minor street" volume and both approaches of the major street minus the higher of the major-street left-turn volume as "major street" volume. In these cases, engineering judgment should be used to determine if left-turn phasing is necessary to accommodate the high volume of left-turn traffic.

Unusual facility per Note b.

YES ☐	NO ☐
------------------------------	-----------------------------

Name _____

PART A

All parts 1, 2, and 3 below must be satisfied for the same one hour, for any four consecutive 15-minute periods)

	YES	NO	N/A
1. The total delay experienced by traffic on one minor street approach (one direction only) controlled by a STOP sign equals or exceeds four vehicle-hours for a one-lane approach, or five vehicle-hours for a two-lane approach; <u>AND</u>	☐	☐	☐
2. The volume on the same minor street approach (one direction only) equals or exceeds 100 vph for one moving lane of traffic or 150 vph for two moving lanes; <u>AND</u>	☐	☐	☐
3. The total entering volume serviced during the hour equals or exceeds 800 vph for intersections with four or more approaches or 650 vph for intersections with three approaches.	☐	☐	☐

PART B

				SATISFIED	YES	NO
					☐	☐
APPROACH LANES	One	2 or More	Hour			
Both Approaches - Major Street		✓				
Higher Approach - Minor Street	✓		0			

RIGHT TURN REDUCTION APPLICATION MINOR STREET

(If Yes, fill in percentage)

YES	NO
☐	☐

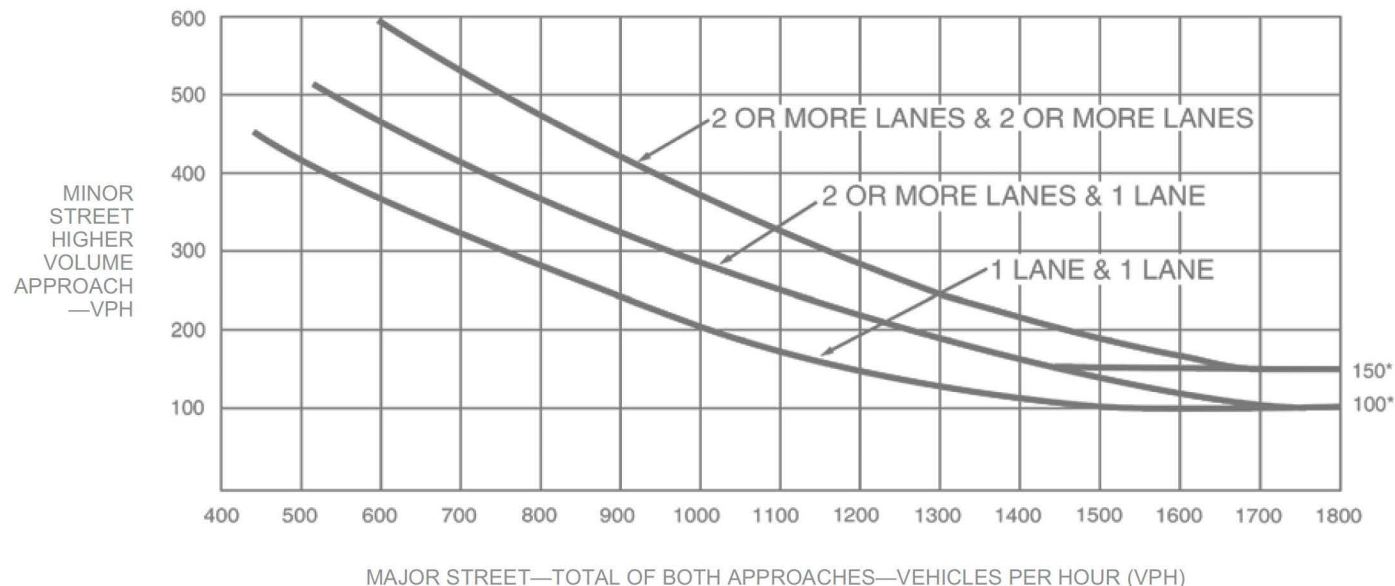
_____ %

	YES	NO
The plotted point falls above the applicable curve in Figure 4C-3. (URBAN AREAS)	☐	☐
<u>OR</u> , The plotted point falls above the applicable curve in Figure 4C-4. (RURAL AREAS)	☐	☐

Peak Hour **WARRANT 3** (continued)

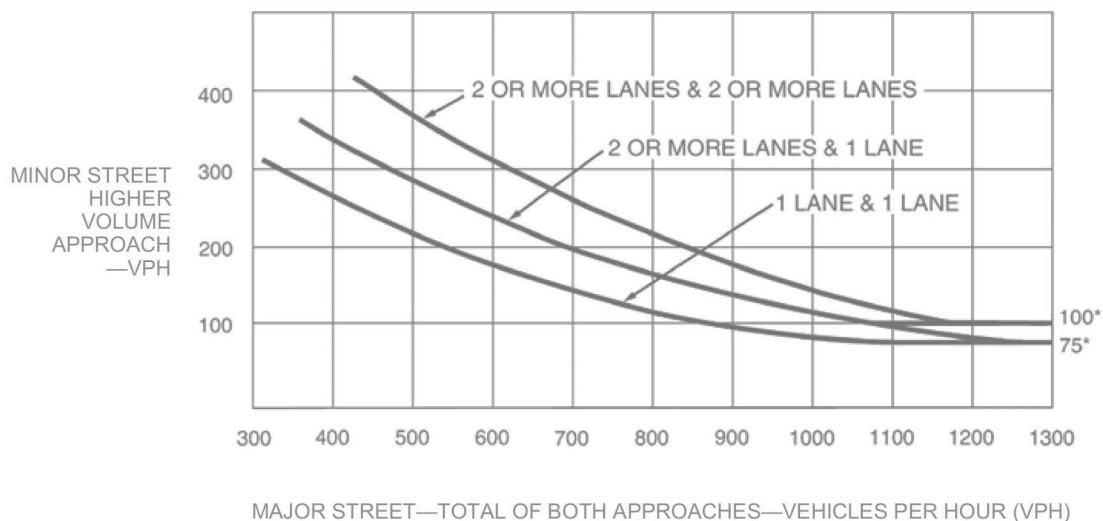
★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

URBAN
Figure 4C-3. Warrant 3, Peak Hour



* Note: 150 vph applies as the lower threshold volume for a minor street approach with two or more lanes and 100 vph applies as the lower threshold volume for a minor street approach with one lane.

RURAL
Figure 4C-4. Warrant 3, Peak Hour (70% Factor)
(COMMUNITY LESS THAN 10,000 POPULATION OR ABOVE 40 MPH ON MAJOR STREET)



* Note: 100 vph applies as the lower threshold volume for a minor street approach with two or more lanes and 75 vph applies as the lower threshold volume for a minor street approach with one lane.

Pedestrian Volume



N/A	☐
SATISFIED YES	☐
NO	☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Parts 1 and 2 shall be satisfied.
- The pedestrian volume criterion may be reduced by as much as 50% if the 15th percentile speed of the pedestrians is less than 3.5 feet/second.
- Estimated pedestrian volumes may be used where nearby, near-term land use development has been approved for construction.
- In applying each condition, the total vehicles per hour on the major street (on both approaches) and the total pedestrians per hour crossing the major street shall be for the same hours.
- The Pedestrian Volume signal warrants shall not be applied at locations where the distance to the nearest traffic control signal or STOP sign controlling the street that pedestrians desire to cross is less than 300 feet, unless the proposed traffic control signal will not restrict the progressive movement of traffic.
- Traffic control signal may not be needed at the study location if adjacent coordinated traffic control signals consistently provide gaps of adequate length for pedestrians to cross the street.
- If it is considered at a non-intersection crossing, the traffic control signal should be installed at least 100 feet from side streets or driveways that are controlled by STOP or YIELD signs. If the traffic control signal is installed at a non-intersection crossing, at least one of the signal faces should be over the traveled way for each approach, parking and other sight obstructions should be prohibited for at least 100 feet in advance of and at least 20 feet beyond the crosswalk or site accommodations should be made through curb extensions or other techniques to provide adequate sight distance, and the installation should include suitable standard signs and pavement markings.
- Bicycles may be counted as pedestrians.
- Pedestrian Hybrid Beacons may be considered instead of a traffic signal if a device is recommended based upon pedestrian needs

PART 1 (A or B must be satisfied)

SATISFIED	YES	NO
	☐	☒

A. FOUR-HOUR PEDESTRIAN VOLUMES	Hours			
	9am	10am	5pm	6pm
Vehicles per hour on major street for 4 hours	1816	1446	1426	1489
Pedestrians crossing major street per hour for highest 4 hours	31	27	30	27

(FIGURE 4C-5 OR 4C-6 SATISFIED)

SATISFIED	YES	NO
100%	☐	☒
80%	☐	☒
50%	☐	☒

15% WALKING RATE _____ fps

B. ONE HOUR PEDESTRIAN VOLUMES	Hour
	5pm
Vehicles per hour on major street for 1 hour	1426
Pedestrians crossing major street per hour for highest 1 hour	30

(FIGURE 4C-7 or 4C-8 SATISFIED)

SATISFIED	YES	NO
100%	☐	☒
80%	☐	☒
50%	☐	☒

15% WALKING RATE _____ fps

PART 2

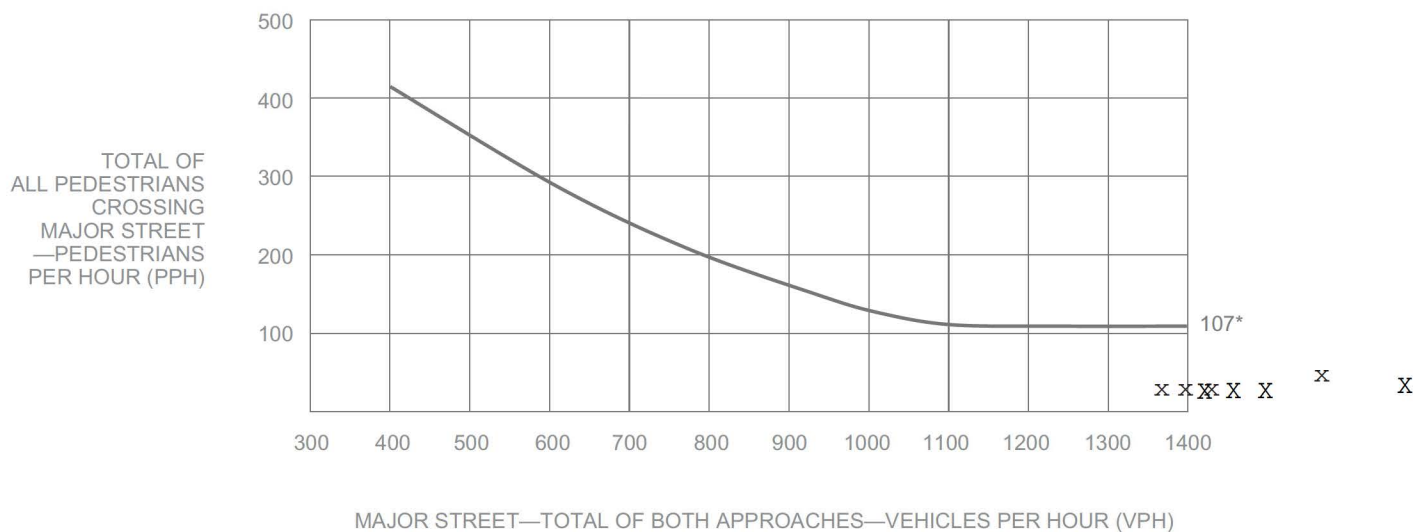
SATISFIED	YES	NO
	☐	☒

	YES	NO
<u>AND</u> , The distance to the nearest traffic signal along the major street is greater than 300 ft	☐	☐
<u>OR</u> , The proposed traffic signal will not restrict progressive traffic flow along the major street	☐	☒

WARRANT 4 **Pedestrian Volume** (continued)

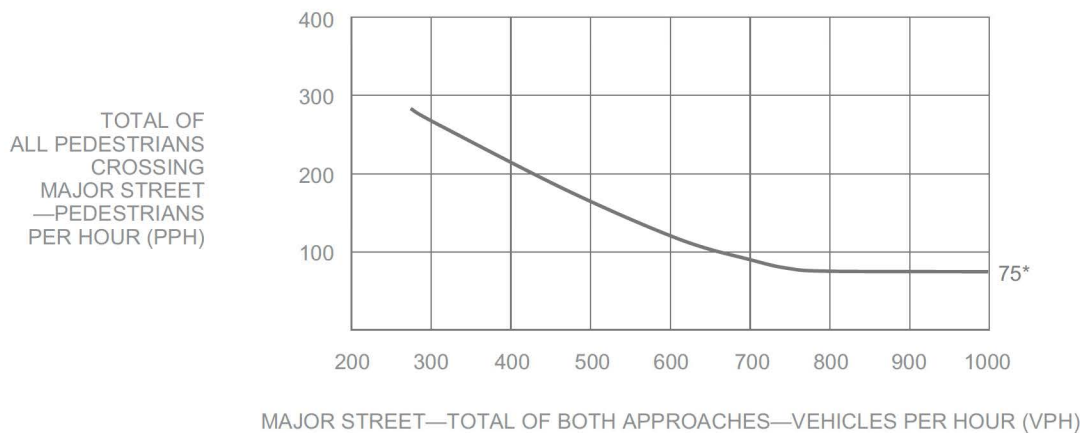
★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

SPEED ≤ 35 MPH
Figure 4C-5. Warrant 4, Pedestrian Four-Hour Volume



* Note: 107 pph applies as the lower threshold volume

SPEED > 35 MPH
Figure 4C-6. Warrant 4, Pedestrian Four-Hour Volume (70% Factor)

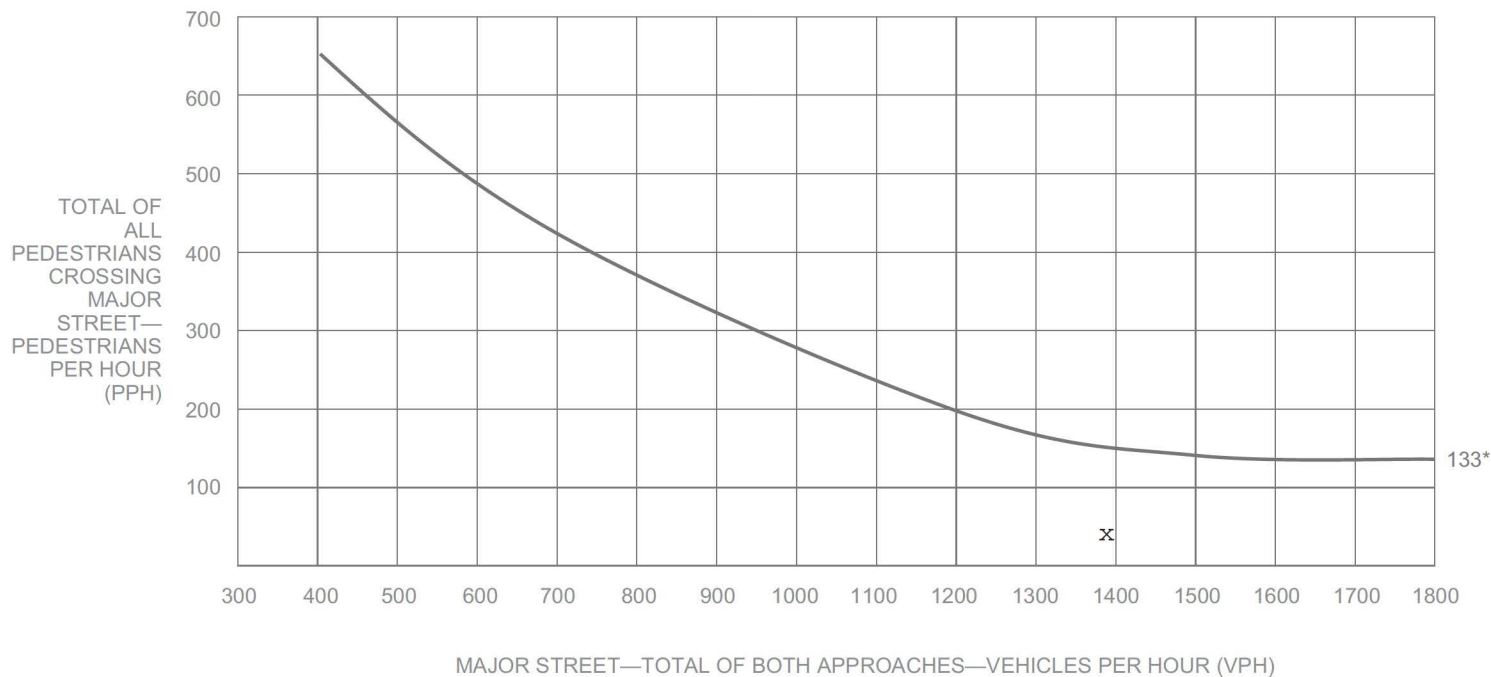


* Note: 75 pph applies as the lower threshold volume

Pedestrian Volume WARRANT 4 (continued)

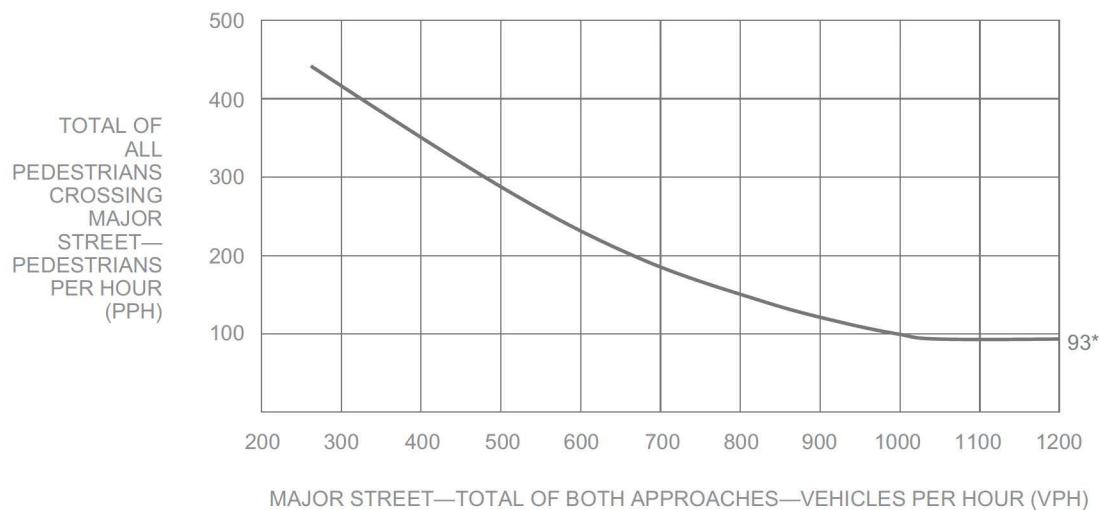
★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

SPEED ≤ 35 MPH
Figure 4C-7. Warrant 4, Pedestrian Peak Hour



* Note: 133 pph applies as the lower threshold volume

SPEED > 35 MPH
Figure 4C-8. Warrant 4, Pedestrian Peak Hour (70% Factor)



* Note: 93 pph applies as the lower threshold volume

School Crossing

WARRANT

5

N/A ☐

SATISFIED YES ☐

NO ☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Part A and Part B shall be satisfied.
- b. For purposes of this warrant, schoolchildren include elementary through high school students.
- c. Estimated schoolchildren volumes may be used where a new school or expanded school has been approved for construction.
- d. The need for a traffic control signal shall be considered when an engineering study of the frequency and adequacy of gaps in the vehicular traffic stream as related to the number and size of groups of schoolchildren at an established school crossing across the major street shows that the number of adequate gaps in the traffic stream during the period when the schoolchildren are using the crossing is less than the number of minutes in the same period and there are a minimum of 20 schoolchildren during the highest crossing hour.
- e. The School Crossing signal warrant shall not be applied at locations where the distance to the nearest traffic control signal along the major street is less than 300 feet, unless the proposed traffic control signal will not restrict the progressive movement of traffic.
- f. Non-intersectional schoolchildren crosswalk locations may be signalized when justified.
- g. Pedestrian Hybrid Beacons may be considered instead of a traffic signal if a device is recommended based upon pedestrian needs

PART A

				SATISFIED		YES	NO
						☐	☒
Hour							
Gap / Minutes and # of Children						YES	NO
Gaps vs Minutes	Minutes Children Using Crossing		Gaps < Minutes AND Children ≥ 20/hr			☐	☐
	Number of Adequate Gaps			☐	☐	☐	☐
School Age Pedestrians Crossing Street / hr		0					
AND , Consideration has been given to less restrictive remedial measures						☐	☐

PART B

		SATISFIED		YES	NO
				☒	☐
		YES	NO		
The distance to the nearest traffic signal along the major street is greater than 300 ft		☒	☐		
OR , The proposed traffic signal will not restrict progressive movement of traffic		☐	☒		

Coordinated Signal System

WARRANT

6

N/A ☐

SATISFIED YES ☐

NO ☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. The Coordinated Signal System signal warrant should not be applied where the resultant spacing of traffic control signals would be less than 1,000 feet.
- b. All Parts must be satisfied.

MINIMUM REQUIREMENTS	DISTANCE TO NEAREST SIGNAL	YES	NO
≥ 1000 ft	N <u>625</u> ft, S <u>625</u> ft, E <u>625</u> ft, W <u>2900</u> ft	☐	☒
On a one-way street or a street that has traffic predominantly in one direction, the adjacent traffic control signals are so far apart that they do not provide the necessary degree of vehicular platooning.		☐	☐
OR , On a two-way street, adjacent traffic control signals do not provide the necessary degree of platooning and the proposed and adjacent traffic control signals will collectively provide a progressive operation.		☐	☐

Crash Experience Warrant



N/A	☐
SATISFIED YES	☐
NO	☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- All Parts must be satisfied.
- For locations that involve other agencies, crash data from other involved jurisdictions should be obtained.

		YES	NO
Adequate trial of alternatives with satisfactory observance and enforcement has failed to reduce the crash frequency		☐	☒
REQUIREMENTS	Number of crashes reported within a 12-month period susceptible to correction by a traffic signal:	☐	☒
5 OR MORE	Indicate Date(s): 6/21/2015, 4/3/2017, 6/4/2018		
REQUIREMENTS	CONDITIONS		
ONE CONDITION SATISFIED 80%	Warrant 1, Condition A - Minimum Vehicular Volume		
	OR, Warrant 1, Condition B - Interruption of Continuous Traffic	☐	☐
	OR, Warrant 4, Pedestrian Volume Condition - Ped Vol ≥ 80% for ped volumes per Figures 4C-5 to 4C-8		

Roadway Network



N/A	☐
SATISFIED YES	☐
NO	☒

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- Existing traffic volumes with an ambient growth rate of 1% (or other LADOT approved ambient growth rate) may be used if projected volumes are not available.
- All Parts must be satisfied.

MINIMUM VOLUME REQUIREMENTS	ENTERING VOLUMES - ALL APPROACHES	✓	FULLFILLED	
			YES	NO
1000 Veh / Hr	During Typical Weekday Peak Hour _____ Veh/Hr AND has 5-year projected traffic volumes that meet one or more of Warrants 1,2, and 3 during an average weekday.		☐	☐
	OR During Each of Any 5 Hrs. of a Saturday or Sunday _____ Veh / Hr			
CHARACTERISTICS OF MAJOR ROUTES		MAJOR ROUTE A	MAJOR ROUTE B	
Highway System Serving as Principal Network for Through Traffic		X		
Rural or Suburban Highway Outside Of, Entering, or Traversing a City		X		
Appears as Major Route on an Official Plan		X		
Any Major Route Characteristics Met, Both Streets			☐	☒

Intersection Near a Grade Crossing



N/A ☒

SATISFIED YES ☐

NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Both Parts A and B shall be satisfied.
- b. This Warrant shall only be applied after review and approval by the LADOT Railroad Crossing and Safety Section (RCOSS), subject to CPUC General Order approval.
- c. This Warrant does not apply for Pre-Signals and/or Queue-Cutter signals, as an alternative application of Pre-Signals (See 2012 CA MUTCD, Sec 8C.09). Pre-Signals shall only be applied after review and approval by RCOSS, subject to CPUC General Order approval.

	FULFILLED	
	YES	NO
PART A A grade crossing exists on an approach controlled by a STOP or YIELD sign and the center of the track nearest to the intersection is within 140 feet of the stop line or yield line on the approach. Track Center Line to Limit Line _____ ft	☐	☐
PART B There is one minor street approach lane at the track crossing - During the highest traffic volume hour during which rail traffic uses the crossing, the plotted point falls above the applicable curve in Figure 4C-9. Major Street - Total of both approaches: _____ VPH Minor Street - Crosses the track (one direction only, approaching the intersection): _____ VPH X AF (Use Tables 4C-2, 3, & 4 below to calculate AF) = _____ VPH	☐	☐
OR, There are two or more minor street approach lanes at the track crossing - During the highest traffic volume hour during which rail traffic uses the crossing, the plotted point falls above the applicable curve in Figure 4C-10. Major Street - Total of both approaches: _____ VPH Minor Street - Crosses the track (one direction only, approaching the intersection): _____ VPH X AF (Use Tables 4C-2, 3, & 4 below to calculate AF) = _____ VPH		

The minor street approach volume may be multiplied by up to three following adjustment factors (AF) as described in Section 4C-10.

1. Number of Rail Traffic per Day _____ Adjustment factor from Table 4C-2 _____
2. Percentage of High-Occupancy Buses on Minor Street Approach _____ Adjustment factor from Table 4C-3 _____
3. Percentage of Tractor-Trailer Trucks on Minor Street Approach _____ Adjustment factor from Table 4C-4 _____

NOTE: If no data is available or known, then use AF = 1 (no adjustment)

**Table 4C-2. Warrant 9,
Adjustment Factor for
Daily Frequency of Rail Traffic**

Rail Traffic per Day	Adjustment Factor
1	0.67
2	0.91
3 to 5	1.00
6 to 8	1.18
9 to 11	1.25
12 or more	1.33

**Table 4C-3. Warrant 9,
Adjustment Factor for
Percentage of High-Occupancy Buses**

% of High-Occupancy Buses * on Minor-Street Approach	Adjustment Factor
0 %	1.00
2 %	1.09
4 %	1.19
6 % or more	1.32

* A high-occupancy bus is defined as a bus occupied by at least 20 people

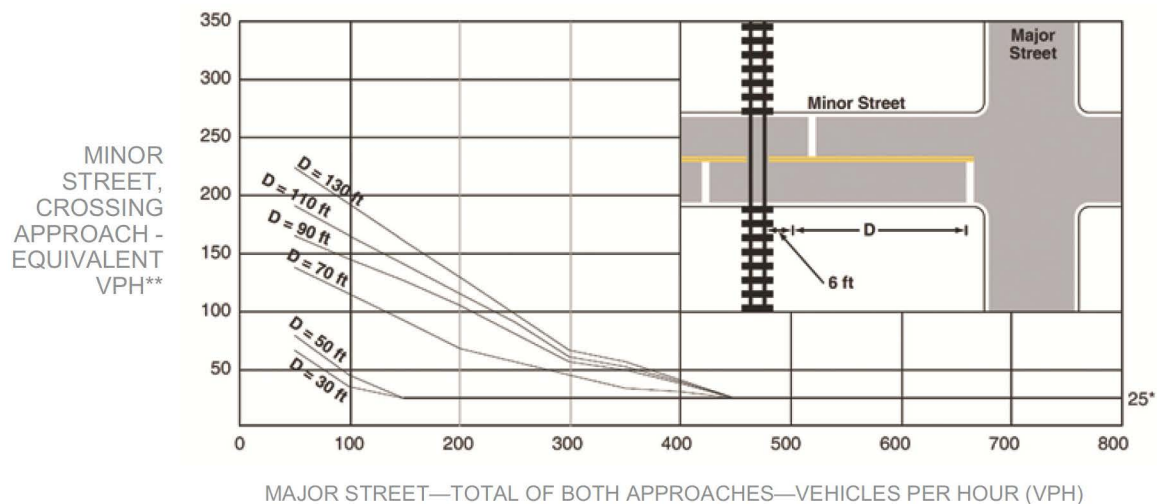
Intersection Near a Grade Crossing WARRANT 9 (continued)

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

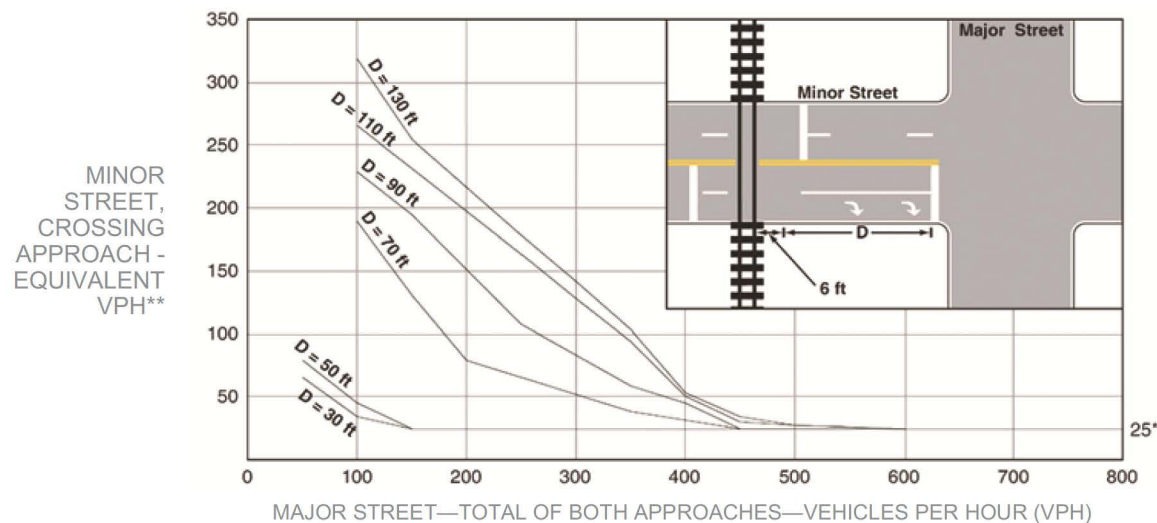
**Table 4C-4. Warrant 9,
Adjustment Factor for Percentage of Tractor-Trailer Trucks**

% of Tractor-Trailer Trucks on Minor-Street Approach	Adjustment Factor	
	D less than 70 feet	D of 70 feet or more
0% to 2.5%	0.50	0.50
2.6% to 7.5%	0.75	0.75
7.6% to 12.5%	1.00	1.00
12.6% to 17.5%	2.30	1.15
17.6% to 22.5%	2.70	1.35
22.6% to 27.5%	3.28	1.64
More than 27.5%	4.18	2.09

**Figure 4C-9. Warrant 9, Intersection Near a Grade Crossing
(One Approach Lane at the Track Crossing)**



**Figure 4C-10. Warrant 9, Intersection Near a Grade Crossing
(Two or More Approach Lanes at the Track Crossing)**



* 25 vph applies as the lower threshold volume

** VPH after applying the adjustment factors in Tables 4C-2, 4C-3, and/or 4C-4, if appropriate

The next two warrants are not included in the MUTCD (CA) standard warrants, but are added as optional warrants that an engineer may use with discretion to justify a traffic signal for special conditions where other traffic control devices could be considered, but where a traffic signal might be more appropriate

Bicycles

WARRANT

10

N/A
☒

SATISFIED

YES ☐
NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. Part A and Part B shall be satisfied
- b. Per MUTCD (CA) Section 4C.01.15: "For signal warrant analysis, bicyclists may be counted as either vehicles or pedestrians."
- c. When performing a signal warrant analysis, bicyclists riding in the street with other vehicular traffic are usually counted as vehicles, and bicyclists who are clearly using pedestrian facilities are usually counted as pedestrians; however for this bicycle specific warrant, bicyclists are counted as bicyclists, regardless of where they are riding.
- d. Bicycle signal faces should be considered for use when this warrant is satisfied, with the final determination made during the signal design process. Refer to MUTCD (CA) Section 4D.104 (CA).
- e. Estimated peak hour bicycle volumes may be used for new intersections, significantly reconstructed intersections, or where new bicycle facilities or near-term land development are proposed which will result in increased bicycle volumes.

PART A and B must be satisfied

SATISFIED	YES	NO
☐	☐	☐

PART A (1 or 2 below must be satisfied)

	SATISFIED	YES	NO
1. Location meets the Department's guidelines for a marked crosswalk with Pedestrian Hybrid Beacons, where pedestrian units are replaced with bicyclists; AND the minor street is designated as part of the Neighborhood Enhanced Network in the Mobility Plan 2035 Element of the City's General Plan.	☐		☐
2. The intersection features a two-way bicycle or pedestrian path or trail within the median or alongside one of the roadways.	☐		☐

PART B (1, 2, or 3 below must be satisfied)

PART B (1, 2, or 3 below must be satisfied)		SATISFIED	YES	NO
1. Signal would be part of a corridor or area project to improve bicycle connectivity.*		☐	☐	☐
2. Signal is associated with a development project.*		☐	☐	☐
3. There have been at least 3 correctable collisions involving bicyclists in the last 1 year, 2 per year for the last 2 years, or 5 in the last 3 years of available data. Specify dates of correctable bicycle collisions:		☐	☐	☐
</				

*The authority for a traffic signal justified using Part B.1 or B.2 shall be automatically rescinded three years after the date of approval if funding for construction of the traffic signal is not secured or project plans are not actively being reviewed for approval.

Pedestrian Activated Yellow Flashing Beacons



N/A ☒

SATISFIED YES ☐

NO ☐

★ The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal ★

- a. All Parts shall be satisfied.
- b. This warrant should be applied when Pedestrian Activated Yellow Flashing Beacons are recommended within 600 feet BOTH upstream and downstream of existing traffic signals.

PART A

	YES	NO
Location meets the guidelines for the installation of Pedestrian Activated Yellow Flashing Beacons as described in the LADOT Marked Crosswalk Guidelines.	☐	☐

PART B

MINIMUM REQUIREMENTS	DISTANCE TO NEAREST SIGNALS	YES	NO
≤ 600 ft	N _____ ft, S _____ ft, E _____ ft, W _____ ft	☐	☐