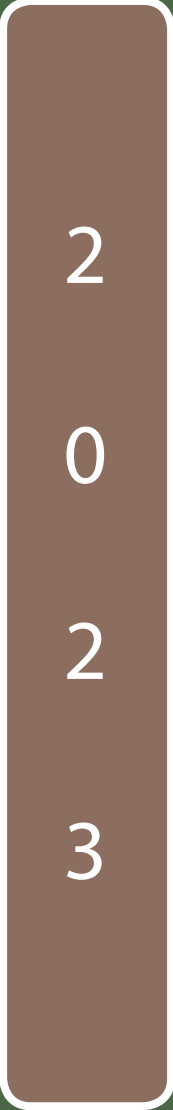




# Transportation Analysis Handbook



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# 1. INTRODUCTION

## 1.1. PURPOSE OF THE TRANSPORTATION ANALYSIS (TA) HANDBOOK

This handbook is a comprehensive guide that:

1. Provides the transportation analysis (TA) significance criteria, screening criteria, and thresholds of significance for environmental clearance for development projects, City transportation projects, and General Plan amendments;
2. Provides a framework for TA based on the City’s transportation policies and the Envision San José 2040 General Plan;
3. Provides the appropriate methodologies, procedures, and process for the preparation of a TA report within the context of CEQA;
4. Provides the appropriate procedures and process for meeting the City’s Transportation Demand Management (TDM) ordinance requirements; and
5. Provides the appropriate methodologies, procedures, and process for determining the effects of projects on the local transportation system.

## 1.2. BACKGROUND

In June 1994, the City developed the *Interim Guidelines for Traffic Impact Analysis of Land Development*. These guidelines provided a basis for determining the need for a transportation impact analysis, the scope, and necessary steps to conduct the analysis based on the City’s *Transportation Level of Service Policy* (Council Policy 5-3). The guidelines were updated and renamed in 2009 (*Traffic Impact Analysis Handbook Volume I – Methodologies & Requirements*) and 2011 (*Volume II – Policies & Guidelines*) to align with adopted transportation policies related to development projects.

This revised Handbook replaces and updates the *Traffic Impact Analysis Handbook Volumes I and II* to align with the City’s *Transportation Analysis Policy* (Council Policy 5-1, 2018, amended 2022), *Transportation Demand Management Ordinance*, and *Envision San José 2040 General Plan*. The contents are organized as follows:

- Chapter 1: Introduction
- Chapter 2: Overview of Process and Procedures
- Chapter 3: Development Projects
- Chapter 4: Transportation Demand Management
- Chapter 5: Local Transportation Analysis
- Chapter 6: City Transportation Projects
- Chapter 7: General Plan Amendments
- Chapter 8: Contents of TA Report

### 1.3. CALIFORNIA ENVIRONMENTAL QUALITY ACT

The California Environmental Quality Act (CEQA) was enacted in 1970 to ensure environmental protection through review of discretionary actions approved by all public agencies. The California Natural Resources Agency adopted the statute, which is codified in the *Public Resources Code* Section 21000 et seq. The California Office of Planning and Research develops the CEQA Guidelines to interpret CEQA statute and published court decisions.

A TA conducted for a development project, a City transportation project, or a General Plan amendment identifies potential CEQA transportation impacts and mitigation which results in a public document used to inform decision makers and the public. Therefore, a TA should provide sufficient information to properly evaluate the impacts and the required project mitigation.

A TA is part of the environmental review process and must meet the requirements of CEQA. *San José Municipal Code Title 21- Environmental Clearance* incorporates and adopts the objectives, criteria, and procedures for environmental review contained in the *CEQA Public Resources Code* Section 21000 et seq. and the CEQA Guidelines codified at *Title 14 California Code of Regulations* Section 15000 et seq. Refer to the [California Natural Resources Agency website](#) for further information.

### 1.4. SENATE BILL 743

On September 27, 2013, Governor Jerry Brown signed Senate Bill (SB) 743 (Steinberg) into law and started a process that changes transportation impact analysis as part of CEQA compliance. SB 743 directs the California Office of Planning and Research (OPR) to establish new CEQA guidance for jurisdictions that removes automobile vehicle delay and other similar measures of vehicular capacity or traffic congestion from CEQA transportation analysis. Rather, vehicle-miles traveled (VMT), or other measures that “promote[s] the reduction of greenhouse gas emissions, the development of multimodal transportation networks, and a diversity of land uses,” shall be used as a basis for determining significant transportation impacts in California. The intent of the change is to appropriately balance the needs of congestion management with statewide goals related to infill development, the promotion of public health through active transportation, and the reduction of greenhouse gas emissions.

### 1.5. GENERAL PLAN GOALS AND POLICIES

In November 2011, the City Council adopted the *Envision San José 2040 General Plan* (General Plan) to guide future growth and development in San José. The General Plan aims to transform San José from a city built around personal motorized vehicles to one that prioritizes people and the public spaces where they live, work, and connect. The General Plan recognizes that access is a function of proximity and mobility and includes complementary strategies to improve both attributes.

#### *Proximity*

The General Plan provides a framework to transition from a segregated land use pattern, where the things that people need in their daily lives – housing, jobs, shops, services, childcare, schools, entertainment, recreation, etc. – are spread apart, to a more integrated land use pattern that clusters uses in the City’s Planned Growth Areas (PGAs). These PGAs are expected to accommodate more than



470,000 new residents and 380,000 additional jobs, as projected in the General Plan. PGAs include Downtown, Specific Plan Areas, Urban Villages, and Employment Priority Areas. PGAs are largely clustered around existing and planned transit.

Regionally, these goals aim to bring residents and jobs closer together. More employment opportunities in San José allow more people to work closer to home and avoid long, traffic-filled commutes to and from the traditional job centers in northern parts of Santa Clara County and along the San Francisco Peninsula.

### *Mobility*

The General Plan aims to build a more balanced and environmentally sustainable transportation system where 60 percent of commute trips made in San José are by walking, biking, transit, or carpool. To achieve this ambitious goal, the General Plan prioritizes better places to walk, connected bicycle facilities that are comfortable for people of all ages and abilities, and improved transit options, particularly in PGAs.

### *General Plan Policies*

The transportation needs of the City associated with land use changes, zoning changes, development projects, and/or transportation projects should be met through implementation of General Plan policies that foster the safe and efficient movement of people and goods. General Plan policies direct how these objectives should be met through the build-out of inter-connected, multimodal transportation networks. General Plan policies that call for transportation analysis and lead to implementation of the City's multi-modal vision include, but are not limited to, the following:

- Consider impacts on overall mobility and all travel modes when evaluating transportation impacts of new developments or infrastructure projects (TR-1.2);
- Through the entitlement process for new development, projects shall be required to fund or construct needed transportation improvements for all transportation modes, giving first consideration to improvement of biking, walking and transit facilities and services that encourage reduced vehicle travel demand (TR-1.4);
- Require new development where feasible to provide on-site facilities such as bicycle storage and showers, provide connections to existing and planned facilities, dedicate land to expand existing facilities or provide new facilities such as sidewalks and/or bicycle lanes/paths, or share in the cost of improvements (TR-2.8);
- Within new development, create and maintain a pedestrian-friendly environment by connecting the internal components with safe, convenient, accessible, and pleasant pedestrian facilities and by requiring pedestrian connections between building entrances, other site features, and adjacent public streets (CD-3.3);
- Create a pedestrian-friendly environment by connecting new residential development with safe, convenient, accessible, and pleasant pedestrian facilities. Provide such connections between new development, its adjoining neighborhood, transit access points, schools, parks, and nearby commercial areas (LU-9.1);
- Encourage all developers to install and maintain trails when new development occurs adjacent to a designated trail location. Use the City's Parkland Dedication Ordinance and Park Impact



Ordinance to have residential developers build trails when new residential development occurs adjacent to a designated trail location, consistent with other parkland priorities. Encourage developers or property owners to enter into formal agreements with the City to maintain trails adjacent to their properties (PR-8.5).

## 2. OVERVIEW OF PROCESS AND PROCEDURES

The Department of Public Works determines the need for a transportation analysis (TA) in conformance with the CEQA guidelines and City policies. For development projects (called “projects” for the remainder of this document unless otherwise noted), a TA report typically includes three types of analysis: (1) CEQA Transportation Analysis, (2) Transportation Demand Management (TDM) Plan; and (3) Local Transportation Analysis (LTA). Not all projects require each of the three types of analysis in a TA report. For example, projects not requiring a CEQA transportation analysis or a TDM Plan would typically include just an LTA in a TA report. Also, some small infill projects (defined in **Section 3.4** and **Section 4.2**) may not require a CEQA transportation analysis, a TDM Plan, or an LTA.

### 2.1. TRANSPORTATION ANALYSIS PROCESS

The TA process begins by accessing the [Public Works’ Development Services Permit Applications and Resources website](#). Applicants must submit a completed Application for Transportation Analysis Review, a completed TDM Checklist, a review fee deposit, and a draft Transportation Analysis work scope prepared by a licensed traffic engineer.

The TA process requires two separate fees: the work scope preparation fee and the TA review fee. Upon a transportation consultant’s submittal of a proposed work scope, a deposit is required and will be applied to the balance of the TA fees. Public Works will send the final work scope to the transportation consultant and an invoice to the applicant for the outstanding balance of the TA fees. Prior to the City’s review of the TA report, all fees must be paid. Refer to the [Permit Applications and Resources website](#) for updates to the submittal process and the current fee schedule.

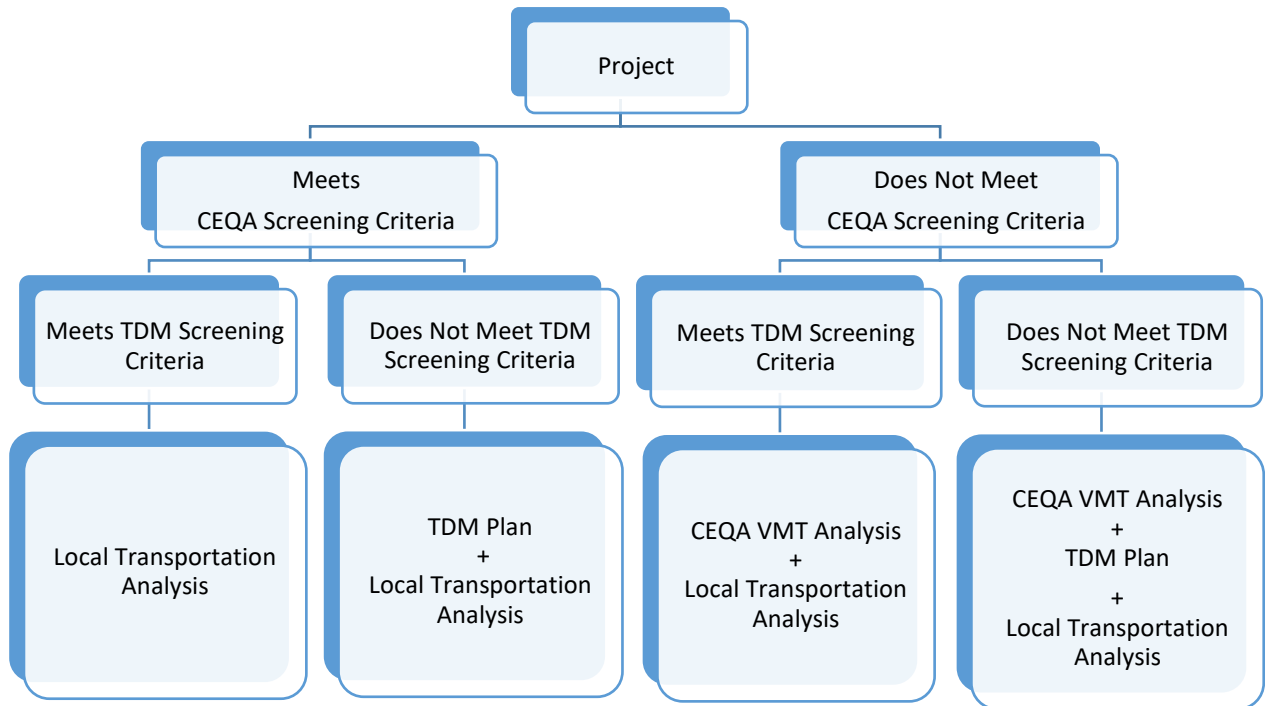
### 2.2. SCOPE OF WORK

**Figure 1** presents a framework as to when a CEQA transportation analysis, a TDM Plan, and/or LTA would generally be included in the scope of work for a TA. Public Works will ultimately determine the required type(s) of TA for a project during the TA scoping process.

Projects that meet the CEQA screening criteria will not require a CEQA Transportation Analysis. Projects that meet the TDM screening criteria will not require a TDM Plan. Projects that are screened out from CEQA transportation analysis or a TDM Plan would typically still require an LTA, except for some small infill projects.

Based on this framework, the transportation consultant shall submit an application for TA review, a TDM Plan application, and a proposed work scope to Public Works for review. The proposed work scope should document key project assumptions and a brief justification of those assumptions. Refer to the Public Works’ Applications website for guidelines for submitting a proposed work scope.

**Figure 1 Transportation Analysis Scoping Framework**



The [Public Works’ Development Services Transportation Analysis website](#) provides information required for the proposed work scope. Public Works will review the proposed work scope for completeness and consistency with relevant City policies and procedures. Upon completion of the proposed work scope review, Public Works will issue the final work scope to the transportation consultant, and provide the needed information and tools for completing the TA, which may include:

- Analytical Tools – Santa Clara Countywide VMT Evaluation Tool (<https://vmttool.vta.org/>), San José Travel Demand Forecasting Model, and/or input data for transportation analysis tools;
- Transportation Data – Existing intersection counts, Approved Trip Inventory (ATI), a list of funded transportation improvements for Background conditions (defined in **Section 5.2**);
- Maps – VMT heat maps for both the City and the regional Bay Area, VMT screening maps, and/or other relevant GIS-based maps;
- Reference Documents – City policies, plans, and/or guidelines.

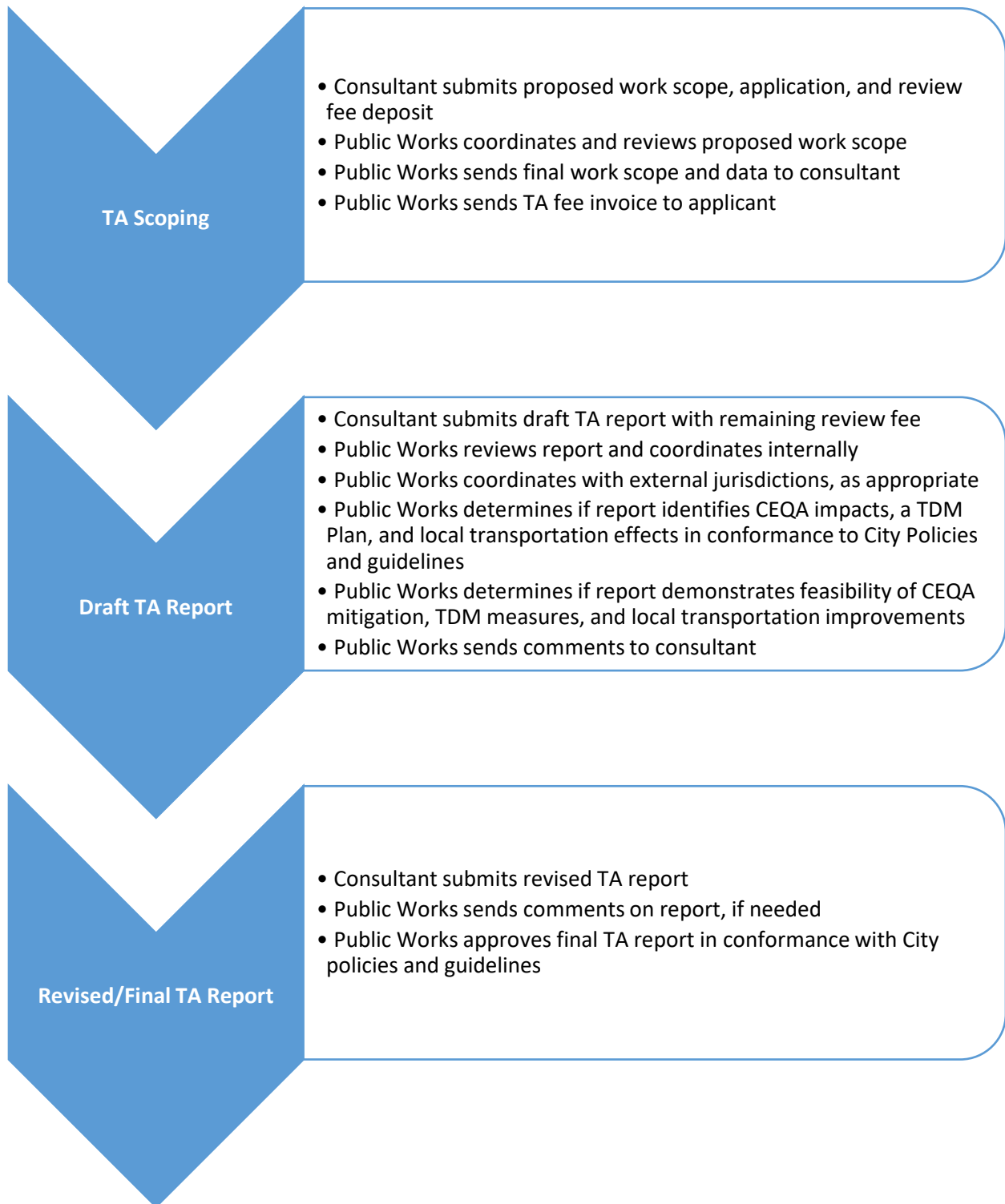
The transportation consultant must complete the transportation analysis in conformance with the final work scopes and submit draft TA reports, which include a combination of CEQA transportation analysis, a TDM Plan, and/or Local Transportation Analysis, to Public Works for approval.

## 2.3. TRANSPORTATION ANALYSIS REVIEW

Upon receipt of the draft TA report, Public Works will coordinate with Caltrans, the County of Santa Clara, the Santa Clara Valley Transportation Authority (VTA), and/or other cities for review, as appropriate. Public Works will provide comments on the draft report to be addressed in the final TA report. Upon approval by Public Works, the final TA report will be incorporated into to the CEQA document for the project. The transportation consultant shall submit one (1) final TA report to Public Works. **Figure 2** presents a flow chart of the TA review process.



**Figure 2 Transportation Analysis Process Overview**



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## 3. DEVELOPMENT PROJECTS

### 3.1. CEQA TRANSPORTATION ANALYSIS

CEQA transportation analysis requires an evaluation of a project’s potential impacts related to VMT and other significance criteria. This section provides the significance criteria, screening criteria, thresholds of significance, and methodologies of the analysis to be used in transportation analysis (TA) reports and CEQA documents for development projects. The City has adopted an evaluation tool to streamline the analysis for residential, office, and industrial projects (described in **Section 3.6**).

### 3.2. SIGNIFICANCE CRITERIA

In accordance with the California Natural Resources Agency and the Office of Planning and Research’s CEQA Guidelines<sup>1</sup>, a project could have a significant transportation impact on the environment if it:

- a) Conflicts with a plan, ordinance, or policy addressing the circulation system, including transit, roadways, bicycle lanes, and pedestrian paths;
- b) Conflicts or is inconsistent with CEQA Guidelines section 15064.2, subdivision (b)(1);
- c) Substantially increases hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment);
- d) Results in inadequate emergency access.

### 3.3. CEQA TRANSPORTATION PERFORMANCE METRICS

#### *Vehicle-Miles Traveled*

VMT is the total miles of travel by personal motorized vehicles a project is expected to generate in a day. VMT is calculated using the Origin-Destination VMT method, which measures the full distance of personal motorized vehicle-trips with one end within the project<sup>2</sup>.

#### *VMT per Capita (Residential)*

When assessing a residential project, the project’s VMT is divided by the number of residents expected to occupy the project to determine the VMT per capita of the project. Refer to **Section 3.6** and **Appendix B** for the City’s guidance for this assessment.

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<sup>1</sup> California Natural Resources Agency. (2018). *CEQA Guidelines Update*.

<sup>2</sup> The Origin-Destination VMT method used for a CEQA transportation analysis is different from the Boundary VMT method used for a General Plan Amendment long-range transportation analysis. Refer to **Section 6.1** for more information.

### *VMT per Employee (Office or Industrial)*

When assessing a general office or warehouse project, the project's VMT is divided by the number of employees expected to occupy the project to determine the VMT per employee of the project. Refer to **Section 3.6** and **Appendix B** for the City's guidance for this assessment.

VMT per capita and VMT per employee are each evaluated against its corresponding threshold of significance (defined in **Section 3.5**).

### *Net Change in Total VMT (Retail, Lodging, or Education)*

When assessing a shopping center, hotel, or private school project, the project's total VMT, as opposed to a per-capita or per-employee VMT metric, is measured. The total VMT for the region with and without the project is calculated. The difference between the two scenarios is the net change in total VMT that is attributable to the project. Refer to **Appendix B** for the City's guidance for this assessment.

## 3.4. SCREENING CRITERIA

A detailed CEQA transportation analysis would not be required if a project meets the City's screening criteria<sup>3</sup>. **Table 1** presents the screening criteria for projects that are expected to result in less-than-significant VMT impacts based on project description, characteristics, and/or location. If a component of a mixed-use project meets these screening criteria, only the component, not the entire project, would not require a detailed CEQA transportation analysis. When a project or component does not meet the screening criteria, refer to **Section 3.5**.

### *Small Infill Projects*

Projects of sufficiently small size (defined in **Table 1**) would not require a detailed CEQA transportation analysis. CEQA Guidelines Section 15303 states a categorical exemption for new construction or conversion of small structures, such as an existing office, of up to 10,000 square feet. An office project of this size typically generates the same number of daily trips – around 110 daily trips – as an industrial project of 30,000 square feet<sup>4</sup>. OPR suggests using these small infill screening thresholds for employment projects<sup>5</sup>.

The Council Policy 5-1 presumes that an addition of 15 single-family detached dwelling units, 25 attached dwelling units, 10,000 square feet of office gross floor area, or 30,000 square feet of industrial gross floor area, or less, does not result in significant VMT impacts and will further other City goals and policies. In no case should a small infill project be screened out if it is an increment of more than 10% of the gross floor area of a larger project or "site"<sup>6</sup>.

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<sup>3</sup> The screening criteria are consistent with the purposes described in Section 21099 of the California Public Resources Code and closely aligned with the recommended screening criteria provided in the OPR's 2017 Technical Advisory with expansions to cover other land uses.

<sup>4</sup> Based on vehicle-trip rates obtained from the *ITE Trip Generation Handbook*, 10<sup>th</sup> Edition.

<sup>5</sup> Office of Planning and Research. (2017). *Technical Advisory on Evaluating Transportation Impacts in CEQA*.

<sup>6</sup> Defined in Chapter 20.200 of the *San José Municipal Code*.

**Table 1 Screening Criteria for CEQA Transportation Analysis for Development Projects**

Project Type	Screening Criteria
<b>Small Infill Projects</b>	<ul style="list-style-type: none"> <li>• Office projects of 10,000 square feet of gross floor area or less;</li> <li>• Industrial projects of 30,000 square feet of gross floor area or less;</li> <li>• Single-family detached residential projects of 15 or fewer units;</li> <li>• Single-family attached or multi-family residential projects of 25 or fewer units;</li> <li>• Hotel or motel projects of 100 or fewer rooms</li> </ul>
<b>Local-Serving Retail</b>	<ul style="list-style-type: none"> <li>• Retail projects of 100,000 square feet of total gross floor area of less without drive-through <sup>(1)</sup></li> </ul>
<b>Local-Serving Public Facilities</b>	<ul style="list-style-type: none"> <li>• Branch library, community center, fire station, pumping station, park, police station, or public school projects</li> </ul>
<b>Office Projects or Components</b>	<ul style="list-style-type: none"> <li>• <b>Planned Growth Areas:</b> Located within a Planned Growth Area as defined in the Envision San José 2040 General Plan; <u>AND</u></li> <li>• <b>High-Quality Transit:</b> Located within ½ a mile of an existing major transit stop <sup>(2)</sup> or an existing stop along a high-quality transit corridor <sup>(3)</sup>; <u>AND</u></li> <li>• <b>Low VMT:</b> Located in an area in which the per-capita or per-employee VMT is less than or equal to the threshold of significance for the land use; <u>AND</u></li> <li>• <b>Transit-Supportive Project Density:</b> <ul style="list-style-type: none"> <li>○ Minimum Gross Floor Area Ratio (FAR) of 0.75 for office projects or components;</li> <li>○ If located in a General Plan Land Use Designation that has a maximum density below 0.75 FAR, the maximum density allowed in the General Plan Land Use Designation must be met; <u>AND</u></li> </ul> </li> <li>• <b>Active Transportation:</b> Not negatively impact transit, bike or pedestrian infrastructure <sup>(4)</sup></li> </ul>
<b>Residential Projects or Components</b>	<ul style="list-style-type: none"> <li>• <b>Planned Growth Areas:</b> Located within a Planned Growth Area as defined in the Envision San José 2040 General Plan; <u>AND</u></li> <li>• <b>High-Quality Transit:</b> Located within ½ a mile of an existing major transit stop <sup>(2)</sup> or an existing stop along a high-quality transit corridor <sup>(3)</sup>; <u>AND</u></li> <li>• <b>Transit-Supportive Project Density:</b> <ul style="list-style-type: none"> <li>○ Minimum of 35 units per acre for residential projects or components;</li> <li>○ If located in a General Plan Land Use Designation that has 35 units per acre, the maximum density allowed in the General Plan Land Use Designation must be met; <u>AND</u></li> </ul> </li> </ul>



	<ul style="list-style-type: none"> <li>• <b>Active Transportation:</b> Not negatively impact transit, bike or pedestrian infrastructure <sup>(4)</sup></li> </ul>
<p><b>Restricted Affordable Residential Projects or Components</b></p>	<ul style="list-style-type: none"> <li>• <b>Affordability:</b> 100% restricted affordable units <sup>(5)</sup>, excluding unrestricted manager units; affordability must extend for a minimum of 55 years for rental homes or 45 years for for-sale homes; <u>AND</u></li> <li>• <b>High Quality Transit:</b> Located within ½ a mile of an existing major transit stop <sup>(2)</sup> or an existing stop along a high-quality transit corridor <sup>(3)</sup>; <u>AND</u></li> <li>• <b>Transit-Supporting Project Density:</b> <ul style="list-style-type: none"> <li>○ Minimum of 35 units per acre for residential projects or components;</li> <li>○ If located in a General Plan Land Use Designation that has a maximum density below 35 units per acre, the maximum density allowed in the General Plan Land Use Designation must be met; <u>AND</u></li> </ul> </li> <li>• <b>Active Transportation:</b> Not negatively impact transit, bike or pedestrian infrastructure <sup>(4)</sup></li> </ul>

Notes:

- (1) Defined in the Council Policy 6-10, *Criteria for the Review of Drive-through Uses*.
- (2) Defined in the Pub. Resources Code § 21064.3 (“Major transit stop’ means a site containing an existing rail transit station, a ferry terminal served by either a bus or rail transit service, or the intersection of two or more major bus routes with a frequency of service interval of 15 minutes or less during the morning and afternoon peak commute periods”).
- (3) Defined in the Pub. Resources Code § 21155 (“For purposes of this section, a high-quality transit corridor means a corridor with fixed route bus service with service intervals no longer than 15 minutes during peak commute hours”).
- (4) Defined in Council Policy 5-1, Appendix A.
- (5) Defined in General Plan IP-5.12 as families earning 80 percent or less of the Area Median Income.

### *Local-Serving Retail Projects or Components*

New retail development typically redistributes existing shopping trips instead of creating new trips<sup>7</sup>. Local-serving retail projects may shorten vehicle-trips and reduce VMT by diverting existing trips from established local retail to the new local retail without measurably increasing trips outside of the local area. Regional-serving retail projects, conversely, can lead to longer vehicle-trips and may increase VMT.

The City has defined retail projects below 100,000 square feet as local-serving shopping centers and those above as regional shopping centers<sup>8</sup>. Therefore, it is presumed that retail projects or retail

<sup>7</sup> Lovejoy, et al. (2012). Measuring the impacts of local land-use policies on vehicle miles of travel: The case of the first big-box store in Davis, California. *The Journal of Transport and Land Use*.

<sup>8</sup> February 15, 2018 Memorandum to City Council, “City-initiated General Plan Text Amendment, New City Council Transportation Analysis 5-1, Amendment to City Council Policy Transportation Impact Policy 5-3, and Designation of Infill Opportunity Zones”, Appendix D.

components of mixed-use projects no larger than 100,000 square feet will have a less-than-significant VMT impact and will not require a detailed CEQA transportation analysis. This presumption, however, does not apply to projects of establishments with drive-through facilities due to the high personal motorized vehicle traffic.

### *Public Facilities*

Public facilities that are publicly-owned or controlled, such as branch libraries, community centers, fire stations, pumping stations, parks (defined in **Appendix A**), police stations, public schools, or other public utilities, etc., are located within established communities and serve local needs. These services improve people's proximity to recreational, community, and other necessary community needs. Private schools are not included in this category. If a public facility is determined to be local serving, the project would not require a detailed CEQA transportation analysis.

### *Office Projects in Planned Growth Areas with Low VMT and High-Quality Transit*

Office projects located in PGAs with low VMT near high-quality transit that incorporate transit-supporting features (i.e., the 7Ds: density, diversity of uses, distance to multimodal facilities, design, destination accessibility, demographics, and development scale) will result in low VMT. **Figure 5** shows the CEQA transportation screening maps<sup>9</sup> for office projects. These maps illustrate areas that meet the geographic elements of the screening criteria (i.e., located in PGAs, with low VMT, and near high-quality transit).

These maps are used to identify office projects that may not require a detailed CEQA transportation analysis. For mixed-use projects that include office components, these maps should be used to evaluate each relevant component of the project. If an office project is located in a highlighted area in **Figure 5** and meets the other screening criteria specified in **Table 1** (i.e., transit-supporting project density and active transportation), then the project would not need to conduct a detailed CEQA transportation analysis.

### *Residential Projects in Planned Growth Areas with High-Quality Transit*

Market-rate or mixed-income residential projects located in PGAs near high-quality transit that incorporate transit-supporting features (i.e., the 7Ds: density, diversity of uses, distance to multimodal facilities, design, destination accessibility, demographics, and development scale) will result in low VMT. **Figure 3** shows the CEQA transportation screening maps<sup>9</sup> for residential projects. These maps illustrate areas that meet the geographic elements of the screening criteria (i.e., located in PGAs and near high-quality transit).

These maps are used to identify residential projects that may not require a detailed CEQA transportation analysis. For mixed-use projects that include residential components, these maps should be used to evaluate each relevant component of the project. If a residential project is located in a highlighted area in **Figure 3** and meets the other screening criteria specified in **Table 1** (i.e., transit-supportive project density and active transportation), then the project would not need to conduct a detailed CEQA transportation analysis.

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<sup>9</sup> Based on outputs generated produced from the *San José Travel Demand Forecasting Model*, updated 2021.

### *Affordable Residential Projects with High-Quality Transit*

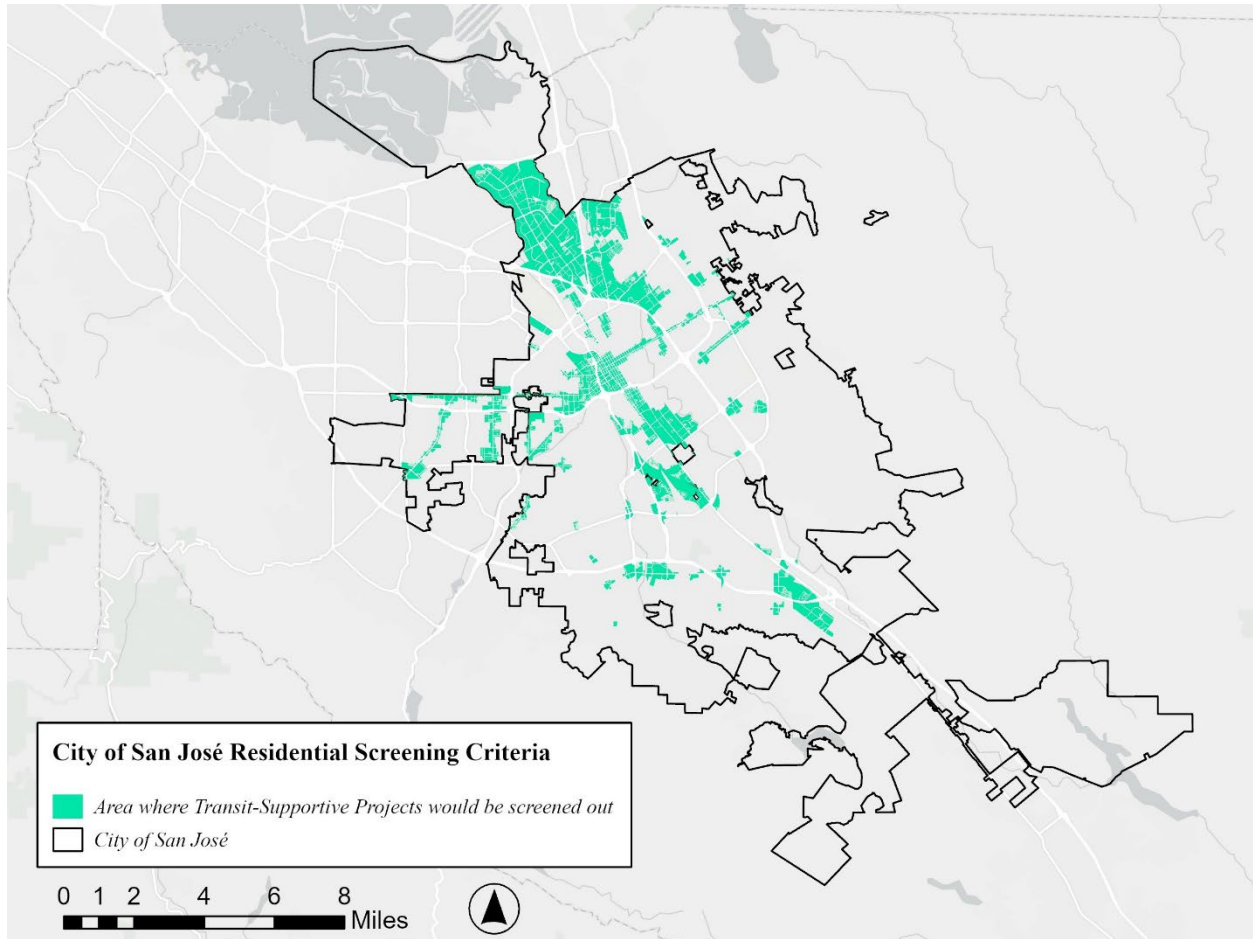
Deed-restricted affordable housing, defined as developments that are 100 percent affordable for low-income families<sup>10</sup>, correlate with reductions in VMT compared with market-rate housing. This correlation is particularly evident in affordable residential projects near transit<sup>11</sup>. **Figure 4** is the CEQA transportation screening map for affordable housing projects. This map illustrates areas near high-quality transit or with low VMT. One-hundred percent deed-restricted affordable housing projects that are located in a highlighted area in **Figure 4** and meets the other screening criteria specified in **Table 1** (i.e., transit-supportive project density and active transportation) would be screened from a detailed CEQA transportation analysis.

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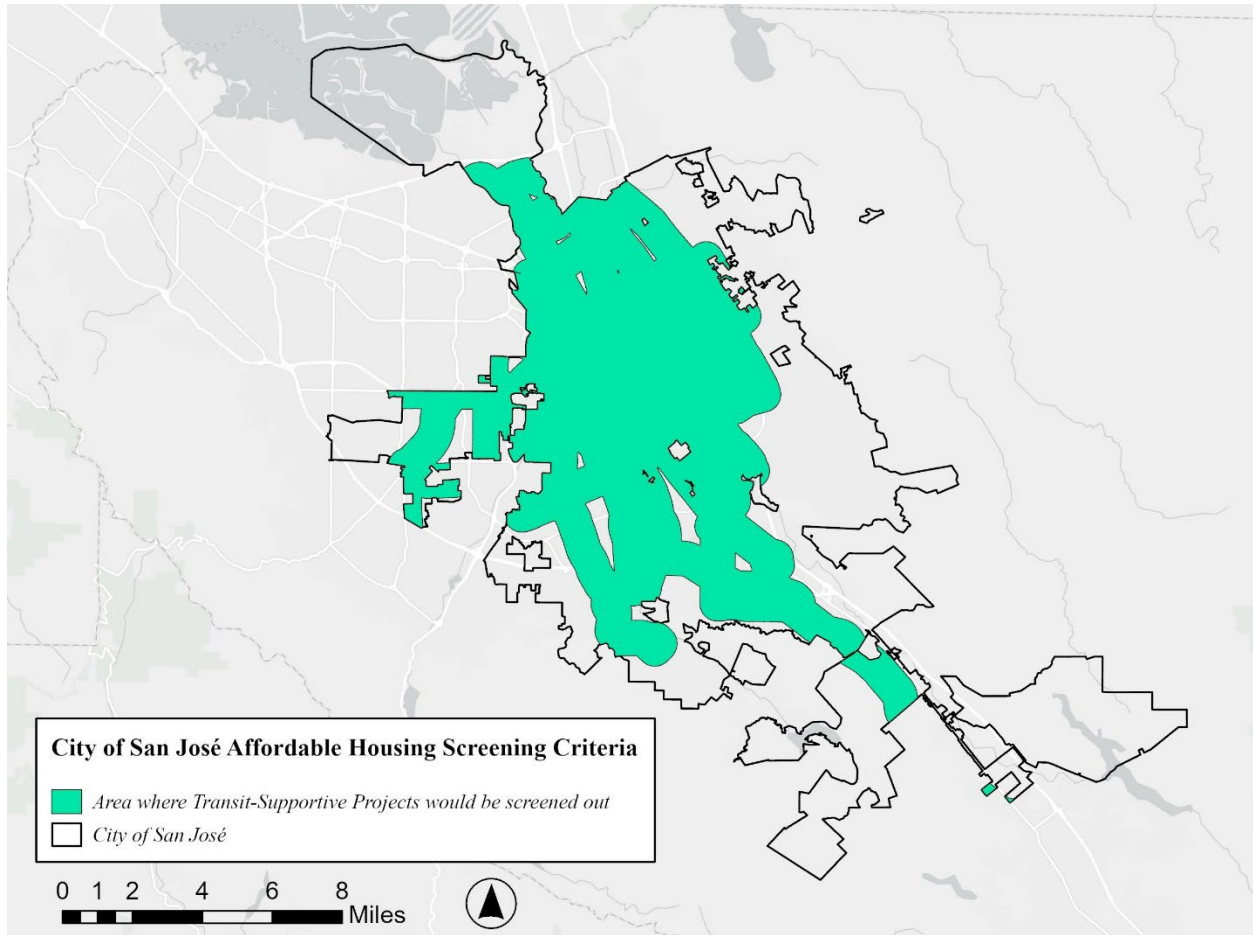
<sup>10</sup> Defined in General Plan IP-5.12 as families earning 80 percent or less of the Area Median Income. Affordability restrictions must be recorded and extend for a minimum of 55 years for rental homes or 45 years for for-sale homes.

<sup>11</sup> Newmark & Hass. (2015). *Income, Location Efficiency, and VMT: Affordable Housing as a Climate Strategy*. The California Housing Partnership.

**Figure 3** CEQA Transportation Map for Residential Projects (April 2023)

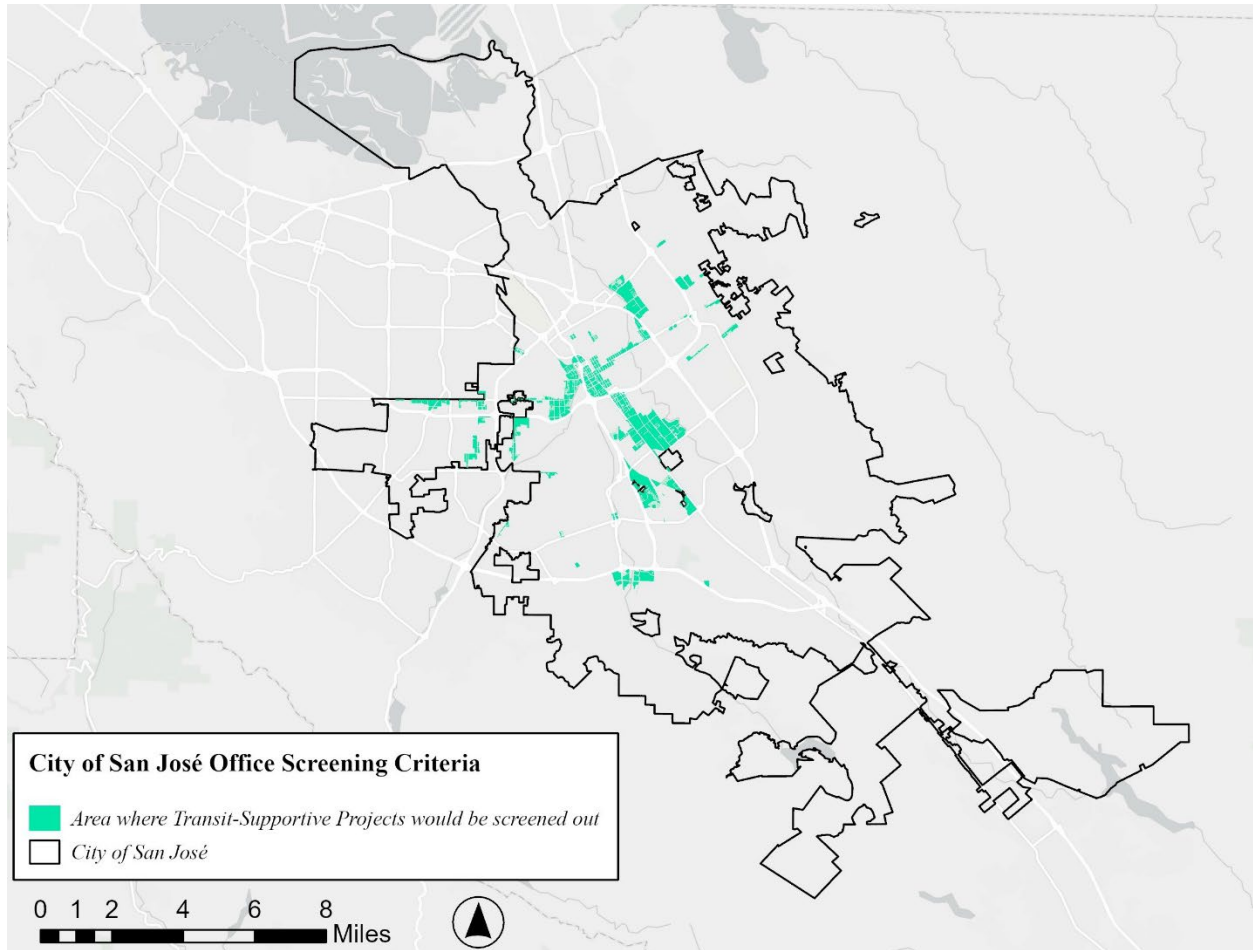


**Figure 4** CEQA Transportation Screening Map for Affordable Residential Projects (April 2023)





**Figure 5** CEQA Transportation Screening Map for Office Projects (April 2023)



### 3.5. THRESHOLDS OF SIGNIFICANCE

When a project does not meet the screening criteria described in **Section 3.4**, a detailed CEQA transportation analysis will be required. This analysis is used to evaluate a project’s VMT generation against the appropriate thresholds of significance. **Table 2** presents the thresholds of significance for development projects, as established in the Council Policy 5-1.

**Table 2      Thresholds of Significance for Development Projects (April 2023)**

Project Type	Significance Criteria	Current Level	Threshold
<b>Residential</b>	Project VMT per capita greater than (1) 15 percent below the existing citywide average VMT per capita <u>OR</u> (2) 15 percent below the existing regional average VMT per capita, whichever is lower	13.40 VMT per capita (Citywide Average)	11.39 VMT per capita
<b>Office, Research &amp; Development, Assisted Living</b>	Project VMT per employee greater than 15 percent below existing regional average VMT per employee	16.53 VMT per employee (Regional Average)	14.05 VMT per employee
<b>Industrial, Mini Storage</b>	Project VMT per employee greater than existing regional average VMT per employee	16.53 VMT per employee (Regional Average)	16.53 VMT per employee
<b>Retail, Lodging, Education</b>	Net increase in existing regional total VMT	Regional Total VMT	Net Increase
<b>Public/Quasi-Public</b>	In accordance with the most appropriate type(s) as determined by Public Works Director	Appropriate levels listed above	Appropriate thresholds listed above
<b>Mixed Uses</b>	Evaluate each land use component of a mixed-use project independently and apply the threshold of significance for each land use type included	Appropriate levels listed above	Appropriate thresholds listed above
<b>Change of Use/Additions to Existing Development</b>	Evaluate the full site with the change of use or additions to existing development and apply the threshold of significance for each project type included	Appropriate levels listed above	Appropriate thresholds listed above
<b>Urban Village Plans, Station Area Plans, Specific Plans, Development Policies, Other Area Plans</b>	Evaluate each land use component of the area plan independently and apply the threshold of significance for each land use type included	Appropriate levels listed above	Appropriate thresholds listed above

These thresholds of significance may change over time as local and regional VMT and greenhouse gas emissions goals shift in response to changes in population, air quality, and transportation patterns. Therefore, the City will revisit the current VMT levels at least once every four years, at the time of the General Plan four-year reviews, and/or when major changes to the City’s land uses and transportation network occur. The thresholds of significance may be updated as needed.

### 3.6. PROJECT IMPACT ANALYSIS

Most projects that require a detailed CEQA transportation analysis will use one of the two methods for assessing a project’s VMT generation (Project VMT), if applicable: (1) Santa Clara Countywide VMT Evaluation Tool and (2) San José Travel Demand Forecasting Model.

#### *Santa Clara Countywide VMT Evaluation Tool*

The City has adopted the Santa Clara Countywide VMT Evaluation Tool (“VMT tool”) to assess a project’s potential VMT based on the project’s description, location, and attributes<sup>12</sup>. For most residential, office, and industrial projects, the VMT tool is the approved method to calculate Project VMT. Available at <https://vmttool.vta.org/>, the VMT tool is provided for use by transportation consultants, developers, and others in assessing VMT for development projects. The tool will be periodically updated by the VTA in collaboration with the City Department of Transportation as new research on VMT reduction measures becomes available or as circumstances change.

#### Step 1 – Obtain Existing VMT

Once a user inputs the Assessor’s Parcel Number (APN) of a project or locates the project on an interactive map, the VMT tool would retrieve from a built-in database the average VMT per capita and VMT per employee for existing buildings within the ½-mile buffer of the project (Existing VMT). In other words, Existing VMT is the current VMT generation for existing buildings in the area and is a base point for calculating Project VMT.

The Existing VMT database used in the VMT tool was obtained from the San José Travel Demand Forecasting Model. The model draws on geographic data to identify representative per-capita VMT within each Transportation Analysis Zone (TAZ) for residents and employees.

#### Step 2 – Calculate Project VMT

Using Existing VMT as the base point, the VMT tool calculates Project VMT through an evaluation of project description and the proposed VMT reduction measures. Projects located in areas where Existing VMT is above the established threshold are referred to as being in “high-VMT areas”. Projects in high-VMT areas are required to include a set of VMT reduction measures that would reduce Project VMT to the extent possible.

The VMT tool evaluates a list of selected VMT reduction measures that can be applied to a project to reduce Project VMT. There are four categories of measures whose effects on VMT can be calculated in the tool: (1) project characteristics, (2) multimodal network improvements, (3) parking, and (4)

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<sup>12</sup> The Santa Clara Countywide VMT Evaluation Tool was developed by the VTA and Fehr & Peers in 2019. Subsequent updates were made in 2020 and 2023.

programmatic TDM. The first three categories of measures – project characteristics, multimodal network improvements and parking – are physical design measures that can be incorporated into the project description. **Appendix C** shows the list of potential VMT reduction measures under the three physical design categories and their general descriptions.

If Project VMT still exceeds the threshold of significance after a combination of project characteristics, multimodal network improvements, and parking measures are included in the project description, the fourth category, programmatic TDM, should be considered. Programmatic TDM measures aim to reduce VMT by decreasing personal motorized vehicle mode share and by encouraging more walking, biking, and riding transit (referred to as “alternative transportation modes” throughout the document). **Appendix C** show the list of VMT-reducing programmatic TDM measures and their general descriptions. Programmatic TDM measures will be enforced through the annual compliance and monitoring requirements described in **Section 3.8**.

Projects in high-VMT areas are required to propose a list of VMT reduction measures and document the associated percent reduction in VMT. Project VMT is calculated by applying the percent reduction to Existing VMT. Project VMT is then compared to the threshold of significance to evaluate the project’s CEQA transportation impact. These calculations are automated in the VMT tool. The selected TDM reduction measures are also eligible for meeting the TDM Program requirements (Refer to **Section 4.4**).

#### *San José Travel Demand Forecasting Model*

For non-residential or non-office projects, very large projects, or projects that can potentially shift travel patterns, the VMT tool would not be appropriate or adequate for the CEQA transportation analysis. In such cases, the San José Travel Demand Model may be required based on a preliminary review of the project. For projects requiring model runs, the transportation consultant will coordinate with Public Works in the scoping process to obtain modeling information.

There may be projects for which neither the VMT tool nor the San José Travel Demand Forecasting Model is appropriate for the VMT analysis. In such cases, the transportation consultant should work with Public Works to determine the appropriate methodology for the analysis.

### 3.7. VMT REDUCTION AND MITIGATION MEASURES

Projects must propose measures to reduce Project VMT or mitigate a CEQA transportation impact. As explained in **Section 3.6**, projects must select a combination of VMT reduction measures from four (4) categories:

- Project Characteristics
- Multimodal Network Improvements
- Parking
- Programmatic TDM.

**Appendix C** provides more detailed descriptions for each mitigation measure in the VMT tool, including the scope, applicable project types, and the essential nexus between the mitigation measure and the reduction of Project VMT.

When the selected measures are included during the planning and design stages as part of the project description, the measures are reflected in the assessment of Project VMT. When Project VMT exceeds the threshold(s) of significance, the project will need to mitigate its CEQA transportation impact. VMT reduction measures from the four categories can be used as CEQA mitigation measures.

A project may propose CEQA mitigation measures that are not included in the list of approved VMT reduction measures as described in **Table 3**. In order to be considered as mitigation measures, the transportation consultant must submit substantial evidence of their effect on reducing Project VMT or mitigating a CEQA transportation impact for review and approval by the Director of Public Works.

### 3.8. MITIGATION MEASURES COMPLIANCE AND MONITORING

Projects including CEQA VMT mitigation measures as Conditions of Approval are required to implement the mitigation measures for the life of the projects and fulfill ongoing compliance and monitoring requirements. Prior to issuance of any use permit and/or Certificate of Occupancy, projects must execute and record a Covenant and Agreement that the mitigation measures as stated in the project's Conditions of Approval and Environmental Impact Report (EIR) have been provided and will be maintained throughout the life of the project. This is to ensure that, as a property is sold or users change, there is a clear record attached to the property that documents the ongoing requirement to abide by the Conditions of Approval.

#### *Mitigation Measures Confirmation*

A project's Conditions of Approval and EIR must clearly outline a list of physical measure(s) (i.e., measures from the categories of project characteristics, multimodal network improvements, and parking) and programmatic TDM measure(s) that the project is required to provide. The developer must ensure that the physical measure(s) are included in the construction of the project, and that the programmatic measure(s) outlined as the project's CEQA mitigation measures are implemented as required.

City staff will review building plans and perform an inspection prior to the issuance of building permits and encroachment permits. This is to ensure that the physical measure(s) have been installed or incorporated in the project's construction. The project must also provide documentation about the setup of the programmatic measures. Once the City confirm the project's compliance with CEQA VMT mitigation requirements per the Conditions of Approval, the City will communicate its approval to facilitate issuance of an initial Certificate of Occupancy.

#### *Annual TDM Compliance Form*

Projects that are required to provide at least one (1) programmatic TDM measure as their CEQA mitigation measure(s) are subject to annual compliance. After the project is occupied, it is required to verify that its programmatic TDM measure(s) continue to be implemented for as long as the project maintains a Certificate of Occupancy. Every year, the project must submit a completed TDM Compliance Form and associated administrative fees to the City Department of Transportation. A TDM Compliance Form must include a summary of the following information about the project:

- **Project Size:** For residential, provide the number of for-sale/rental, market-rate/affordable, on-site/off-site units and the number of bundled/unbundled/shared parking spaces. For commercial office/retail, provide the number of businesses and total gross square feet of office/retail space and the number of free/priced/shared parking spaces.
- **Point of Contact:** Provide the property address, the name of the property owner/association, and the contact person's name and information
- **Documentation of Existing TDM Measures:** Report all ongoing programmatic TDM measure(s), proof of implementation, and any changes from the original plan or past years.

The first submission of the TDM Compliance Form is due within 30 calendar days of the 18-month anniversary of the issuance of the initial Certificate of Occupancy. Subsequent annual submissions are also due within 30 calendar days of that date. Upon five consecutive years of satisfactory submittals of the TDM Compliance Forms, the submittal requirement shifts to every three years. If, at any time, a project fails to demonstrate satisfactory compliance, this relaxed timeline will revert to the annual submittal schedule until the project again demonstrates five consecutive years of satisfactory compliance.

### *Annual TDM Monitoring Report*

Besides annual compliance (see above), large projects (or large components of mixed-use projects) that are required to provide at least one programmatic TDM measure as their CEQA mitigation measure(s) are also subject to annual monitoring. Refer to **Table 15** in **Section 4.6** for the definition of “large projects” as it pertains to the annual monitoring requirements. Every year, these projects must submit a completed TDM Monitoring Report and associated administrative fees to the City Department of Transportation. A TDM Monitoring Report must include three (3) components – the project's mode share, the project's trip cap (CEQA), and the evaluation of the project's TDM Plan.

### Project Mode Share (TDM Program, Section 4.6)

For residential, office, and retail projects, their drive-alone mode share target is 25% below the drive-alone mode share of trips generated by the surrounding neighborhood before the project was occupied. For example, if 80% of work trips generated by the surrounding (pre-project) were made in a single-occupant vehicle, the office project's drive-alone mode share target would be  $80\% * (1 - 25\%) = 60\%$ . For industrial projects, the work trip drive-alone mode share target is 5% below that of other work trips in the surrounding (pre-project). The TDM Monitoring Report must compare the project's drive-alone mode share with that of the surrounding neighborhood to inform the effectiveness of the project's TDM Plan.

Projects must conduct **Building Occupant/Tenant Travel Annual Surveys** with project residents and/or employees using the City's template. Travel surveys include questions pertaining to trip purposes, travel mode choice, travel time, subscriptions to TDM measures, etc. Intercept surveys must be conducted with at least 33% of the project's households and/or employees. Survey data are used to estimate the drive-alone mode share of trips generated by the project. The project's estimated drive-alone mode share is then compared with that of the surrounding neighborhood (defined as the census tract in which the project is located) before the project was occupied. City staff will provide the drive-alone mode share of the pre-project surrounding neighborhood, estimated from the City's probe data. City staff will also provide the City's template with instructions for conducting travel surveys.



### Project Trip Cap (Mitigation Monitoring Reporting Program)

If the project proposes to include at least one programmatic TDM measure in the project description or as mitigation measures to address its CEQA transportation impacts, the project must demonstrate that its VMT is below the relevant thresholds after the opening day. A trip cap, defined as the maximum number of personal motorized vehicle trips that are allowed to be generated by a project on an average weekday, is a proxy for the City's VMT thresholds. A project's trip cap is set at the project's vehicle trip generation per the Intersection Operations Analysis (Refer to **Section 5.7** for the City's methodology of performing a vehicle trip generation analysis). The trip cap will be included in the project's planning permit and/or the Mitigation Monitoring and Reporting Program (MMRP) in perpetuity.

Projects must conduct **Driveway Traffic Counts** at all project entrances and exits. Driveway counts should be conducted on at least three (3) non-holiday weekdays. Driveway counts are used to estimate the project's vehicle trips. The project's estimated vehicle trips will be compared with the project's trip cap. City staff will provide the City's template with instructions for conducting driveway traffic counts.

### Evaluation of TDM Plan

If the TDM Monitoring Report finds that the project does not meet the mode share target and the trip cap as indicated in the TDM Plan, the project is required to work with the City to evaluate how the project has been implementing existing measures, identify more effective ways to implement the existing measures, and recommend changes to the project's TDM Plan for the upcoming year as needed. For example, some existing programmatic measure(s) may be replaced with new measures to test their effectiveness in advancing the project's progress toward its mode share target and trip cap.

The first submission of the TDM Monitoring Report is due within 30 calendar days of the 18-month anniversary of the issuance of the initial Certificate of Occupancy. Subsequent annual submissions are also due within 30 calendar days of that date. Upon five (5) consecutive years of satisfactory submittals of the TDM Monitoring Reports, the submittal requirement shifts to every three (3) years. If, at any time, a project fails to demonstrate satisfactory monitoring, this relaxed timeline will revert to the annual submittal schedule until the project again demonstrates five (5) consecutive years of satisfactory monitoring.

### *Non-Compliance*

A project that fails to demonstrate satisfactory annual compliance or monitoring requirements are found to be not in compliance. In such cases, the project must submit a follow-up report that demonstrates compliance within a grace period, which typically does not exceed six (6) months from the date when the non-compliance status was determined. Penalties will be assessed by the City if the project is still not able to meet compliance or monitoring requirements by the end of the grace period. The City of San José shall withhold issuance of building, grading, demolition, foundation, use of land, and change of use permits, and issuance of Certificates of Occupancy, for any properties that fail to comply with MMRP and the TDM Program. All collected penalties will be used for the City's administrative costs related to the TDM Program.

### 3.9. CUMULATIVE IMPACT ANALYSIS

Projects must demonstrate consistency with the *Envision San José 2040 General Plan* to address cumulative impacts. Factors that contribute to a determination of General Plan consistency include a project’s density, design, and conformance to the General Plan goals and policies. If a project is consistent with the General Plan, it will be considered as part of the cumulative solution to meet the General Plan’s long-range transportation goals, and therefore will result in a less-than-significant cumulative impact.

If a project is determined to be inconsistent with the General Plan, a cumulative impact analysis will be required as part of the General Plan amendment to determine the project’s cumulative effect on the regional air quality and greenhouse gas emissions targets and other performance metrics of the General Plan. Refer to **Section 7** for more information.



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## 4. TRANSPORTATION DEMAND MANAGEMENT

As part of their initial application, all development project applicants are required to submit a completed [Application for Transportation Analysis Review](#), a completed Transportation Demand Management (TDM) Checklist, a review fee deposit, and a draft Transportation Analysis work scope. The TDM Checklist must indicate if their project meets the TDM screening criteria and is therefore exempted from the City's TDM Program (**Section 4.2**). If the project is subject to the City's TDM Program, the TDM Checklist must also include a list of TDM measures they intend to include as part of their project to meet the requirements pursuant to the City's TDM Ordinance in [Chapter 20.90](#) of the Zoning Code. The TDM Checklist can be completed by the applicants or a licensed traffic engineer.

The Department of Transportation then reviews the TDM Checklist and determines the need for the project to submit a draft Transportation Demand Management (TDM) Plan as part of their Transportation Analysis Report. A TDM Plan builds on the TDM Checklist and provides implementation details about the selected TDM measures in the checklist. During the TA scoping, City staff would provide guidance on what implementation details should be included in the draft TDM Plan. Upon approval by Department of Transportation, the final TDM Plan will be incorporated into the project's conditions of approval.

### 4.1 TRANSPORTATION DEMAND MANAGEMENT PROGRAM

The City's Transportation Demand Management (TDM) Program establishes a framework for new development projects to provide alternative mobility options that residents, employees, and visitors can rely on. The goals of the TDM Program are to:

1. Increase sustainable travel options for population of new projects and surrounding neighborhoods;
2. Monitor projects' progress toward advancing the City's vehicle miles traveled (VMT) reduction goals; and
3. Streamline the Transportation Analysis (TA) process for projects.

The TDM Program requires a project applicant to work with the City to develop a TDM Plan. The project will be responsible for implementing measures identified in the TDM Plan to reduce the number of vehicle trips generated by the project and advance the goals above. This section provides the screening criteria, TDM Point Targets, menu of TDM measures, and monitoring and compliance requirements to be used during the development and implementation of a project's TDM Plan.

### 4.2 SCREENING CRITERIA

A TDM Plan is required unless a project meets the City's screening criteria shown in **Table 3**. If a component of a mixed-use project meets these screening criteria, a TDM Plan is not required for that component of the project. For example, a mixed-use project of 100 units of multi-family market-rate housing and 5,000 square feet of ground floor retail is required to submit a TDM Plan for the 100 housing units, but not the 5,000 square feet of retail.

**Table 3 Screening Criteria for the City’s TDM Program for Development Projects**

Project Type	Screening Criteria
<b>Small Infill Projects</b>	<ul style="list-style-type: none"> <li>• Office projects of 10,000 square feet of gross floor area or less;</li> <li>• Industrial projects of 30,000 square feet of gross floor area or less;</li> <li>• Single-family detached residential projects of 15 or fewer units;</li> <li>• Single-family attached or multi-family residential projects of 25 or fewer units;</li> <li>• Hotel or motel projects of 100 or fewer rooms</li> </ul>
<b>Local-Serving Retail</b>	<ul style="list-style-type: none"> <li>• Retail projects of 100,000 square feet of total gross floor area or less without drive-through operations <sup>(1)</sup></li> </ul>
<b>Education</b>	<ul style="list-style-type: none"> <li>• Charter or private school projects of fewer than 250 students</li> </ul>
<b>Local-Serving Public Facilities</b>	<ul style="list-style-type: none"> <li>• Branch library, community center, fire station, pumping station, park, police station, or public school projects</li> </ul>
<b>Restricted Affordable Residential Projects or Components</b>	<ul style="list-style-type: none"> <li>• <b>Affordability:</b> 100% affordable units <sup>(2)</sup>, excluding unrestricted manager units; affordability must extend for a minimum of 55 years for rental homes or 45 years for for-sale homes; <u>AND</u></li> <li>• <b>High Quality Transit:</b> Located within ½ a mile of an existing major transit stop <sup>(3)</sup> or an existing stop along a high-quality transit corridor <sup>(4)</sup>; <u>AND</u></li> <li>• <b>Transit-Supporting Project Density:</b> <ul style="list-style-type: none"> <li>○ Minimum of 35 units per acre for residential projects or components;</li> <li>○ If located in a General Plan Land Use Designation that has a maximum density below 35 units per acre, the maximum density allowed in the General Plan Land Use Designation must be met</li> </ul> </li> </ul>

Notes:

- (1) Defined in the Council Policy 6-10, *Criteria for the Review of Drive-through Uses*.
- (2) Defined in General Plan IP-5.12 as families earning 80 percent or less of the Area Median Income.
- (3) Defined in the Pub. Resources Code § 21064.3 (“Major transit stop’ means a site containing an existing rail transit station, a ferry terminal served by either a bus or rail transit service, or the intersection of two or more major bus routes with a frequency of service interval of 15 minutes or less during the morning and afternoon peak commute periods”).
- (4) Defined in the Pub. Resources Code § 21155 (“For purposes of this section, a high-quality transit corridor means a corridor with fixed route bus service with service intervals no longer than 15 minutes during peak commute hours”).

### 4.3 TDM POINT TARGETS

A project’s TDM requirement is defined as a TDM Point Target, to be met by committing to a package of TDM measures. For a mixed-use project, a TDM Point Target is defined for each component of the project. TDM Point Targets are determined based on the land use category of the Project and/or the components.

Title 20.90.060 of the San José Municipal Code categorizes land uses into four categories – “Home-End Uses”, “Commute-End Uses”, “Visit-End Uses”, and “Other Uses”. The categories are based on the type of travel and/or parking demand each respective use generates, and the type(s) of TDM measures most effective in reducing vehicle trip demand. **Table 4** shows the TDM point target for projects within each category.

- **Home-End Uses** are uses whose parking demand and VMT are largely determined by vehicle ownership rates and use frequency among the residents of these uses. TDM measures for these uses focus on reducing automobile ownership rates among Project’s residents.
- **Commute-End Uses** are uses whose parking demand and VMT is largely determined by the volume of commuters driving to jobs generated by these uses. TDM measures for these uses focus on reducing drive-alone commuting to, and automobile parking demand at, a Project.
- **Visit-End Uses** are uses whose parking demand and VMT are largely determined by the volume of visitors driving to access goods, services, and social connection provided through these uses. TDM measures for these uses focus on increasing non-drive-alone visitor access to a Project.
- **Other Uses** are uses that typically generate moderate or minimal parking demand for personal vehicles and/or are typically minimally responsive to TDM measures.

The TDM Point Target was developed to offer flexibility to developers. A project will be required to satisfy the TDM Point Target associated with the land use category for each component of the project. For example, a mixed-use project of residential and commercial retail uses is required to satisfy 25 TDM Points for its residential use and another 25 TDM Points for its commercial retail use.

**Table 4 TDM Point Target for Development Projects by Land Use Category**

Land Use Category <sup>(1)</sup>	Point Target
Home-End Uses	25 Points
Commute-End Uses	25 Points
Visit-End Uses	25 Points
Other Uses	5 Points

Notes:

(1) Defined in *San José Municipal Code, Title 20.90.060, Table 20-190 Bicycle Parking Spaces Required by Land Use and TDM Land Use Categorization.*

### 4.4 MENU OF TDM MEASURES

The City maintains a menu of TDM measures that can be credited toward the TDM Point Target, with the possible point values listed for each. Project applicants will work with the City to select from the

menu a number of TDM measures that would satisfy their TDM Point Target. **Table 5** shows the point values, or point-value ranges, for each TDM measure in the menu.

The City’s menu of TDM measures is organized into four (4) categories of measures:

- Project Characteristics
- Multimodal Network Improvements
- Parking
- Programmatic TDM

The first three categories – project characteristics, multimodal network improvements and parking – focus on physical improvements that can be incorporated into the project description. The fourth category, programmatic TDM measures, are primarily incentives and Mobility-as-a-Service (MaaS) programs for encouraging walking, biking, scootering, shared rides, and taking public transit.

**Table 5** also indicates which TDM measures may be counted toward TDM Point Target requirements (“TDM”), based on the land use category of the Project or its component. Not all TDM measures listed in the menu apply to each land use category. For example, the TDM measures that may be counted toward the TDM Point Target for projects belonging to the “Other Uses” focus only on physical infrastructure improvements as opposed to programmatic measures. As another example, parking cash-out is a programmatic measure that is not applicable to Home-End Uses.

**Table 5 Menu of TDM Measures and Applicability**

Category	Measure [ID]	TDM Point Values			
		Home-End Uses	Commute-End Uses	Visit-End Uses	Other Uses
<b>Project Characteristics</b>	[PC03] Provide Affordable Housing	1 – 4	-	-	-
<b>Multimodal Network Improvements</b>	[MI01] Provide Bike and Micro-mobility Network Improvements	1 – 4	1 – 4	1 – 4	1 – 4
	[MI03] Provide Transit Network Improvements	1 – 4	1 – 4	1 – 4	1 – 4
	[MI04] Provide Residential Street Improvements	1 – 4	1 – 4	1 – 4	1 – 4
	[MI05] Provide Pedestrian Network Improvements	1 – 4	1 – 4	1 – 4	1 – 4
<b>Parking</b>	[PK01] Right-size Parking Supply	1 – 20	1 – 20	1 – 20	-
	[PK02] Provide Bike Parking Facilities	1 – 2	1 – 2	1 – 2	-
	[PK03] Provide Shared Parking	1 – 2	1 – 2	1 – 2	-

<b>Programmatic TDM</b>	[TP01] Provide School Pool Programs	1	-	-	-
	[TP02] Provide Bike Share Stations	1 – 2	1 – 2	1 – 2	-
	[TP03] Provide Car Share Station	1 – 4	1 – 4	1 – 4	-
	[TP04] Provide Education, Marketing, and Outreach	1 – 2	1 – 2	-	-
	[TP05] Join a Transportation Management Association (TMA)	See note <sup>(1)</sup>	See note <sup>(1)</sup>	See note <sup>(1)</sup>	-
	[TP06] Provide Parking Cash-out	-	2	-	2
	[TP07] Provide Transit Subsidies	1 – 8	1 – 8	1 – 8	1 – 8
	[TP08] Provide Flexible Work Schedules	-	1 – 4	-	-
	[TP09] Provide Private Shuttle/ Transit Service	4 – 8	4 – 8	4 – 8	-
	[TP10] Price Workplace Parking	-	2	1	-
	[TP11] Provide Alternative Transportation Benefits	1 – 8	1 – 8	1 – 8	1 – 8
	[TP12] Provide a Neighborhood School	2	-	-	-
	[TP13] Provide Ride-Share Programs	1	1	-	1
	[TP14] Subsidize Public Transit Service Upgrade or Expansion	1 – 4	1 – 4	1 – 4	-
	[TP15] Provide Targeted Behavioral Interventions	1 – 2	1 – 2	1 – 2	-
	[TP16] Unbundle Parking Costs from Property Cost	1 – 2	-	-	-
	[TP17] Provide Vanpool Incentives	1 – 4	1 – 4	1 – 4	-
	[TP18] Provide Voluntary Travel Behavior Change Program	1 – 2	1 – 2	1 – 2	-
User-Defined Measure	See note <sup>(2)</sup>	See note <sup>(2)</sup>	See note <sup>(2)</sup>	See note <sup>(2)</sup>	

**Notes:**

- (1) Projects located in an area with an established TMA are required to join the TMA. Refer to Table 6, TP05 for more information.
- (2) The TDM Point Value of a user-defined measure is subject to City staff’s approval and determination.
- (3) “-” indicates that the measure is not applicable for the corresponding land use type under the TDM Program.

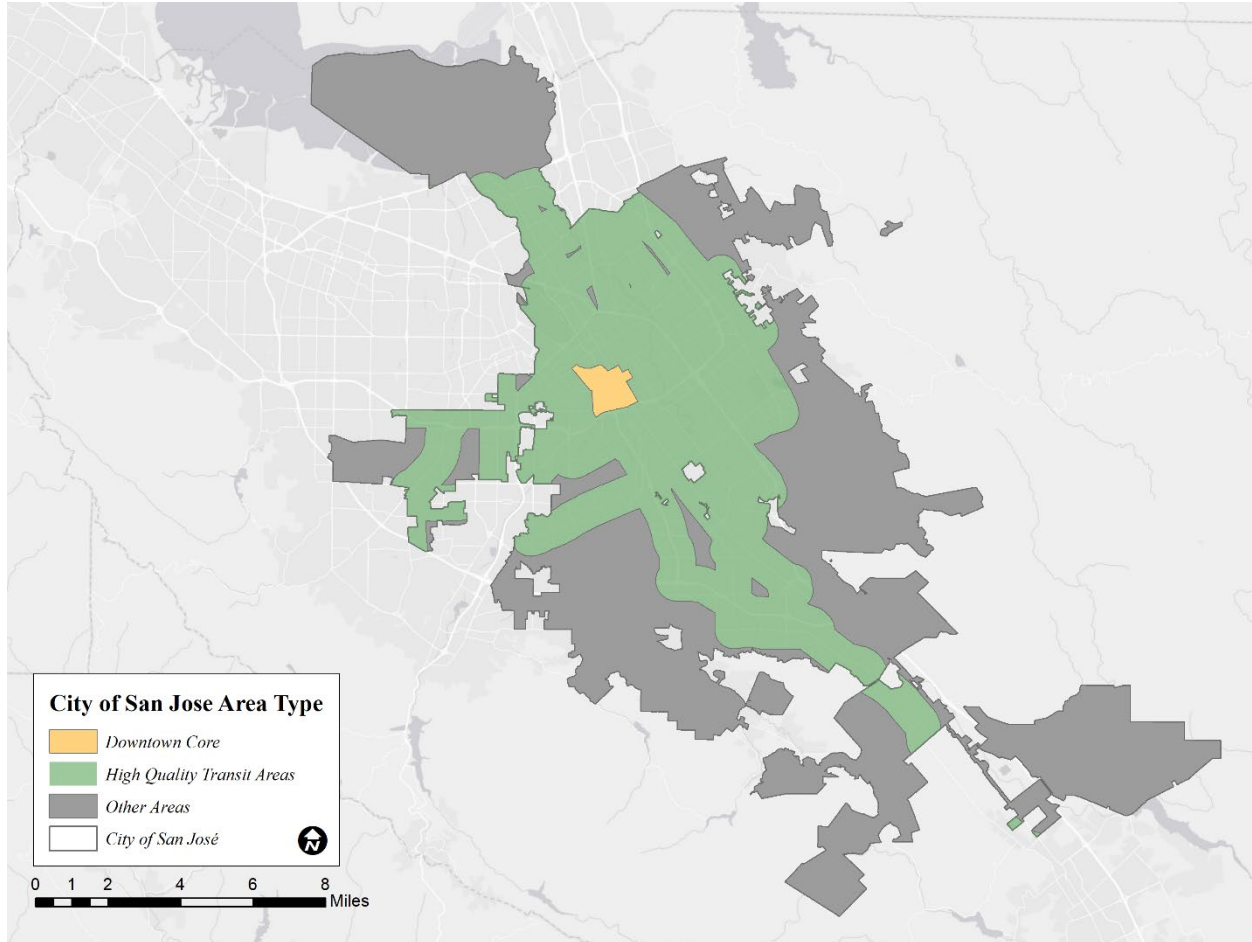
**Appendix C** provides more detailed descriptions for each TDM measure in the Menu, including the scope, applicable project types, and point-value definitions for the TDM Program.

New opportunities to reduce drive along trips, VMT, and vehicle trips are constantly emerging. The TDM Program embraces effective innovation and will adapt over time. To receive TDM points for measures not on the City’s preset menu, a project applicant may apply for discretionary approval of a “User-Defined Measure.” In the TDM Plan, the project applicant must include a clear description of the proposed user-defined measure, provide research data or other evidence to prove the efficacy of the proposed measure, and explain why the measure fits the project better than those in the City’s preset menu of TDM measures. City staff will review the proposed measure, accept or decline the proposal with justification, and determine a TDM Point Value as appropriate. If an approved user-defined measure does not demonstrate expected results during the project’s annual compliance and monitoring, City staff may require the future owner or tenant to update the project’s TDM Plan by substituting the user-defined measure with other measures in the City’s preset menu (Refer to **Section 4.6**).

## 4.5 SAMPLE TDM PLANS

To facilitate projects of different uses and geographical contexts in the development of their TDM Plans, this section presents several sample TDM Plans for project applicants’ consideration. The TDM measures listed below are recommended by City staff, but developers are free to choose any combination of measures to meet the TDM Point Target. Two examples are given for each area typology in the city – Downtown Core, High-Quality Transit Areas, and Other Areas. These areas are shown in **Figure 6**.

**Figure 6** Downtown Core, High-Quality Transit, and Other Areas in San José (April 2023)



**Table 6** and **Table 7** present two sample TDM Plans for home-end and commute-end project uses located in Downtown core, defined in the City’s *Downtown Strategy 2040* as approximately bounded by Taylor Street and Coleman Avenue to the north, Fourth Street to the east, I-280 to the south, and Stockton Ave and the railroad tracks to the west.

**Table 6** Example TDM Plan – 100 Rental Units in Downtown Core

Category	Measure [ID]	100 Rental Units in Downtown Core	
		Home-End Use	Point Values Received



Multimodal Network Improvements	[MI05] Provide Pedestrian Network Improvements	Fund or perform the design and/or construction of pedestrian street improvements outside of the Project's property frontage and within 1 mile of the Project site, for a cost of \$4,000 per dwelling unit for 4 points: \$4,000 per dwelling unit * 100 units = \$400,000.	4
Parking	[PK01] Right-size Parking Supply	Provide zero on-site parking spaces and off-site shared parking.	20
Programmatic TDM	[TP02] Provide Bike Share Stations	Subscribe to the City's bike share program. Establish a new bike share station to include six (6) bikes/e-bikes on public streets or garages within ½ miles of the Project for use by both Project residents/employees and the general public.	1
<b>Total</b>			<b>25</b>

Notes: For the purpose of this example, it is assumed that the project is located in an area without an established Transportation Management Association.

**Table 7 Example TDM Plan – 1 Million Square Feet of Office in Downtown Core**

Category	Measure [ID]	Office (Approximately 4,000 Employees) in Downtown Core	
		Commute-End Use	Point Values Received
Multimodal Network Improvements	[MI03] Provide Transit Network Improvements	Fund or perform the design and/or construction of transit network improvements outside of the Project's property frontage and within 1 mile of the Project site, for a cost of \$2 per square foot gross floor area for two points: 1,000,000 square feet * \$2 per square foot = \$2,000,000.	2

Parking	[PK01] Right-size Parking Supply	Provide 1,000 on-site parking spaces and zero off-site parking spaces (i.e., parking ratio = 1.0).	20
	[PK03] Provide Shared Parking	Provide at least 25% of the on-site parking spaces, or 1,000*25% = 250 spaces, to be publicly accessible at all times.	2
Programmatic TDM	[TP11] Provide Alternative Transportation Benefits	Provide Mobility Wallets: Subsidize mobility wallet membership and expenses, or \$15/month, whichever is lower, for each Project employee, i.e., up to \$15/month/employee *4,000 employees = \$60,000/month. Available for Project employees to purchase, mobility wallets including a package of transportation passes, vouchers, and credits for mobility options such as transit, bike share, scooter share, and car share, etc.	1
<b>Total</b>			<b>25</b>

Notes: For the purpose of this example, it is assumed that the project is located in an area without an established Transportation Management Association.

**Table 8** and **Table 9** present two sample TDM Plans for a home-end and commute-end project use in a High-Quality Transit Area, defined as those located within ½ miles of an existing major transit stop<sup>3</sup> or an existing stop along a high-quality transit corridor<sup>4</sup>.

**Table 8 Example TDM Plan – 100 Rental Units in a High-Quality Transit Area**

Category	[ID] Measure	100 Rental Units in High-Quality Transit Areas	
		Home-End Use	Point Values Received

<sup>3</sup> Defined in the Pub. Resources Code § 21064.3 (“Major transit stop” means a site containing an existing rail transit station, a ferry terminal served by either a bus or rail transit service, or the intersection of two or more major bus routes with a frequency of service interval of 15 minutes or less during the morning and afternoon peak commute periods”).

<sup>4</sup> Defined in the Pub. Resources Code § 21155 (“High-quality transit corridor means a corridor with fixed route bus service with service intervals no longer than 15 minutes during peak commute hours”).

Multimodal Network Improvements	[MI01] Provide Bicycle and Micro-mobility Network Improvements	Fund or perform the design and/or construction of bike and micro-mobility network improvements outside of the Project's property frontage and within 1 mile of the Project site, for a cost of \$4,000 per dwelling unit for 4 points: \$4,000 per dwelling unit * 100 units = \$400,000.	4
Parking	[PK01] Right-size Parking Supply	Provide 100 on-site parking spaces and zero off-site parking spaces (i.e., parking ratio = 1.0).	20
Programmatic TDM	[TP03] Provide Car Share Stations	Provide at least one (1) car-share vehicle with a reserved parking space, plus another such vehicle and space for every 40 dwelling units and every 10,000 square feet of non-residential occupied floor area on site for use by Project residents/employees. Include striping, signage, and educational tools.	1
<b>Total</b>			<b>25</b>

Notes: For the purpose of this example, it is assumed that the project is located in an area without an established Transportation Management Association.

**Table 9 Example TDM Plan – 1 Million Square Feet of Office in a High-Quality Transit Area**

Category	[ID] Measure	Office (Approximately 4,000 Employees) in High-Quality Transit Areas	
		Commute-End Use	Point Values Received
Multimodal Network Improvements	[MI03] Improve Transit Network Improvements	Fund or perform the design and/or construction of transit network improvements outside of the Project's property frontage and within 1 mile of the site, for a total cost equivalent to \$2 per square feet of non-residential gross floor area for two points: \$2 per square foot*1,000,000 = \$2,000,000.	2

Parking	[PK01] Right-size Parking Supply	Provide 2,000 on-site parking spaces and zero off-site parking spaces (i.e., parking ratio = 2.0).	16
	[PK03] Shared Parking	Provide at least 25% of the on-site parking spaces to be publicly accessible at all times: 2,000 spaces *25% = 500 spaces.	2
Programmatic TDM	[TP07] Provide Transit Fare Subsidies	Subsidize annual/monthly transit pass and trip expenses, or \$45/month, whichever is lower, for each Project employee subscribed to the MTC's Bay Area Commuters Program: up to \$45/month/employee *4,000 employees = \$180,000/month.	3
	[TP10] Price Workplace Parking	Price all available on-site parking at hourly and/or daily rates. Parking prices must be set at market rate or dynamically based on demand throughout the day. Weekly, monthly, annual, or other long-term parking pass options must not be provided. Parking validation may be provided for invited guests only.	2
<b>Total</b>			<b>25</b>

Notes: For the purpose of this example, it is assumed that the project is located in an area without an established Transportation Management Association.

**Table 10** and **Table 11** present two sample TDM Plans for a home-end and commute-end project use in a High-Quality Transit Area, defined as those located within ½ miles of an existing major transit stop<sup>5</sup> or an existing stop along a high-quality transit corridor<sup>6</sup>.

**Table 10 Example TDM Plan – 100 Rental Units in a High-Quality Transit Area**

Category	[ID] Measure	100 Rental Units
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<sup>5</sup> Defined in the Pub. Resources Code § 21064.3 (“Major transit stop” means a site containing an existing rail transit station, a ferry terminal served by either a bus or rail transit service, or the intersection of two or more major bus routes with a frequency of service interval of 15 minutes or less during the morning and afternoon peak commute periods”).

<sup>6</sup> Defined in the Pub. Resources Code § 21155 (“High-quality transit corridor means a corridor with fixed route bus service with service intervals no longer than 15 minutes during peak commute hours”).

		in High Quality Transit Areas	
		Home-End Use	Point Values Received
Multimodal Network Improvements	[MI01] Provide Bicycle and Micro-mobility Network Improvements	Fund or perform the design and/or construction of bike and micro-mobility network improvements outside of the Project's property frontage and within 1 mile of the Project site, for a cost of \$4,000 per dwelling unit for 4 points: \$4,000 per dwelling unit * 100 units = \$400,000.	4
Parking	[PK01] Right-size Parking Supply	Provide 100 on-site parking spaces and zero off-site parking spaces (i.e., parking ratio = 1.0).	20
Programmatic TDM	[TP03] Provide Car Share Stations	Provide at least one (1) car-share vehicle with a reserved parking space, plus another such vehicle and space for every 40 dwelling units and every 10,000 square feet of non-residential occupied floor area on site for use by Project residents/employees. Include striping, signage, and educational tools.	1
<b>Total</b>			<b>25</b>

Notes: For the purpose of this example, it is assumed that the project is located in an area without an established Transportation Management Association.

**Table 11 Example TDM Plan – 1 Million Square Feet of Office in a High-Quality Transit Area**

Category	[ID] Measure	Office (Approximately 4,000 Employees) in High Quality Transit Areas	
		Commute-End Use	Point Values Received

Multimodal Network Improvements	[MI03] Improve Transit Network Improvements	Fund or perform the design and/or construction of transit network improvements outside of the Project's property frontage and within 1 mile of the site, for a total cost equivalent to \$2 per square feet of non-residential gross floor area for two points: \$2 per square foot*1,000,000 = \$2,000,000.	2
Parking	[PK01] Right-size Parking Supply	Provide 2,000 on-site parking spaces and zero off-site parking spaces (i.e., parking ratio = 2.0).	16
	[PK03] Shared Parking	Provide at least 25% of the on-site parking spaces to be publicly accessible at all times: 2,000 spaces *25% = 500 spaces.	2
Programmatic TDM	[TP07] Provide Transit Fare Subsidies	Subsidize annual/monthly transit pass and trip expenses, or \$45/month, whichever is lower, for each Project employee subscribed to the MTC's Bay Area Commuters Program: up to \$45/month/employee *4,000 employees = \$180,000/month.	3
	[TP10] Price Workplace Parking	Price all available on-site parking at hourly and/or daily rates. Parking prices must be set at market rate or dynamically based on demand throughout the day. Weekly, monthly, annual, or other long-term parking pass options must not be provided. Parking validation may be provided for invited guests only.	2
<b>Total</b>			<b>25</b>

Notes:For the purpose of this example, it is assumed that the project is located in an area without an established Transportation Management Association.

**Table 12** and **Table 13** present two sample TDM Plans for a home-end and commute-end project use in Other Areas, defined as those located outside of High-Quality Transit Areas and the Downtown core.

**Table 12 Example TDM Plan – 100 Rental Units in Other Areas**

Category	[ID] Measure	100 Rental Units in Other Areas	
		Home-End Use	Point Values Received
Project Characteristics	[PC03] Provide Affordable Housing	Provide affordable housing units on-site, off-site, or via dedication of land, credits and transfers, acquisition and rehab of units, HUD restricted units, option to purchase, partnership for clustered units, or a combination of methods for of at least 20% above and beyond the City’s Inclusionary Housing Ordinance obligation	4
Multimodal Network Improvements	[MI01] Provide Bicycle and Micro-mobility Network Improvements	Fund or perform the design and/or construction of bike and micro-mobility network improvements outside of the Project’s property frontage and within 1 mile of the Project site, for a cost of \$4,000 per dwelling unit for 4 points: \$4,000 per dwelling unit * 100 units = \$400,000.	4
	[MI04] Provide Residential Street Improvements	Fund or perform the relevant warrant studies, design, and/or construction of neighborhood traffic management improvements outside of the Project’s property frontage and within 1 mile of the Project site, for a total cost equivalent to \$4,000 per dwelling unit for 4 points: \$4,000 per dwelling unit * 100 units = \$400,000.	4
Parking	[PK02] Provide Bike Parking Facilities	Provide at least 2 times as many secure short-term and long-term bicycle parking spaces on site as required by zoning. Include wayfinding signage (Short-term and long-term parking); Provide at least 2 times as many showers, changing rooms, and clothes lockers on site as required by zoning.	2

		<p>Include wayfinding signage (Showers, changing rooms, lockers);</p> <p>Provide a covered area such as a bike storage room or garage on site. Tools and supplies must include, at minimum, those needed to fix a flat tire, adjust a chain, and performing other basic maintenance. Available tools must include, at minimum, a bicycle pump, wrenches, a chain tool, tire levers, hex keys/Allen wrenches, screwdrivers, and spoke wrenches. Although not required, vending machines selling items such as bike tubes, patch kits, lights, locks, hand warmers, and other bicycling gear can be paired with repair stations. Include wayfinding signage (Bike repair station)</p> <p>Include, at minimum, a staffed facility on site providing basic bicycle maintenance services available to the public. Services can also include the sale and rental of bicycle parts, bicycling gear, and tools. Include wayfinding signage (Bike maintenance services)</p>	
Programmatic TDM	[TP02] Provide Bike Share Stations	<p>Provide at least six (6) shared bikes/e-bikes on site via Bay Wheels or a dedicated fleet on-site for use by Project residents/employees and the general public and provide at least one (1) cargo bike and one (1) collapsible shopping/utility cart on site for use by Project residents/employees. Include wayfinding signage.</p>	2
	[TP03] Provide Car Share Stations	<p>Provide at least one (1) car-share vehicle with a reserved parking space, plus another such vehicle and space for every 40 dwelling units and every 10,000 square feet of non-residential occupied floor area on site for use by Project residents/employees. Include</p>	4



		<p>striping, signage, and educational tools;</p> <p>Provide a neighborhood electric vehicle (NEV) station including a shared fleet of at least one (1) NEV plus another such vehicle for every 40 dwelling units and every 10,000 square feet of non-residential occupied floor area on site for use by Project residents/employees. Include charging facilities, striping, signage, and educational tools. NEV routes must be designed on streets in a low-speed neighborhood;</p> <p>Subscribe to the City’s one-way car share program. Establish a new or expand an existing public car share or NEV station to include a shared fleet of at least one (1) car share vehicle or NEV plus another such vehicle for every 40 dwelling units and every 10,000 square feet of non-residential occupied floor area on public streets or garages within ½ miles of the Project for use by both Project residents/employees and others in the local community;</p> <p>Provide secure storage for car seats and strollers as complementary amenities for car share users at the car share facilities.</p>	
	<p>[TP11] Provide Alternative Transportation Benefits</p>	<p>Subsidize annual/monthly membership and trip expenses, or \$15/month, whichever is lower, for each Project dwelling unit/employee subscribed to Bay Wheels or other bike share providers (Bike share);</p> <p>Subsidize annual/monthly membership and trip expenses, or \$15/month, whichever is lower, for each Project dwelling unit/employee subscribed to scooter share providers (Scooter share);</p>	<p>4</p>

		Subsidize annual/monthly membership and trip expenses, or \$15/month, whichever is lower, for each Project dwelling unit/employee subscribed to car share providers (Car share); Subsidize mobility wallet membership and expenses, or \$15/month, whichever is lower, for each Project dwelling unit/employee. Available for Project residents/employees to purchase, mobility wallets including a package of transportation passes, vouchers, and credits for mobility options such as transit, bike share, scooter share, and car share, etc. (Mobility Wallet)	
	[TP16] Unbundle Parking Costs from Property Cost	Detach the cost of accessory automobile parking spaces from all residential lease or purchase fees for the lifetime of the Project. Do not market dwelling units with the amenity of “free parking” or similar terms. Lease or sell the accessory parking spaces separately so that Project tenants/residents have the option of renting or buying a space at an additional cost.	1
<b>Total</b>			<b>25</b>

Notes: For the purpose of this example, it is assumed that the project is located in an area without an established Transportation Management Association.

**Table 13 Example TDM Plan – 1 Million Square Feet of Office in Other Areas**

Category	[ID] Measure	Office (Approximately 4,000 Employees) in Other Areas	
		Commute-End Use	Point Values Received

Multimodal Network Improvements	[MI01] Provide Bicycle and Micro-mobility Network Improvements	Fund or perform the design and/or construction of bike and micro-mobility network improvements outside of the Project’s property frontage and within 1 mile of the Project site, for a cost of \$4,000 per dwelling unit for 4 points: \$4,000 per dwelling unit * 100 units = \$400,000.	4
	[MI04] Provide Residential Street Improvements	Fund or perform the relevant warrant studies, design, and/or construction of neighborhood traffic management improvements outside of the Project’s property frontage and within 1 mile of the Project site, for a total cost equivalent to \$4,000 per dwelling unit for 4 points: \$4,000 per dwelling unit * 100 units = \$400,000.	4
Parking	[PK02] Provide Bike Parking Facilities	Provide at least 2 times as many secure short-term and long-term bicycle parking spaces on site as required by zoning. Include wayfinding signage (Short-term and long-term parking); Provide at least 2 times as many showers, changing rooms, and clothes lockers on site as required by zoning. Include wayfinding signage (Showers, changing rooms, lockers); Provide a covered area such as a bike storage room or garage on site. Tools and supplies must include, at minimum, those needed to fix a flat tire, adjust a chain, and performing other basic maintenance. Available tools must include, at minimum, a bicycle pump, wrenches, a chain tool, tire levers, hex keys/Allen wrenches, screwdrivers, and spoke wrenches. Although not required, vending machines selling items such as bike tubes, patch kits, lights, locks, hand warmers, and other bicycling gear can be paired with repair stations. Include wayfinding signage (Bike repair station)	2

		<p>Include, at minimum, a staffed facility on site providing basic bicycle maintenance services available to the public. Services can also include the sale and rental of bicycle parts, bicycling gear, and tools. Include wayfinding signage (Bike maintenance services)</p>	
<p>Programmatic TDM</p>	<p>[TP02] Provide Bike Share Stations</p>	<p>Provide at least six (6) shared bikes/e-bikes on site via Bay Wheels or a dedicated fleet on-site for use by Project residents/employees and the general public and provide at least one (1) cargo bike and one (1) collapsible shopping/utility cart on site for use by Project residents/employees. Include wayfinding signage.</p>	<p>2</p>
	<p>[TP03] Provide Car Share Stations</p>	<p>Provide at least one (1) car-share vehicle with a reserved parking space, plus another such vehicle and space for every 40 dwelling units and every 10,000 square feet of non-residential occupied floor area on site for use by Project residents/employees. Include striping, signage, and educational tools;</p> <p>Provide a neighborhood electric vehicle (NEV) station including a shared fleet of at least one (1) NEV plus another such vehicle for every 40 dwelling units and every 10,000 square feet of non-residential occupied floor area on site for use by Project residents/employees. Include charging facilities, striping, signage, and educational tools. NEV routes must be designed on streets in a low-speed neighborhood;</p> <p>Provide secure storage for car seats and strollers as complementary amenities for car share users at the car share facilities.</p>	<p>3</p>

	[TP06] Provide Parking Cash-out	Provide all Project employees eligible for subsidized or free automobile parking with the choice of forgoing a parking space for a cash payment equivalent to the market rates of parking prices.	2
	[TP08] Provide Flexible Work Schedules	Allow 100% of employees to telecommute 2 days/week	2
	[TP10] Price Workplace Parking	Price all available on-site automobile parking at hourly and/or daily rates. Parking prices must be set at market rate or dynamically based on demand throughout the day. Weekly, monthly, annual, or other long-term parking pass options must not be provided. Parking validation may be provided for invited guests only.	2
	[TP11] Provide Alternative Transportation Benefits	<p>Allow Project employees to exclude transit or vanpooling expenses from taxable income up to the IRS limit (Pre-tax deduction);</p> <p>Subsidize annual/monthly membership and trip expenses, or \$15/month, whichever is lower, for each Project dwelling unit/employee subscribed to Bay Wheels or other bike share providers (Bike share);</p> <p>Subsidize annual/monthly membership and trip expenses, or \$15/month, whichever is lower, for each Project dwelling unit/employee subscribed to car share providers (Car share);</p> <p>Subsidize mobility wallet membership and expenses, or \$15/month, whichever is lower, for each Project dwelling unit/employee. Available for Project residents/employees to purchase, mobility wallets including a package of transportation passes, vouchers, and credits for mobility options such as transit, bike share,</p>	4

		scooter share, and car share, etc. (Mobility Wallet)	
			<b>Total</b>
			<b>25</b>

Notes: For the purpose of this example, it is assumed that the project is located in an area without an established Transportation Management Association.

## 4.6 TDM PLAN COMPLIANCE AND MONITORING

Projects including a TDM Plan as a Condition of Approval are required to implement the selected TDM measures for the life of the projects and fulfill ongoing compliance and monitoring requirements. Prior to issuance of any use permit and/or Certificate of Occupancy, projects must execute and record a Covenant and Agreement that the approved TDM Plan as required by the TDM Program, and the TDM measures contained therein, have been provided and will be maintained throughout the life of the project. This is to ensure that, as a property is sold or users change, there is a clear record attached to the property that documents the ongoing requirement to abide by the TDM Plan.

### *TDM Plan Confirmation*

An approved TDM Plan must clearly outline a list of physical measure(s) (i.e., measures from the categories of project characteristics, multimodal network improvements, and parking) and programmatic measure(s) that the project is required to provide. The developer must ensure that the physical measure(s) are included in the construction of the project, and that the programmatic measure(s) outlined in the TDM Plan are implemented as required.

City staff will review building plans and perform an inspection prior to the issuance of building permits and encroachment permits. This is to ensure that the physical measure(s) have been installed or incorporated in the project's construction. The project must also provide documentation about the setup of the programmatic measures. Once the City confirm the project's compliance with the TDM Plan per the Conditions of Approval, the City will communicate its approval to facilitate issuance of an initial Certificate of Occupancy.

### *Annual TDM Compliance Form*

For the purpose of ongoing monitoring of compliance with and effectiveness of TDM measures, projects would be classified into two levels based on size. The smaller projects would be classified as Level 1 projects and the large projects as Level 2 projects. **Table 14** presents the definition of "smaller projects" as it pertains to the annual compliance requirements.

**Table 14** Smaller Projects (Level 1) Subject to Annual Compliance Requirements

Type	Project Size
Home-End Uses	<ul style="list-style-type: none"> <li>Single-family detached, single-family attached, or multi-family residential projects of 16 to 299 units</li> </ul>

<b>Commute-End Uses</b>	<ul style="list-style-type: none"> <li>• Office projects of 10,001 to 149,999 square feet of gross floor area <sup>(1)</sup>;</li> <li>• Hotel or motel projects of 101-249 rooms;</li> <li>• Charter or private school projects of 250 or more students</li> </ul>
<b>Visit-End Uses</b>	<ul style="list-style-type: none"> <li>• Retail projects of 100,001 to 249,999 square feet of total gross floor area</li> </ul>
<b>Other Uses</b>	<ul style="list-style-type: none"> <li>• Industrial projects of 30,001 to 299,999 square feet or more of gross floor area</li> </ul>

Notes:

- (1) For some commute-end uses that are measured in units other than gross floor area, the unit is converted to its equivalent in gross floor area. Exceptions are hotel/motel and charter/private school projects since their Level 1 size thresholds are based on the number of rooms and the number of students, respectively.

Level 1 projects that are required to provide at least one (1) programmatic measure as outlined in their TDM Plans are subject to annual compliance. After the project is occupied, it is required to verify that its programmatic measure(s) continue to be implemented for as long as the project maintains a Certificate of Occupancy. Every year, the project must submit a completed TDM Compliance Form and associated administrative fees to the City Department of Transportation. A TDM Compliance Form must include a summary of the following information about the project:

- **Project Size:** For residential, provide the number of for-sale/rental, market-rate/affordable, on-site/off-site units and the number of bundled/unbundled/shared parking spaces. For commercial office/retail, provide the number of businesses and total gross square feet of office/retail space and the number of free/priced/shared parking spaces.
- **Point of Contact:** Provide the property address, the name of the property owner/association, and the contact person’s name and information
- **Documentation of Existing TDM Measures:** Report all ongoing programmatic measure(s), proof of implementation, and any changes from the original plan or past years.

The first submission of the TDM Compliance Form is due within 30 calendar days of the 18-month anniversary of the issuance of the initial Certificate of Occupancy. Subsequent annual submissions are also due within 30 calendar days of that date. Upon five consecutive years of satisfactory submittals of the TDM Compliance Forms, the submittal requirement shifts to every three years. If, at any time, a project fails to demonstrate satisfactory compliance, this relaxed timeline will revert to the annual submittal schedule until the project again demonstrates five consecutive years of satisfactory compliance.

*Annual TDM Monitoring Report*

Besides annual compliance (see above), large projects (or large components of mixed-use projects) that are required to provide at least one programmatic measure as outlined in their TDM Plans are also subject to annual monitoring. After a large project (or a large component of a mixed-use project) is occupied, it is required to collect and report ongoing data about the means of travel for the project’s residents or employees (i.e., mode share). Mode share data are important for evaluating the performance of the ongoing programmatic measures regarding the project’s progress toward its mode

share target. **Table 15** presents the definition of “large projects” as it pertains to the annual monitoring requirements.

**Table 15 Large Projects (Level 2) Subject to Annual Monitoring Requirements**

Type	Project Size
<b>Home-End Uses</b>	<ul style="list-style-type: none"> <li>Single-family detached, single-family attached, or multi-family residential projects of 300 units or more</li> </ul>
<b>Commute-End Uses</b>	<ul style="list-style-type: none"> <li>Office projects of 150,000 square feet of gross floor area <sup>(1)</sup> or more;</li> <li>Hotel or motel projects of 250 rooms or more;</li> <li>Charter or private school projects are exempt regardless of the number of students</li> </ul>
<b>Visit-End Uses</b>	<ul style="list-style-type: none"> <li>Retail projects of more than 250,000 square feet of gross floor area or more</li> </ul>
<b>Other Uses</b>	<ul style="list-style-type: none"> <li>Industrial projects of 300,000 square feet of gross floor area or more</li> </ul>

Notes:

- (1) For some commute-end uses that are measured in units other than gross floor area, the unit is converted to its equivalent in gross floor area. Exceptions are hotel or motel projects since their Level 2 size thresholds are based on the number of rooms.

Projects that are subject to annual monitoring must submit a completed TDM Compliance Form, a completed TDM Monitoring Report, and associated administrative fees to the City Department of Transportation every year. A TDM Monitoring Report must include three (3) components – the project’s mode share, the project’s trip cap (CEQA), and the evaluation of the project’s TDM Plan.

Project Mode Share (TDM Program)

For home-end, commute-end, and visit-end project uses, their drive-alone mode share target is 25% below the drive-alone mode share of trips generated by the surrounding neighborhood before the project was occupied. For example, if 80% of work trips generated by the surrounding (pre-project) were made in a single-occupant vehicle, the office project’s drive-alone mode share target would be  $80\% * (1 - 25\%) = 60\%$ . For other project uses, the work trip drive-alone mode share target is 5% below that of other work trips in the surrounding (pre-project). The TDM Monitoring Report must compare the project’s drive-alone mode share with that of the surrounding neighborhood to inform the effectiveness of the project’s TDM Plan.

Projects must conduct **Building Occupant/Tenant Travel Annual Surveys** with project residents and/or employees using the City’s template. Travel surveys include questions pertaining to trip purposes, travel mode choice, travel time, subscriptions to TDM measures, etc. Intercept surveys must be conducted with at least 10% of the project’s households and/or employees. Survey data are used to estimate the drive-alone mode share of trips generated by the project. The project’s estimated drive-alone mode



share is then compared with that of the surrounding neighborhood (defined as the census tract in which the project is located) before the project was occupied. City staff will provide the drive-alone mode share of the pre-project surrounding neighborhood, estimated from the City's probe data. City staff will also provide the City's template with instructions for conducting travel surveys.

#### Project Trip Cap (Mitigation Monitoring Reporting Program, **Section 3.8**)

If the project proposes to include at least one programmatic TDM measure in the project description or as mitigation measures to address its CEQA transportation impacts, the project must demonstrate that its VMT is below the relevant thresholds after the opening day. A trip cap, defined as the maximum number of personal motorized vehicle trips that are allowed to be generated by a project on an average weekday, is a proxy for the City's VMT thresholds. A project's trip cap is set at the project's vehicle trip generation per the Intersection Operations Analysis (Refer to **Section 5.7** for the City's methodology of performing a vehicle trip generation analysis). The trip cap will be included in the project's planning permit and/or the Mitigation Monitoring and Reporting Program (MMRP) in perpetuity.

Projects must conduct **Driveway Traffic Counts** at all project entrances and exits. Driveway counts should be conducted on at least three (3) non-holiday weekdays. Driveway counts are used to estimate the project's vehicle trips. The project's estimated vehicle trips will be compared with the project's trip cap. City staff will provide the City's template with instructions for conducting driveway traffic counts.

#### Evaluation of TDM Plan

If the TDM Monitoring Report finds that the project does not meet the mode share target and the trip cap as indicated in the TDM Plan, the project is required to work with the City to evaluate how the project has been implementing existing measures, identify more effective ways to implement the existing measures, and recommend changes to the project's TDM Plan for the upcoming year as needed. For example, some existing programmatic measure(s) may be replaced with new measures to test their effectiveness in advancing the project's progress toward its mode share target and trip cap.

The first submission of the TDM Monitoring Report is due within 30 calendar days of the 18-month anniversary of the issuance of the initial Certificate of Occupancy. Subsequent annual submissions are also due within 30 calendar days of that date. Upon five (5) consecutive years of satisfactory submittals of the TDM Monitoring Reports, the submittal requirement shifts to every three (3) years. If, at any time, a project fails to demonstrate satisfactory monitoring, this relaxed timeline will revert to the annual submittal schedule until the project again demonstrates five (5) consecutive years of satisfactory monitoring.

#### *Non-Compliance*

A project that fails to demonstrate satisfactory annual compliance or monitoring requirements are found to be not in compliance. In such cases, the project must submit a follow-up report that demonstrates compliance within a grace period, which typically does not exceed six (6) months from the date when the non-compliance status was determined. Penalties will be assessed by the City if the project is still not able to meet compliance or monitoring requirements by the end of the grace period. The City of San José shall withhold issuance of building, grading, demolition, foundation, use of land, and change of use permits, and issuance of Certificates of Occupancy, for any properties that fail to comply



with MMRP and the TDM Program. All collected penalties will be used for the City's administrative costs related to the TDM Program.

## 5. LOCAL TRANSPORTATION ANALYSIS

A Local Transportation Analysis (LTA) evaluates the effects of a development project on transportation, access, circulation, and related safety elements in the proximate area of the project. An LTA also establishes consistency with the General Plan policies and goals through the following three objectives:

1. Ensures that a local transportation system is appropriate for serving the types, characters, and intensity of the surrounding land uses;
2. Encourages projects to reduce personal motorized vehicle-trips and increase alternative transportation mode share;
3. Addresses issues related to operations and safety for all transportation modes, with trade-offs guided by the General Plan street typology.

Many factors are considered when determining what types of analyses are included in an LTA. These factors include project description, location, adjacent land uses, and the local transportation system in the proximate area. Public Works determines the LTA scope for a project during the TA scoping process.

This section presents guidelines for preparing LTAs for development projects. Where topics overlap with those in the *VTA Transportation Impact Analysis Guidelines*, these guidelines are intended to be consistent with the VTA's, unless otherwise noted, to promote consistency across jurisdictions within the Santa Clara County and good regional planning.

For transportation standards, refer to the *San José Complete Streets Design Standards and Guidelines*, *San José Municipal Code*, *Envision San José 2040 General Plan*, *American Association of State Highway and Transportation Officials (AASHTO)*, *California Manual on Uniform Traffic Control Devices (CA MUTCD)*, *Caltrans Highway Capacity Manual*, *VTA Transportation Impact Analysis Guidelines*, *VTA Traffic Level of Service Analysis Guidelines*, *Institute of Transportation Engineers (ITE) Trip Generation Manual*, *ITE Trip Generation Handbook*, and other appropriate guidelines.

### 5.1. EXISTING CONDITIONS

A project is required to document the existing conditions of the local transportation system in its proximate area, including field observations of biking, walking, transit, and roadway operations during peak commute periods.

Existing conditions should include, but not be limited to, the following areas:

- Pedestrian facilities and operations;
- Bicycle facilities and operations;
- Transit stations, routes, schedules, and operations;
- Intersection operations;
- Queuing and storage length;
- Traffic signal phasing and timing;
- Ramp meter queues and spill back onto local streets;

- Uneven lane demand and usage;
- Sight distance.

## 5.2. BICYCLE AND PEDESTRIAN

Projects will be evaluated for their ability to support bicycling and walking. This evaluation should include the effects and benefits of site development and associated roadway modifications on: (1) bicycle and pedestrian infrastructure, (2) bicycle and pedestrian access; and (3) conformance to existing plans and policies. These assessments should include the following elements:

### Bicycle and Pedestrian Infrastructure:

- Any effects on the existing bicycle and pedestrian facilities;
- The actual and effective widths of sidewalks immediately adjacent to the project. For areas where sidewalks are absent or deficient, the sidewalk width as determined by the *San José Complete Streets Design Standards and Guidelines* should be included;
- The availability of Americans with Disabilities Act (ADA) ramps at intersections and driveways. A project may be required to construct or reconstruct ADA ramps, especially to existing major pedestrian generators, within the project's sphere;
- The availability and adequacy of bike parking and bike share facilities;
- The location of fire hydrants, light poles, traffic control devices, and other significant physical items between the curb and the property line;
- The effects of any proposed addition, relocation, or reconstruction of bikeways, sidewalks, curb ramps, lighting, etc.;
- Consistency with the *Envision San José 2040 General Plan*, *San José Complete Streets Design Standards and Guidelines*, *ADA Transition Plan*, *Urban Village Plans*, *Area Plans*, and other appropriate design standards.

### Bicycle and Pedestrian Access:

- Pedestrian and bicycle access to and from the project, including an inventory of facilities and deficiencies for access within the site (i.e., from buildings on the site to the public sidewalks) and off-site (i.e., presence/absence of continuous sidewalks, safe crossings). Bicycle and pedestrian access is also described in the Site Circulation and Access section (**Section 5.12**);
- Proposed actions to improve pedestrian and bicycle access, or to mitigate adverse effects on pedestrian and bicycle access that result from the project.

### Conformance to Existing Plans and Policies:

- Transportation plans developed at the state (*California Transportation Plan 2040*), regional (*Plan Bay Area 2050*), county (*Valley Transportation Plan 2040 or as updated*, *Countywide Bike Plan*, and *Pedestrian Access to Transit Plan*, Multimodal Improvement Plans, etc.), and local (*Envision San José 2040 General Plan*, *Move San Jose*, *Better Bike Plan 2025*, Multimodal Transportation

Improvement Plans<sup>14</sup>, and Vision Zero<sup>15</sup>, etc.) levels outline planned improvements to the bicycle and pedestrian networks within the City that are intended to promote and encourage the use of active transportation. Identify any planned improvements to the bicycle and pedestrian networks that will provide the project with improved connections to the surrounding bike, pedestrian, and transit facilities, as well as a balanced transportation system consistent with General Plan goals and policies.

- Full implementation of some of the planned pedestrian and bike facility improvements may be cost-prohibitive and beyond the means of the project. In such cases, the project may be required to make a fair-share contribution towards the cost of the improvements if it is determined that the identified improvements would benefit the project.

### 5.3. VISION ZERO

Vision Zero San José is the City’s commitment to prioritize street safety and ensure all road users – people who walk, bike, ride transit, drive, or carpool – are safe.

The Vision Zero San José action plan includes continuing the successful implementation of the “4E’s” (Evaluate, Engineering, Enforcement, and Education), expanding the analysis of crash data, aligning limited resources on high crash corridors, and adding a program of advocacy related to technology, policy, and partnerships.

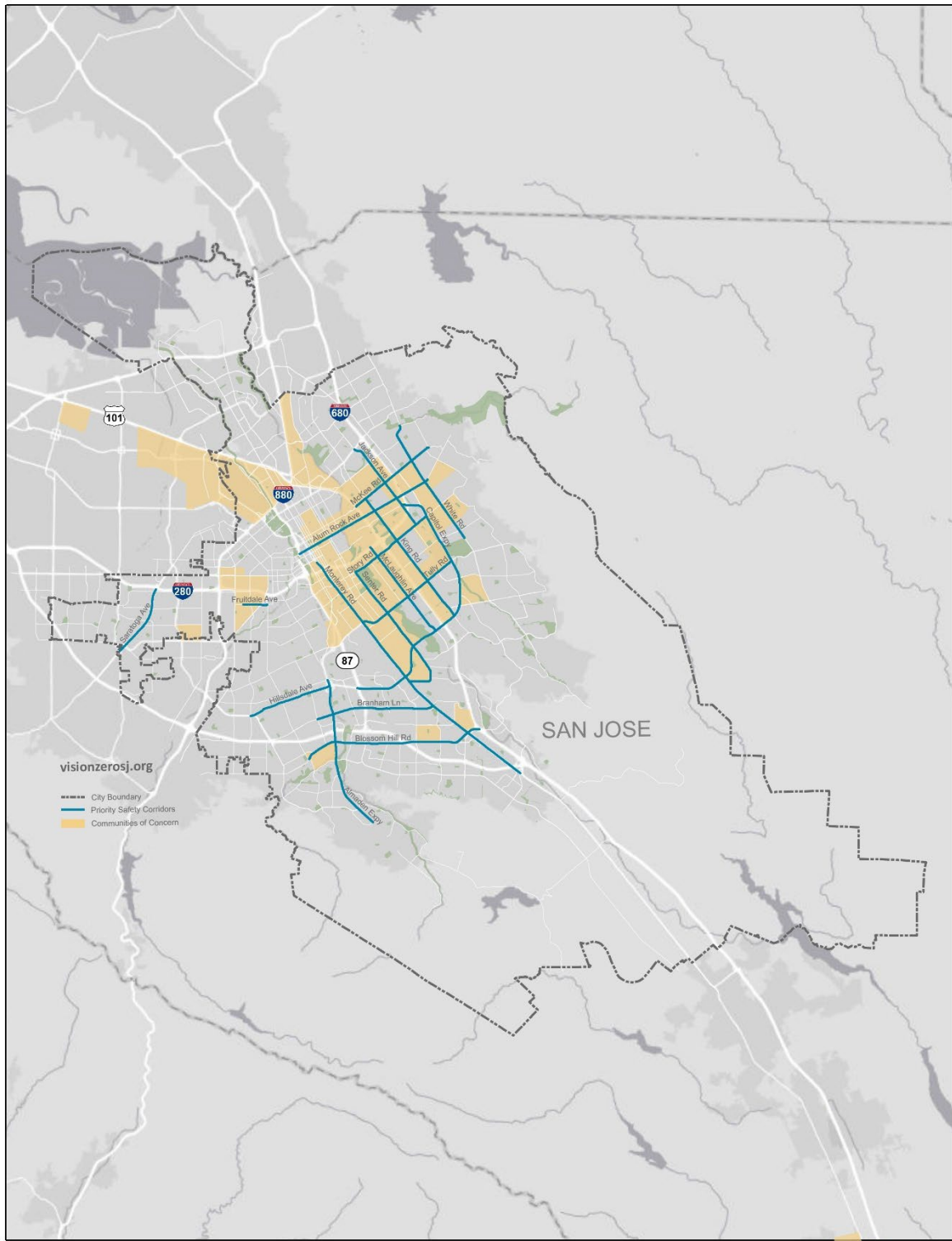
Developers and projects are considered partners that can help the City achieve the Vision Zero goals of safer streets for everyone. The LTA ensures that a project conforms to the goals of the Vision Zero program. **Figure 7** shows the City’s Vision Zero corridors.

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<sup>14</sup> A Multimodal Transportation Improvement Plan (MTIP) is an area-based prioritized list of projects and programs intended to facilitate realization of goals and objectives identified in a long-range plan. MTIPs for Downtown, West San José, and East San José are underway at the development of this Handbook.

<sup>15</sup> The City’s Vision Zero corridor evaluation reports are underway at the time of the development of this Handbook.

**Figure 7 Vision Zero Priority Safety Corridors (April 2023)**



## 5.4. AMERICANS WITH DISABILITIES ACT (ADA)

The ADA is a civil rights law that prohibits discrimination against individuals with disabilities in all areas of public life, including jobs, schools, transportation, and all public and private places that are open to the public. In support of this, the City has adopted a General Plan policy to ensure all public rights-of-way are safe and accessible to all users. An assessment of the pedestrian facilities within the identified project sphere will be required including any intersections or driveways without ADA ramps. Projects will be required to construct or reconstruct ADA ramps, especially to existing transit stops.

## 5.5. PEDESTRIAN GENERATORS

Private schools, community centers, libraries, parks, and other high pedestrian generators should be evaluated for pedestrian activities. These projects may be required to collect data on adjacent neighborhood streets and propose pedestrian crossing improvements, electronic speed limit signs, or other improvements if appropriate.

These high pedestrian generators should also be evaluated for safe pedestrian access. Projects that add traffic to the adjacent streets may be required to implement improvements to improve pedestrian access to and from these community facilities.

## 5.6. TRANSIT

Projects will be evaluated based on their ability to support transit ridership. An assessment of (1) transit facilities and services, (2) access to transit, and (3) transit operations. These assessments should include the following elements:

### Transit Facilities and Services:

- Any permanent or temporary reduction of transit availability or interference with existing transit users (e.g. relocation/reconstruction/closure of a transit stop or vacation of a roadway utilized by transit);
- Existing transit services with stops within ½ a mile from a project, including route character, service areas, hours of service, peak period headways, and types of vehicles (e.g. bus, light rail, etc.);
- For projects located more than ½ a mile from existing or planned transit services: (1) assess the potential of generating a demand for such services; (2) large projects are encouraged to identify funding sources to provide public or private transit services; and (3) if there is an adopted plan on a transit priority corridor, a project may construct or contribute to the buildout of the plan;
- If an existing or planned transit stop is located along the project frontage, transit stop improvements may be required as part of the project frontage improvements. If an existing or planned transit stop requires the installation of a shelter where additional right-of-way is needed, or if the new transit stop is not located along the project frontage, the transit agency will coordinate with the affected property owners prior to construction of such improvements by the project;

- Proposed actions to enhance transit services, transit facilities (e.g. bus stop improvements), or to mitigate adverse effects on existing transit systems or facilities that result from the project.

#### Access to Transit:

- Pedestrian and bicycle access from the project to nearby transit stops, including an inventory of facilities and deficiencies for access within the site (i.e., from building entrances/exits to public sidewalks) and off-site (i.e., presence/absence of continuous sidewalks and safe crossings to access transit). Access to transit is also described in the Site Circulation and Access section (**Section 5.12**);
- Proposed actions to prioritize and improve pedestrian and bicycle access to transit stops, or to mitigate adverse effects on pedestrian and bicycle access to transit stops that result from the project.

#### Transit Operations:

- The *Envision San José 2040 General Plan EIR* analyzed the effects of future growth on transit speeds along transit priority corridors. If a project is not transit-supportive, it should be assessed for its effects on transit operations. This assessment may be qualitative (e.g. based on the site circulation and access analysis) or quantitative (e.g. based on the intersection operations analysis);
- If a large project is found to have an adverse effect on transit operations, the project should work with the City and VTA to identify feasible transit priority measures (e.g. transit signal priority, queue jump lanes, transit bulb-outs, and dedicated bus lanes, etc.) near the affected facilities and include contributions to any applicable projects that improve transit operations.

## 5.7. INTERSECTION OPERATIONS ANALYSIS

A project is required to conduct an intersection operations analysis if the project would add a measurable number of vehicle-trips to any signalized intersections in the proximate area (defined later in this section). Public Works will provide any available intersection data for use in the analysis. New data will be included in the work scope if the City's available data are older than two years.

An intersection operations analysis will require assumptions related to project trip generation, trip distribution, and trip assignment. These assumptions should be submitted with the proposed work scope for review and approval. The trip generation analysis should include any proposed trip reduction, if applicable.

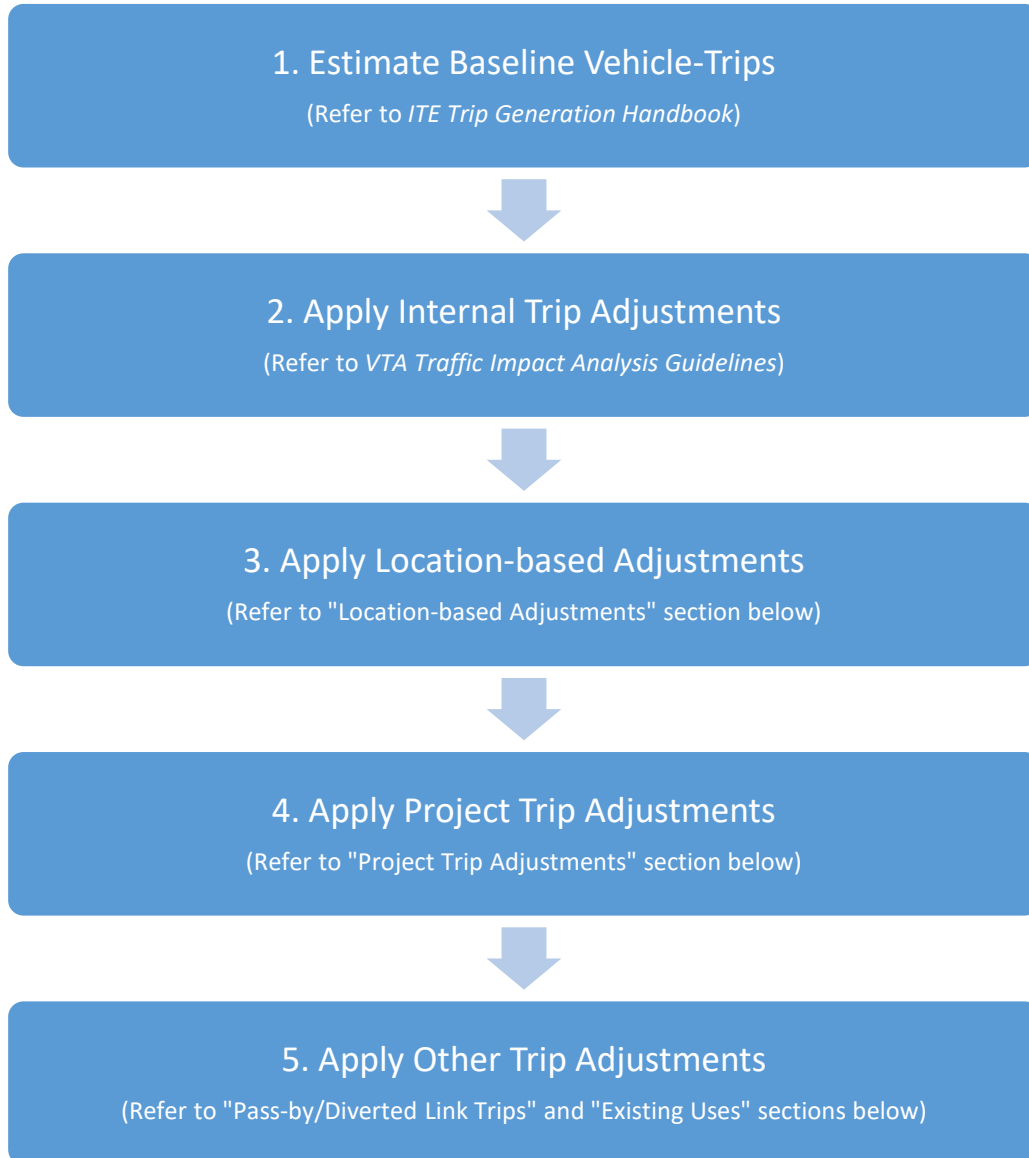
### *Trip Generation*

A trip generation analysis estimates the number of external vehicle-trips generated by a project. **Figure 8** presents a flow chart of performing a trip generation analysis. Steps 1, 2, and 5 are consistent with the standard trip reductions outlined in the *VTA Transportation Impact Analysis Guidelines*. Steps 3 and 4 reflect the estimated mode share for people entering or exiting a project and are consistent with the peer/study-based trip reductions outlined in the *VTA Transportation Impact Analysis Guidelines*.



1. **Estimate Baseline Vehicle-Trips:** This step is the base estimation of gross vehicle-trips generated by a project. A project's vehicle-trips are first estimated by using the vehicle-trip rates from the *ITE Trip Generation Manual* or other approved source(s). This establishes a project's baseline vehicle-trips before internal and external trip adjustments are applied.
2. **Apply Internal Trip Adjustments:** For mixed-use projects, the internal capture trips should be estimated prior to applying the external trip adjustments. Refer to the *VTA Transportation Impact Analysis Guidelines* for the vehicle-trip reduction rates for mixed-use projects.
3. **Apply Location-based Adjustments:** This is the first external trip adjustment to be applied. Based on the location of the project, the estimated vehicle mode share is applied to the adjusted vehicle-trips from Step 2. Refer to the "Location-based Adjustments" section below for more information. This results in an estimated project external vehicle-trips based on location.
4. **Apply Project Trip Adjustments:** The project external vehicle-trips can be further reduced if the project includes conditions that would result in fewer vehicle-trips than a typical site in a similar context. This is the second external trip adjustment to be applied. Refer to the "Project Adjustments" section below for more information. This results in an estimated project external vehicle-trips based on both location and project conditions.
5. **Apply Other Adjustments:** The project external vehicle-trips can also be further reduced based on trip type (e.g. pass-by, primary, diverted, and existing uses). Refer to the "Pass-by and Diverted Link Trips" and "Existing Uses" sections below for more information. This results in the net external vehicle-trips generated by the project.

**Figure 8**      **Project Trip Generation Flow Chart**



### Location-based Adjustments

Adjusting the baseline project vehicle-trips is necessary because people entering or exiting a project often have different mode shares than the ITE sites. The project vehicle mode share is estimated based on the place type in which the project is located. Location-based vehicle mode share is estimated for five place types (**Table 16**) and three uses (residential projects, office or industrial projects, and retail projects). Refer to the Santa Clara Countywide VMT Evaluation Tool (<https://vmttool.vta.org/>) to obtain the place type for a project parcel.

**Table 16** Place Types in San José <sup>16</sup>

Place Type	Number of Census Tracts	Description
<b>Central City Urban</b>	1	Very high density, excellent accessibility, high public transit access, low single-family homes, older high-value housing stock.
<b>Urban High-Transit</b>	6	High density, good accessibility, high public transit access, low single-family homes, middle-aged and older housing stock.
<b>Urban Low-Transit</b>	92	Good accessibility, low vacancy, middle-aged housing stock.
<b>Suburb with Multi-family Homes</b>	49	Average on most indicators, low single-family homes.
<b>Suburb with Single-Family Homes</b>	56	Low density and accessibility, low vacancy, high newer single-family homes.
<b>Total</b>	204	

**Table 17** presents the location-based vehicle mode share based on outputs from the *San José Travel Demand Model*. This location-based adjustment is a function of multimodal connectivity – the more accessibly, safely, and comfortably connected the area is to transit, bicycle, and pedestrian networks, the higher the percent of project trips made in vehicles. The appropriate vehicle mode share adjustment is applied to the baseline project vehicle-trips. This results in an estimated project vehicle-trips based on location.

<sup>16</sup> Salon, D. (2013). *Quantifying the effect of local government actions on VMT*. California Air Resources Board, California Environmental Protection Agency.

**Table 17** Location-based Vehicle Mode Share (March 2018)<sup>17</sup>

Place Type	% Vehicle Mode Share		
	Residential	Office/ Industrial	Retail
Central City Urban	71%	69%	84%
Urban High-Transit	78%	69%	83%
Urban Low-Transit	87%	91%	87%
Suburban with Multifamily Homes	88%	92%	88%
Suburban with Single-Family Homes	94%	95%	91%

### Project Trip Adjustments

One of the LTA goals is to encourage projects to reduce personal motorized vehicle-trips and increase alternative transportation mode share. The VMT reduction strategies, discussed in **Section 3.6**, would not only reduce VMT for a project but also reduce vehicle-trips and increase alternative transportation mode share for the project. The VMT reduction strategies include:

- Project characteristics (e.g. density, diversity of uses, design, and affordability of housing) that encourage walking, biking and transit uses;
- Improvements to the multimodal network that increase accessibility for transit users, bicyclists, and pedestrians;
- Parking measures that discourage personal motorized vehicle-trips;
- TDM measures that provide incentives and services to encourage alternatives to personal motorized vehicle-trips.

Implementation of one or more of these strategies will encourage reductions in vehicle-trips generated by projects compared to standard trip generation rates. A project that implements part or all of these strategies may apply the associated vehicle-trip reduction, which can be estimated using the sketch tool. This project trip adjustment is applied so that the project vehicle-trip estimate aligns well with its VMT estimate.

For residential projects, it is assumed that every percent reduction in per-capita VMT is equivalent to one percent reduction in peak hour vehicle-trips. For office and industrial projects, it is assumed that every percent reduction in per-employee VMT is equivalent to one percent reduction in peak hour vehicle-trips.

<sup>17</sup> Based on output produced from the *San José Travel Demand Model*.

A project may propose new measures that are not included in the sketch tool. In order to be eligible for the project trip adjustments, the transportation consultant must submit substantial evidence of their effect on reducing project vehicle-trips for review and approval by the Director of Public Works.

### *Pass-by and Diverted Link Trips*

Primary vehicle-trips are trips attracted to a project where the project is the (primary) destination. Pass-by trips are intermediate stops on the way from an origin to a primary destination without diverting to another street to access a project. Diverted link trips are intermediate stops on the way from an origin to a primary destination that require diversion from one roadway to another to gain access to the site. Refer to the *VTA Transportation Impact Analysis Guidelines* for estimates of pass-by, primary and diverted vehicle-trips for most retail uses.

The percentage of pass-by and diverted link trips should be estimated based on data provided by ITE or actual surveys of similar land uses. The net new vehicle-trip generation estimates should be used to assign project trips to the roadway network and the appropriate pass-by and diverted link trips should be added to or subtracted from the appropriate intersection turning movements.

### *Existing Uses*

Vehicle-trip credits associated with existing use at the project site may be acceptable. Applying vehicle-trip credits provides a more accurate estimation of net new vehicle traffic to be added to the existing roadway network. Public Works determines vehicle-trip credits associated with existing use(s) at the project site.

### *Sample Trip Generation*

The example below illustrates how vehicle-trip adjustments are applied.

A multi-family residential project located in an “Urban High-Transit” place type with the ITE baseline of 500 PM peak hour vehicle-trips. The vehicle mode share in an “Urban High-Transit” place type is 78 percent. The adjusted project vehicle-trips based on location is  $(500 \times 78\%) = 390$  vehicle-trips.

Next, based on the VMT analysis, the project would achieve 10 percent reduction in per-capita VMT relative to Existing VMT (defined in **Section 3.6**). Project vehicle-trips are then estimated by applying 10 percent reduction to the 390 vehicle-trips. The adjusted vehicle-trips based on location and project conditions is  $390 \times (1 - 10\%) = 351$  vehicle-trips. Assuming that the project site is currently vacant without existing use, there are no other trip adjustments to be applied. Therefore, the net external PM peak hour vehicle-trips generated by the project is 351. **Table 18** summarizes the trip generation calculations for this example.

Where the adjustment factors do not adequately reflect travel characteristics for project occupants, the transportation consultant may choose to use a separate method or tool to estimate vehicle-trip reduction, subject to the review and approval by Public Works.

**Table 18**      **Sample Trip Generation for a Residential Project**

PM Peak Hour Vehicle-Trips
----------------------------

1. Estimate Baseline Vehicle-Trips	500
2. Apply Internal Trip Adjustments	N/A
3. Apply Location-based Mode Share Adjustments	$500 * 78\% = 390$
4. Apply Project Trip Adjustments	$390 * (1 - 10\%) = 351$
5. Apply Other Trip Adjustments	N/A
<b>Final project vehicle-trips</b>	<b>351</b>

### *Trip Distribution*

Trip distribution forecasts the travel direction of vehicles generated by a project. Trip distribution percentages should be included in the transportation analysis on a figure showing an area map with the transportation network and the project. The trip distribution figure should show trip percentages at gateways, on nearby freeway segments, and along major arterials that provide direct access to the project.

Trip distribution can be determined from zip code data, census data, market research, travel demand models, existing travel patterns, and/or the locations of complementary land uses, and professional engineering judgement. Trip distribution assumptions should be consistent for developments of the same use in the same areas. The trip distribution figure must be submitted with the work scope for review and approval by Public Works prior to use.

### *Trip Assignment*

Trip assignment consists of assigning vehicle-trips to certain routes on the roadway system based on the trip distribution percentages. Assignment of vehicle-trips should be based on existing and expected traffic volumes and patterns. Trip assignment forecast from a travel demand model may also be used, particularly for long-term land use plans or development projects where the transportation network near the project is expected to change substantially.

Trip assignment figures should contain the project’s traffic turning movement volumes at each study intersection and all other signalized intersections in the project’s vicinity. The figures must be submitted with the work scope for review and approved by Public Works prior to use. Before an approved project is built and occupied, these vehicle-trips will appear in the Approved Trip Inventory (ATI) as “approved trips” to be used for any future transportation analysis in the area.

### *Study Scenarios*

- Background Conditions:** Public Works will provide the Approved Trip Inventory (ATI), the database of vehicle-trips of approved but not yet constructed projects for use in the analysis. ATI volumes should be added to existing intersection volumes to represent background conditions. The transportation consultant should review the ATI and verify the accuracy of the volumes provided by Public Works to the greatest extent possible (i.e., balanced volumes

between adjacent intersections). Public Works will also provide information on any funded roadway improvements that should be included in the background conditions analysis.

- **Background plus Project Conditions:** The project vehicle-trips are added to background traffic volumes to obtain background plus project volumes. Background plus project conditions is evaluated relative to background conditions to determine potential adverse operational effects.

### *Study Intersections*

If a project is expected to add 10 vehicle-trips per hour per lane to a signalized intersection that meets any of the following conditions, the intersection is included in the intersection operations analysis:

- Within a ½-mile buffer from the project's property line;
- Designated Congestion Management Program (CMP) facility outside of the City's Infill Opportunity Zones (defined in **Section 5.9**);
- With the potential to be effected by the project, per engineering judgement of Public Works.

Public Works determines the list of study intersections for the intersection operations analysis.

### *Data Collection*

Public Works will request new traffic volume counts from a transportation consultant if the most recent existing counts in the City's database were collected more than two years ago. New intersection turning volume counts, if requested, should be collected and processed by a transportation consultant as follows:

- Obtain new, AM and PM two-hour peak period data – vehicle and bicycle counts by turning movement counts, and pedestrian counts by crosswalk leg – at the selected intersections required by Public Works. Intersections are to be counted only Tuesdays through Thursday during non-holiday periods and not on the week of a holiday under fair weather conditions. Studies of certain land uses may require intersection turning movement counts during a non-standard peak period. The work scope will specify the period(s) for which intersection turning movement counts should be taken;
- The peak hour volumes consist of counts from the four highest consecutive 15-minute count intervals during the peak period;
- Review and evaluate each new count and notify Public Works of any irregularities or discrepancies found;
- Submit new counts, along with any evaluation comments, to Public Works for review and approval. New counts should be submitted in the same template format Public Works provide. All approved data will be incorporated into the City's transportation databases.

### *Intersection Operations*

Intersection operations analysis is a measure of traffic operations at signalized intersections in the form of average automobile delay. The standards used by the City to measure intersection operations are described in **Table 19**. The City's acceptable intersection operations standard is D unless superseded by an Area Development Policy.

**Table 19 Intersection Operations Standards at Signalized Intersections**

Operations Standard	Descriptions	Average Control Delay (seconds/vehicle)
A	Operations with very low delay occurring with favorable progression and/or short cycle lengths.	10.0 or less
B	Operations with low delay occurring with good progression and/or short cycle lengths.	Between 10.1 and 20.0
C	Operations with average delays resulting from fair progression and/or longer cycle lengths. Individual cycle failures begin to appear.	Between 20.1 to 35.0
D	Operations with longer delays due to a combination of unfavorable progression, long cycle lengths, and high volume-to-capacity (V/C) ratios. Many vehicles stop and individual cycle failures are noticeable.	Between 35.1 to 55.0
E	Operations with high delays indicating poor progression, long cycle lengths, and high V/C ratios. Individual cycle failures are frequent occurrences.	Between 55.1 to 80.0
F	Operations with delays unacceptable to most drivers occurring due to over-saturation, poor progression, or very long cycle lengths.	Higher than 80.0

### *Intersection Operations Analysis Methodologies*

Intersection operations analysis should be completed for all study intersections using the *Highway Capacity Manual* methodologies and the *VTA Traffic Level of Service Analysis Guidelines*. The analysis should include all study periods specified in the scope of work. The transportation consultant should obtain current signal timing information from Department of Transportation and use these data in the analysis of signalized intersections.

### *Adverse Intersection Operations Effects*

An adverse effect on intersection operations occurs when the analysis demonstrates that a project would cause the operations standard at a study intersection to fall below D with the addition of project vehicle-trips to baseline conditions. For intersections already operating at E or F under the baseline conditions, an adverse effect is defined as:

- An increase in average critical delay by 4.0 seconds or more AND an increase in the critical volume-to-capacity (V/C) ratio of 0.010 or more; OR
- A decrease in average critical delay AND an increase in the critical V/C ratio of 0.010 or more.



### *Addressing Adverse Intersection Operations Effects*

There are three possible approaches to address negative effects at signalized intersections:

- Reduce project vehicle-trips to eliminate the adverse effects and bring the intersections back to the background conditions. The VMT tool can be used to select additional measure(s) that would achieve this reduction;
- Construct improvements to the subject intersection(s) or other roadway segments of the citywide transportation system to increase overall capacity;
- Implement a trip cap, the maximum number of daily vehicle-trips allowed to be generated by a project. The City, in coordination with the applicant, will set a trip cap for the project at a level that is attainable through proven means and reduce the adverse operations effects to background conditions. Refer to the Mitigation Measures Compliance and Monitoring section in **Section 3.8** for more information.

A project should prioritize improvements related to alternative transportation modes, parking measures, and/or TDM measures. Improvements that increase vehicle capacity are secondary and must not have unacceptable effects on existing or planned transportation facilities. Unacceptable effects on existing or planned transportation facilities include the following:

- Inconsistent with the General Plan Transportation Network and Street Typologies;
- Reduction of any physical dimension of a transportation facility below the minimum design standards per the *San José Complete Streets Design Standards and Guidelines*; OR
- Substantial deterioration in the quality of existing or planned transportation facilities, including pedestrian, bicycle, and transit systems and facilities, as determined by the Director of Transportation.

## 5.8. CONGESTION MANAGEMENT PROGRAM

In accordance with California Statute, Government code 65088, Santa Clara County has established a CMP. The intent of the CMP legislation is to develop a comprehensive transportation improvement program among local jurisdictions that will reduce traffic congestion and improve land use decision-making and air quality. VTA serves as the Congestion Management Agency (CMA) for Santa Clara County's CMP.

As the CMA, VTA is required by California Statute to monitor roadway traffic congestion and the impact of land use and transportation decisions on a countywide level, at least every two years. VTA conducts CMP monitoring and produces the CMP Monitoring and Conformance Report on an annual basis.

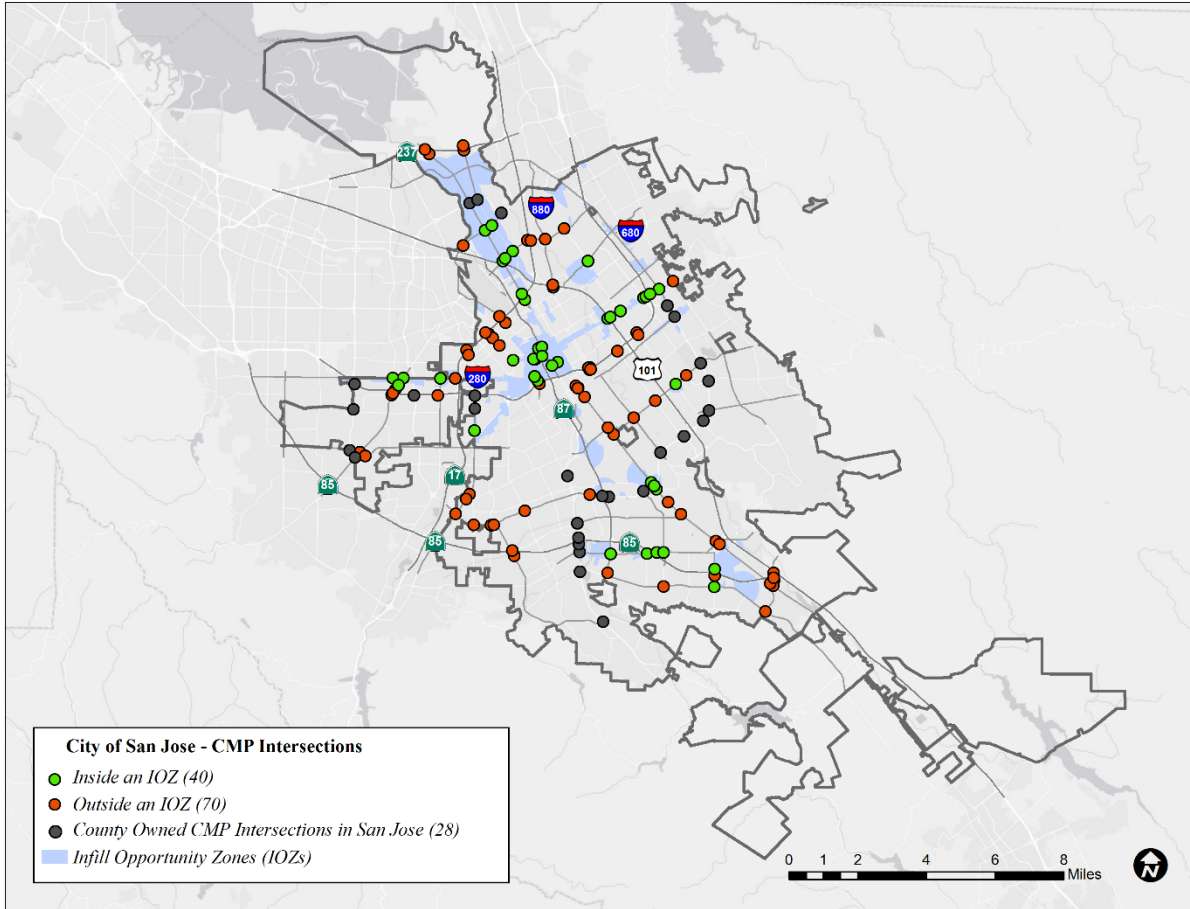
As a member agency, the City is required to conform to the CMP requirements for evaluating the transportation impacts of land use decisions on the designated CMP Roadway System. The program is established to address regional transportation issues across City boundaries. The LTA requirements for projects are intended to conform to the CMP requirements. Projects should assess their effects on the designated CMP Roadway System using the *VTA Transportation Impact Analysis Guidelines*, the *VTA Traffic Level of Service Analysis Guidelines*, and this handbook.

### *Infill Opportunity Zones*

In recognition of the environmental benefits afforded by infill development and to balance the need to maintain acceptable operations with the need to build infill and mixed-use developments within walking distance of mass transit facilities and high-density areas, the CMP legislation provides local jurisdictions options to designate Infill Opportunity Zones (IOZ) and exempt CMP facilities located within the IOZ from the provisions of CMP's intersection operations standards. **Figure 9** shows the City's adopted IOZ map and the exempted CMP facilities.

While there is still a requirement to measure performance of CMP facilities that are located outside of the adopted IOZ, the CMP regulations allow for some flexibility in determining how congestion is measured and what improvements are implemented in response to increased congestion. Examples include shifting the focus of transportation investments from roadway expansion to alternative transportation modes.

**Figure 9 San José Infill Opportunity Zone and CMP Facilities (March 2018)**



## 5.9. INTERSECTION PHASING AND QUEUING ANALYSIS

An intersection phasing and queuing analysis may be required in the following instances:

- At signalized intersections where the intersection operations analysis indicates that there will be an adverse effect;
- At other intersections or freeway ramps, based on proximity of the development project to a freeway interchange, existing queuing spillback conditions, or localized conditions along the project’s frontage.

### *Intersection Phasing Analysis*

An intersection phasing analysis evaluates the added project traffic to an existing signal to determine if an existing phasing needs to be upgraded.

### *Left-Turn or Right-Turn Storage Analysis*

Left-turn or right-turn storage analysis measures how many vehicle-trips a project would add to an existing turn pocket and determines if the pocket needs to be lengthened and/or improved. It is performed by comparing Background plus project conditions with Background conditions. Adverse effects of queuing should be identified by comparing the calculated design queue to the available queue storage. Queuing effects include, but are not limited to the following:

- Spillback queues from turn lanes at intersections that block through traffic;
- Queues from an intersection that extend back and affect other intersections;
- Queues from bottleneck locations such as lane drops that impact the intersection operations;
- Spillback queues from freeway ramps that affect local street or freeway operations;
- Queues at intersections that are proximate to freeway ramps.

### *Un-signalized Intersections*

Un-signalized intersection analysis may be required at intersections providing project access. The current macroscopic operational analysis model that supports the *Highway Capacity Manual (HCM)* should be used to evaluate operations at un-signalized intersections affected by project traffic. Un-signalized intersection analysis indicates if improvements such as a new traffic signal, stop controls, or median island modifications, etc., would be needed. If a new traffic signal is recommended, a separate signal warrant study may also be required.

## 5.10. SIGNAL WARRANT STUDY

Traffic signal warrant studies may be required when a project proposes a signalized entrance or has the potential to effect operations and safety at an existing un-signalized intersection proximate to the project. For most intersections, only the peak hour warrant will be required. However, the project may be required to perform other traffic signal warrants, if determined necessary.

Traffic signal warrant studies are required to conform to the *California Manual on Uniform Traffic Control Devices (CA MUTCD)* standards. Investigation of the need for a traffic control signal should include an analysis of factors related to the existing operations and safety at a study intersection and the potential to improve these conditions. The study may include an evaluation of the following traffic signal warrants:

- Warrant 1: Eight-Hour Vehicular Volume;
- Warrant 2: Four-Hour Vehicular Volume;
- Warrant 3: Peak Hour;
- Warrant 4: Pedestrian Volume;
- Warrant 5: School Crossing;
- Warrant 6: Coordinated Signal System;
- Warrant 7: Crash Experience;
- Warrant 8: Roadway Network;
- Warrant 9: Intersection near a Grade Crossing.

It is important to note the satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal. The Department of Transportation will determine if a traffic signal is required.

## 5.11. SITE CIRCULATION AND ACCESS

This section evaluates the intersection of a project and the public right-of-way. The evaluation of the site circulation and access should consider the following issues:

- Proposed pedestrian access and on-site circulation with recommendations to encourage pedestrian trips to and within the site. Sidewalk, walkway, trail, and path of travel on foot to building entrances should be evaluated. Pedestrian access between the site and the nearest transit stops or stations should be assessed and prioritized in site design. Any adverse circulation issues should be addressed;
- Proposed bicycle access and on-site circulation with recommendations to encourage bicycle trips to and within the site. Bike lanes and path of travel by bicycle to the bicycle parking and/or building entrances should be assessed. Any adverse circulation issues should be addressed;
- The extent to which the ability of bicyclist and pedestrians to access the site is inhibited by man-made and natural barriers such as railroad crossings, rivers, freeways, dead-end streets, and cul-de-sacs, should be addressed;
- Trips entering and exiting the site at each driveway and parking garage entrance. Distribution of trips to access points should consider street configuration, storage lanes, acceleration and deceleration lanes, and sight distance;
- A site plan with adequate detail to show automobile, bicycle, and pedestrian circulation within the site and connections to the off-site transportation network;
- Emergency vehicles and service vehicles such as delivery and garbage trucks.

The goal of this evaluation is to establish safe and efficient site access and circulation to and from a project by identifying potential conflicts and propose solutions to those conflicts.

## 5.12. SIGHT DISTANCE

A sight distance analysis will be required at a project driveway if there is potential physical obstruction, or the driveway is located along a horizontal or vertical curve. A sight distance analysis should be performed based on the *American Association of State Highway Transportation Officials (AASHTO)* standards. This evaluation ensures that driveways and parking garage access have a clear line of sight.

For parking garage entrances, especially where parking structures are proposed at the back of a driveway, sight distance evaluations should consider the intersection of vehicles accessing the parking garage with pedestrians and bicyclists crossing the driveway.

### 5.13. DRIVEWAY OPERATIONS

All project access driveways should be evaluated to ensure driveway locations are safe, visible and do not conflict with pedestrian or bicycle facilities. Driveways should be minimized in both number and size. An LTA may evaluate driveways for the following:

- Location: Driveways should be a minimum of 150 feet from any intersection;
- Number of driveways: Approximately 300 to 600 peak hour trips per driveway;
- Driveway design: Standard driveways (typical) or modified curb-return with ADA accessible ramps. Modified driveways may be allowed for signalized entrances, large vehicle uses such as warehouses or distribution centers with primary truck traffic, or ceremonial or major entrances to large developments.

### 5.14. TRAFFIC GAP ANALYSIS

For projects located along busy arterials with no traffic controls, gap analysis may be required to ensure adequate gaps in traffic to accommodate project traffic and provide safe access. This analysis measures the speed and volume of traffic of an existing roadway to determine whether existing gaps in traffic are available to facilitate safe access between the project driveway and nearby streets.

### 5.15. DELIVERY, WASTE, AND MOVING TRUCKS

An evaluation of a truck turning template and truck loading area(s) may be required. If a project proposes loading areas in the public right-of-way, the analysis should determine feasibility, location, hours of operation, to ensure there would be no conflicts with the surrounding the transit, bicycle, and pedestrian facilities.

### 5.16. NEIGHBORHOOD PARKING INTRUSION

Projects may be required to evaluate nearby neighborhoods for potential parking intrusion by doing the following:

- Conduct parking survey on identified streets prior to implementation of the project;
- Conduct parking survey on identified streets approximately six (6) to twelve (12) months after the project is fully operational or occupied;
- Implement a parking plan as recommended by the Department of Transportation based on survey results. The parking plan may include establishment of a Residential Parking Permit Program (RPP), installation of parking control signs, and other parking management actions.

### 5.17. NEIGHBORHOOD TRAFFIC INTRUSION

If a project is expected to generate conflicting traffic with adjacent land uses (i.e., commercial traffic generated along neighborhood residential streets) or result in excessive speeds and/or volumes on neighborhood streets, the project may be required to construct traffic calming measures. Traffic

calming measures may include: bulb-outs, median refuges, road humps, electronic speed limit signs, or other measures.

Refer to City's Traffic Calming Policy (Council Policy 5-6) for more information. Projects required to evaluate nearby neighborhoods for potential intrusion will:

- Conduct speed and volume study on identified streets prior to implementation of the project;
- Conduct speed and volume study on identified streets approximately six (6) to twelve (12) months after the project is fully operational or occupied;
- Implement approved traffic calming or traffic control as warranted by the analysis.

Some traffic calming measures, such as bulb-outs and median refuges, etc., can be implemented by the project without requiring a comprehensive study.

## 5.18. CONSTRUCTION

All projects should anticipate construction impacts with new developments. Typically, construction impacts are identified in the CEQA document prepared for a project. To the extent possible, operational analysis should include information about project construction schedule such as duration, hours of operations, any required grading, potential haul routes, traffic control plans, closure or relocation of bus stops, street closures, and construction entrances, etc., especially when adjacent to residents and businesses.

## 5.19. OTHER RELEVANT ANALYSES

Other types of analyses that may be requested in the Local Transportation Analysis chapter of the TA report include, but are not limited to, the following:

- Median island or channelization island movement restrictions
- Acceleration or deceleration lanes
- Average Daily Traffic (ADT) volumes and speeds
- Turning movement volumes
- Signal coordination plans
- Drive-through use
- Emergency vehicle access

## 6. CITY TRANSPORTATION PROJECTS

### 6.1. CEQA TRANSPORTATION ANALYSIS

CEQA transportation analysis requires an evaluation of project impacts related to VMT. This section explains the significance criteria, screening criteria, thresholds of significance, and methodologies of VMT analysis to be used in CEQA documents and transportation analysis reports for transportation projects.

### 6.2. SIGNIFICANCE CRITERIA

In accordance with the California Natural Resources Agency and the Office of Planning and Research's CEQA Guidelines, a transportation project could have a significant effect on the environment if it:

- a) Conflicts with a plan, ordinance, or policy addressing the circulation system, including transit, roadways, bicycle lanes, and pedestrian paths;
- b) Conflicts or is inconsistent with CEQA Guidelines section 15064.3, subdivision (b)(2);
- c) Substantially increases hazards due to a geometric design feature (e.g. sharp curves or dangerous intersections) or incompatible uses (e.g. farm equipment);
- d) Results in inadequate emergency access.

### 6.3. CEQA TRANSPORTATION PERFORMANCE METRICS

#### *Percent Change in Total VMT*

Shortly after the project becomes operational, induced VMT may occur where road users respond to an initial appreciable reduction in travel time. With lower travel times, the modified facility becomes more attractive to travelers, resulting in four short-run trip-making changes: (1) longer trips; (2) changes in route choice; (3) changes in mode choice; and (4) newly generated trips. Longer trips may occur because the ability to travel a long distance in a shorter time increases the attractiveness of destinations that are further away, increasing trip length and VMT. Changes in route choice may occur immediately when faster travel times on a path attract more drivers to that path from other paths, which can increase or decrease VMT depending on whether it shortens or lengthens trips. Changes in mode choice may also occur in the near-term when travelers respond to a reduction of personal motorized vehicle travel time by shifting toward personal motorized vehicle use from other modes. Newly generated trips may occur when an individual who previously did not have a travel need might have one because of increased speed and decreased travel time. The short-run effect of a project on induced VMT, measured in percent change in total VMT, is evaluated for a project.



## 6.4. SCREENING CRITERIA

**Table 20** lists the types of City transportation projects that are expected to result in less-than-significant VMT impacts. These types of transportation projects would not likely lead to a substantial or measurable increase in VMT and therefore would generally not be required to perform a detailed CEQA transportation analysis.

**Table 20 City Transportation Project Types Screened from CEQA Transportation Analysis**

Project Type	Description
<b>Maintenance</b>	<ul style="list-style-type: none"> <li>Rehabilitation, maintenance, replacement, and repair projects designed to improve condition of existing transportation assets (e.g. roadways, bridges, culverts, tunnels, transit systems, and assets that serve bicycle and pedestrian facilities) that do not add additional motor vehicle capacity.</li> </ul>
<b>Roadway Shoulder</b>	<ul style="list-style-type: none"> <li>Roadway shoulder enhancements to provide “breakdown space” (dedicated space for use only by transit vehicles) to provide bicycle access or to improve safety, but which will not be used as motor vehicle travel lanes.</li> </ul>
<b>Non-through Lanes</b>	<ul style="list-style-type: none"> <li>Installation, removal, reconfiguration of travel lanes that are not for through traffic, such as left-turn, right-turn and U-turn pockets (excluding trap lanes), two-way left-turn-lanes, or emergency breakdown lanes that are not utilized as through lanes.</li> </ul>
<b>Through Lanes</b>	<ul style="list-style-type: none"> <li>Addition of roadway capacity on local or collector streets provided the project substantially improves conditions for pedestrians, cyclists, and/or transit, including but not limited to:               <ul style="list-style-type: none"> <li>❖ Protected and separated Class IV bikeway</li> <li>❖ Pedestrian refuges, bulb-outs, and elements that shorten pedestrian crossing distances</li> <li>❖ Consistency with the <i>San José Complete Streets Design Standards and Guidelines</i> and/or other applicable design guidelines; <u>OR</u></li> </ul> </li> <li>Addition of a new lane that is permanently restricted to use only by transit vehicles; <u>OR</u></li> <li>Reduction in the number of through lanes; <u>OR</u></li> <li>Conversion of roadways from one-way to two-way operations with no net increase in the number of travel lanes.</li> </ul>
<b>Traffic Control Devices</b>	<ul style="list-style-type: none"> <li>Installation, removal, or reconfiguration of traffic control devices, including Transit Signal Priority features; <u>OR</u></li> <li>Timing of signals to optimize vehicle, bicycle, or pedestrian flow.</li> </ul>

<b>Traffic Circles</b>	<ul style="list-style-type: none"> <li>• Installation of roundabouts or traffic circles.</li> </ul>
<b>Traffic Calming Devices</b>	<ul style="list-style-type: none"> <li>• Installation, enhancement, or reconfiguration of traffic calming devices.</li> </ul>
<b>Parking</b>	<ul style="list-style-type: none"> <li>• Removal or relocation of on-street or off-street parking spaces; <u>OR</u></li> <li>• Adoption or modification of on-street parking or loading restrictions (including meters, time limits, accessible spaces, and preferential/reserved parking permit programs)</li> </ul>
<b>Traffic Wayfinding</b>	<ul style="list-style-type: none"> <li>• Addition of traffic wayfinding signage</li> </ul>
<b>Active Transportation</b>	<ul style="list-style-type: none"> <li>• Addition of new or enhanced bike or pedestrian facilities on existing streets/highways or within existing public rights-of-way; <u>OR</u></li> <li>• Addition of Class I bike paths, trails, multi-use paths, or other off-road facilities that serve non-motorized travel; <u>OR</u></li> </ul>
<b>Fuel/Charging Infrastructure</b>	<ul style="list-style-type: none"> <li>• Installation of publicly available alternative fuel or charging infrastructure.</li> </ul>

### *Active Transportation and Transit Projects*

Active transportation and transit projects generally reduce VMT and therefore are presumed to cause a less-than-significant impact on transportation<sup>18</sup>. This presumption may apply to all passenger rail, bus and bus rapid transit, bicycle, and pedestrian infrastructure projects. Streamlining transit and active transportation projects aligns with SB 743 goals of reducing greenhouse gas (GHG) emissions, increasing multimodal transportation networks, and facilitating mixed-use development.

### *Roadway Projects*

Reducing roadway capacity (i.e., a “road diet”) will generally reduce VMT and therefore is presumed to cause a less than significant impact on transportation<sup>17</sup>. However, most other roadway projects, including building new roadways, adding roadway capacity in congested areas, or adding roadway capacity to areas where congestion is expected in the future, may or may not induce additional vehicle travel. For example, adding an extra lane to an especially critical and congested link may leverage VMT growth far beyond that link, increasing VMT to a greater degree. On the other hand, adding a link that greatly improves connectivity by providing drivers a shorter route in exchange for a longer one may in select cases reduce total VMT. Therefore, projects that will likely lead to additional vehicle travel should not be presumed to have less-than-significant impacts.

<sup>18</sup> Office of Planning and Research. (2017). *Technical Advisory on Evaluating Transportation Impacts in CEQA*.

To determine the amount of VMT attributed to a project, an assessment of total VMT without the project, and an assessment with the project, should be made. The difference between these two assessments is the amount of VMT that can be attributed to the project.

## 6.5. THRESHOLDS OF SIGNIFICANCE

The determination of a significant VMT impact is based on the extent to which the project causes a significant increase in short-run induced VMT for roadways (1) within a sphere of influence including feeder and parallel roadways proximate to the project, and (2) within Santa Clara County. **Table 21** shows the significance thresholds for City transportation projects.

**Table 21**      **Thresholds of Significance for City Transportation Projects (March 2018)**

Significance Criteria	Threshold
<b>Percent increase in total VMT for roadways within Sphere of Influence</b>	0.3% for every percent increase in lane-miles for roadways within Sphere of Influence
<b>Percent increase in total VMT for roadways within the Santa Clara County</b>	0.3% for every percent increase in lane-miles for roadways within Santa Clara County

### *Plan Bay Area 2040*

Transportation accounts for more than half of California's greenhouse gas emissions. Achieving California's emissions reduction goals will require steep reductions in emissions from the transportation sector through improving vehicle efficiency, reducing fuel carbon content, and improving travel efficiency (i.e., VMT). Plan Bay Area 2040, the long-range Regional Transportation Plan and Sustainable Communities Strategy (RTP/SCS) for the San Francisco Bay Area, would achieve 18 percent per capita GHG emission reduction in 2035 from 2005 levels<sup>19</sup>. To achieve these GHG reductions, Plan Bay Area 2040 include strategies related to land use, active transportation, TDM, transportation systems management, pricing mechanism, and vehicle technology. With these strategies, Plan Bay Area 2040 shows that the total daily VMT for the Bay Area and the Santa Clara County would increase by 21 percent and 23 percent in 2040 over 2015 levels, respectively. There would be an overall increase of 170 roadway lane-miles, or three percent increase, in the County from 2015 to 2040<sup>20</sup>.

To align with Bay Area and statewide long-term emissions reduction goals, the total allowable increased daily VMT for a project can be calculated as:

<sup>19</sup> *Plan Bay Area 2040*. (2017). Bay Area Metro Center.

<sup>20</sup> *Plan Bay Area 2040 Draft Environmental Impact Report*. (2017). Bay Area Metro Center.

*Total Allowable VMT Incremental Increase*

$$= \frac{23\% \text{ Increase in Total VMT from 2015 to 2040}}{3\% \text{ Increase in Lane Miles} * 25 \text{ Years}}$$

$$= \frac{0.3\% \text{ Incremental Increase in Total VMT}}{1\% \text{ Increase in Lane Miles}}$$

## 6.6. PROJECT IMPACT ANALYSIS

Project impact analysis assesses the short-run effect of a project on induced VMT by estimating the percent change in total VMT for the year by which the project is expected to be operational. Total VMT without the project and that with the project should be compared; the percent change between the two is the amount of short-run induced VMT attributed to the project.

### *Roadways within Sphere of influence*

The sphere of influence of a project is defined as the area in which driving patterns are expected to change due to the project. The sphere of influence should not be truncated at a modeling or jurisdictional boundary for convenience of analysis when travel behavior is substantially affected beyond that boundary. For every percent increase in roadway lane-miles that a project will add to the sphere of influence in which driving patterns are expected to change, the project is said to cause a significant transportation impact if it results in 0.3 percent or greater increase in total VMT for all roadways within the sphere of influence. For example, if a project would increase the roadway lane-miles in the sphere of influence by 10 percent, a significant transportation impact would result if the project would cause the total VMT within the sphere of influence by three percent.

### *Roadways within Santa Clara County*

All roadways within Santa Clara County are also evaluated. For every percent increase in roadway lane-miles that a project will add to the transportation network within Santa Clara County, the project is said to cause a significant transportation impact if it results in 0.3 percent or greater increase in total VMT for all roadways within the County. For example, if a project would increase the total roadway lane-miles in the County by 0.1 percent, a significant transportation impact would result if the project would cause the total VMT for all roadways within the County by 0.03 percent.

## 6.7. CUMULATIVE IMPACT ANALYSIS

Estimating long-run induced VMT is important because it captures the full effect of the project rather than just the early-stage induced VMT effect. Besides longer trips, changes in path choice, changes in mode choice and newly generated trips, the project should also be evaluated for its potential long-run land use-inducing impacts and its associated trip-making changes. Faster travel times along a corridor lead to land development further along that corridor which may generate longer trips and VMT increase in the long run.

Long-run induced VMT should be estimated using the change in total VMT method for the horizon year of the General Plan. This analysis should cover both the Sphere of influence Total VMT and the Countywide Total VMT. An assessment of total VMT without the project and that with the project should be made; the difference between the two is the amount of long-run induced VMT attributable to the project.

## 6.8. MITIGATION MEASURES

Induced VMT has the potential to reduce or eliminate congestion relief benefits, increase VMT, and increase other environmental impacts resulted from vehicle travel<sup>21</sup>. When a significant impact is identified, mitigation measures shall be considered to reduce that impact. In the context of increased travel induced by capacity increases, projects may need to be modified to minimize or avoid substantial induced VMT. Appropriate mitigation to project impacts, such as reducing the scope of the capacity increase or enhancing active transportation components, should be considered and evaluated in the TA.

Impacts resulting from cumulative impact analyses are assumed to occur in the context of full build-out of land uses and transportation network per the General Plan. There is, therefore, little scope for identifying and evaluating new or additional mitigation as it is usually discussed in CEQA documents. In some situations, there may be currently unplanned infrastructure improvements that could provide mitigation for the cumulative impacts. In many cases, behavioral modification (such as greater use of alternative travel modes than was assumed in the travel demand model), transit station enhancements, or other factors that may reduce VMT even though they may not qualify for CEQA mitigation measures. The TA should discuss what, if any, mitigation might be applicable for cumulative impacts.

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<sup>21</sup> Office of Planning and Research. (2017). *Technical Advisory on Evaluating Transportation Impacts in CEQA*.

## 7. GENERAL PLAN AMENDMENTS

The City's General Plan Amendments (GPA) long-range transportation analysis requires an evaluation of potential impacts on the citywide transportation system in the horizon year of the General Plan (2040) when the land use capacities are fully developed. There are two types of GPA transportation analysis: (1) site-specific long-range transportation analysis and (2) cumulative long-range transportation analysis.

GPA long-range transportation analyses are conducted during the City's General Plan Amendment cycle for developer-initiated General Plan amendments. Projects that require an EIR must file an application for environmental clearance with the Department of Planning, Building, and Code Enforcement (PBCE) by November prior to the Fall General Plan hearing. Projects that do not require an EIR must file an application with PBCE by early March prior to the Fall General Plan hearing. In some cases, projects may file for both a GPA and a project-level environmental clearance. For each developer-initiated GPA, the City will need to determine whether a site-specific long-range transportation analysis would be required. All projects included in a GPA cycle for that year will be included in the cumulative long-range transportation analysis.

This section explains the performance metrics, significance criteria, thresholds of significance, and methodologies for performing the two types of GPA transportation analyses in the TA reports.

### 7.1. CEQA TRANSPORTATION PERFORMANCE METRICS

#### *Vehicle-Miles Traveled per Service Population*

Citywide VMT measures the sum of vehicle-miles traveled on roadways bounded within the city. Citywide VMT is calculated using the Boundary VMT method, which accounts for the portion of personal motorized vehicle-trips that occur only within the city boundary, as described below:

- Internal-Internal (II) – All trips made entirely within the city limits (trips traveling from San José to San José);
- Internal-External (IX) – 50 percent of trips with trips with an origin within the city limits and a destination outside of the city (trips traveling from San José to other locations). This assumes that San José shares half the responsibility for trips traveling to other jurisdictions;
- External-Internal (XI) – 50 percent of VMT associated with trips with an origin outside the city limits and a destination within the city (trips traveling from other locations to San José). Similar to the IX trips, San José shares the responsibility of trips traveling to other jurisdictions;
- External-External (XX) – Trips that travel through the city to and from other locations are not included in the calculation of Boundary VMT.

Citywide VMT is then divided by the total service population, defined as the sum of household population and jobs. This measurement accounts for the fact that while there is absolute growth in Citywide VMT, the rate of VMT per service population can be reduced by land use decisions.

The Boundary VMT method is different from the Origin-Destination VMT method that is used in a CEQA transportation analysis for development projects. The Boundary VMT method is a geographical-based measurement of VMT and ignores the accounting of the individual trip characteristics. On the other hand, the Origin-Destination VMT method ignores the jurisdictional boundaries and adheres to the accounting of trip lengths and other characteristics of individual trips, and is therefore more suited for the evaluation of development projects.

### *Journey-to-Work Mode Share*

The journey-to-work mode share measures the distribution of all daily work trips by travel mode, including drive alone, carpool with two persons, carpool with three or more persons, transit (rail and bus), bike and walk trips. Although work trips may occur at any time of the day, for the purpose of this analysis, work trips that occur during typical peak commute periods (6:00 to 10:00 AM and 3:00 to 7:00 PM) are evaluated using the *San José Travel Demand Model*.

### *Average Vehicle Speeds in Transit Priority Corridors*

Average travel speed for all vehicles (transit and non-transit vehicles) in the City’s 14 transit corridors is calculated for the AM peak hour based on the segment distance dividing the vehicle travel time. A transit corridor is a segment of roadway identified as a Grand Boulevard in the General Plan’s Land Use/Transportation Diagram.

## 7.2. THRESHOLDS OF SIGNIFICANCE

**Table 22** shows the thresholds of significance associated with vehicular modes of transportation.

**Table 22      Thresholds of Significance for General Plan Amendments (April 2020)**

Performance Metrics	Significance Thresholds
<b>Citywide VMT per Service Population</b>	Citywide VMT per service population under the General Plan Amendment conditions greater than that under the current 2040 General Plan conditions
<b>Journey-to-Work Mode Share</b>	Any increase in journey-to-work drive alone mode share over current 2040 General Plan conditions
<b>Transit Corridor Travel Speeds</b>	Decrease in average travel speed on a transit corridor below current 2040 General Plan conditions in the AM peak one-hour period when: <ul style="list-style-type: none"> <li>• The average speed drops below 15 mph or decreases by 25 percent or more; <u>OR</u></li> <li>• The average speed drops by one mph or more for a transit corridor with average speed below 15 mph under current 2040 General Plan conditions</li> </ul>

In addition to the significance thresholds above, the impacts of the General Plan amendments on transit, bicycle, and pedestrian facilities are evaluated. A significant long-range transportation impact would occur if the amendments would:

- Disrupt existing, or interfere with planned transit services or facilities;
- Disrupt existing, or interfere with planned bicycle facilities;
- Conflict or create inconsistencies with adopted bicycle plans, guidelines, policies, or standards;
- Disrupt existing, or interfere with planned pedestrian facilities; OR
- Create inconsistencies with adopted pedestrian plans, guidelines, policies, or standards.

### 7.3. LAND USE AMENDMENTS

#### *Site-Specific Long-Range Transportation Analysis*

A site-specific long-range transportation analysis is required for every proposed land use amendment to the General Plan Land Use/Transportation Diagram, except for those amendments that meet the screening criteria as shown in **Table 23**. In addition, a site-specific long-range transportation analysis may be required for proposed amendments that would otherwise be screened, if special circumstances indicate that transportation impacts may be unusually severe.

#### *Screening Criteria*

**Table 23** categorizes General Plan land use amendments based on whether a proposed land use change would expand the designated use or convert to a different use. Amendments are also categorized based on their location within geographic subareas of the City. The screening criteria uses the PM peak hour vehicle-trips based on the *San José Travel Demand Model*. Land use amendments that would generate fewer than the listed number of PM peak hour trips are generally found to not result in a significant long-range transportation impact. These land use amendments are screened from performing a site-specific long-range transportation analysis. **Figure 10** shows the geographic boundaries of the four subareas in the City – North San José, Evergreen, South San José, and the remainder of City – for the screening criteria.

**Table 23 Site-Specific Long-Range Transportation Analysis Screening Criteria for Land Use Amendments**

Location of Amendment	Maximum Allowable PM Peak Hour Vehicle-trips			
	Expansion of Residential Use <sup>22</sup>	Conversion from Residential to Non-Residential Use <sup>23</sup>	Conversion from Non-Residential to Residential Use <sup>23</sup>	Expansion of Non-Residential Use <sup>22</sup>
North San José	1,000	0	500	50

<sup>22</sup> The screening criteria for a proposed expansion of the same land use are measured in “net” new PM peak hour vehicle-trips.

<sup>23</sup> The screening criteria for a proposed land use conversion are measured in total PM peak hour vehicle-trips generated by the proposed use.



<b>Evergreen</b>	15	600	0	300
<b>South San José</b>	50	600	0	300
<b>Remainder of City</b>	250	250	250	250



### *Study Scenarios*

- **Base Year Conditions:** Transportation conditions for the base year against which General Plan scenarios are evaluated;
- **Adopted General Plan 2040 Conditions:** Transportation conditions for the adopted General Plan Year 2040 Conditions are evaluated against the Base Year Conditions;
- **Proposed General Plan Amendment 2040 Conditions:** Transportation conditions for the Proposed General Plan Amendment 2040 Conditions are evaluated against the Base Year Conditions. Results are then compared relative to the Adopted General Plan 2040 Conditions to determine any additional long-range transportation impacts due to the proposed General Plan Amendment.

### *Cumulative Impact Analysis*

In addition to site-specific long-range transportation analyses for individual land use amendments, the TA will also include a cumulative long-range transportation analysis to meet CEQA requirements. This analysis will include all the proposed General Plan amendments, including those individual land use amendments that have been screened from performing site-specific long-range transportation analyses, as well as all the concurrently proposed transportation network amendments, if any.

## 7.4. TRANSPORTATION NETWORK AMENDMENTS

Changing the planned transportation network in the General Plan has substantially different implications for the long-range analysis than amending the land use designation on a single parcel. Changing the citywide transportation network could affect the local area and the external network. The analysis of such a change is therefore distinctively different than the analysis done for a land use change.

While a project may include both land use and transportation network amendments to the General Plan, it is usually possible for the City Council to approve one part of the amendments without the other. It is also possible that the transportation network change may be controversial with a neighborhood, raising issues not directly related to the land use amendment. It would be inappropriate to limit the discretion of the City Council under these circumstances.

Therefore, the long-range analysis for transportation network amendments should be performed independently of any and all land use amendments.

### *Screening Criteria*

The transportation network as referred to in the General Plan Land Use/Transportation Diagram includes four network categories: (1) roadway access points, (2) street network, (3) transit network, and (4) bicycle network. A long-range transportation analysis is required for all transportation network amendments to the General Plan Land Use/Transportation Diagram, except for those amendments that meet the screening criteria as shown in **Table 24**.

**Table 24 Screening Criteria for Transportation Network Amendments**

Amendment Type	Screening Criteria
<b>Roadway Access Points</b>	<ul style="list-style-type: none"> <li>• Not applicable</li> </ul>
<b>Street Network</b>	<ul style="list-style-type: none"> <li>• Decrease in vehicle capacity of collectors or residential streets<sup>24</sup></li> </ul>
<b>Transit Network</b>	<ul style="list-style-type: none"> <li>• Increase in the transit service and network coverage</li> </ul>
<b>Bicycle Network</b>	<ul style="list-style-type: none"> <li>• Increase in the bicycle network coverage</li> </ul>

A roadway access point is defined as an interchange that provides access between local streets and regional facilities (e.g. freeways). Removing a roadway access point will reduce traffic on the streets that are connected to it, and will likely increase traffic using adjacent access points and the streets that are connected to those adjacent access points. Adding a roadway access point will do the opposite. While any reduction in the overall roadway capacity will likely result in the reduction in the City’s Boundary VMT per service population and the commute trip drive-alone share, the effects on transit corridor travel speeds is less certain without a long-range analysis. Therefore, the screening criteria are not applicable for modifications to roadway access points.

Reducing vehicle capacity of an arterial will decrease traffic on the street and the collectors that are connected to it, and will likely increase traffic on adjacent parallel arterials. Increasing the vehicle capacity of an arterial will do the opposite. Similar to roadway access point modifications, since the effects of an arterial capacity change on transit corridor travel speeds is context-specific and cannot be presumed, it is necessary to evaluate against significant criteria in a long-range analysis. Therefore, the screening criteria are not applicable for capacity changes to arterials.

Decreasing vehicle capacity of a collector or residential street generally meets the screening criteria. Travel pattern responses to roadway capacity changes to a collector or a residential street are localized compared to capacity changes to arterials that also serve regional traffic.

Enhancing transit and bicycle network also generally meets the screening criteria. Enhancing transit and bicycle networks will encourage mode shift to transit, bike and walk trips and will likely have beneficial effects on the citywide transportation system. Therefore, these changes are presumed to have less-than-significant long-range transportation impacts and are screened from performing a long-range analysis.

*Study Scenarios*

- **Base Year Conditions:** Transportation conditions for the base year against which General Plan scenarios are evaluated;
- **Adopted General Plan 2040 Conditions:** All the planned transportation network improvements identified in the adopted General Plan are included. Transportation conditions for the adopted General Plan Year 2040 Conditions are evaluated against the Base Year Conditions;

<sup>24</sup> This screening criterion is not applicable for a decrease in vehicle changes of arterials.

- **Proposed General Plan Amendment 2040 Conditions:** The combined amendments to the transportation network are made to the General Plan 2040 Conditions. Transportation conditions for the Proposed GPA 2040 Conditions are evaluated against the Base Year Conditions. Results are then compared relative to the Adopted General Plan 2040 Conditions to determine any additional long-range transportation impacts due to the proposed GPA.

## 7.5. MITIGATION MEASURES

Impacts resulting from GPAs are assumed to occur in the context of all the planned land use growth, infrastructure improvements and policies that are already included in the General Plan. There is, therefore, little scope for identifying and evaluating new or additional mitigation as it is usually discussed in CEQA documents. Since GPAs are evaluated in terms of generalized assumptions, such as density averages for land use designations, mitigating a long-range transportation impact requires consideration at a macro level – what types of land use or transportation infrastructure improvements can accommodate the overall citywide transportation demand growth and reducing the long-range transportation impacts. The TA should include a discussion of the following areas when evaluating what mitigation, if any, might be applicable for the GPA:

- Are there any unplanned transportation infrastructure improvements or transit enhancements that could alleviate long-range impacts and accommodate overall citywide growth?
- Can the GPA be modified to minimize or avoid long-range impacts?
- Can travel behavior modification, such as greater use of alternative transportation modes than were assumed in the travel demand model which was calibrated against the travel behavior in the base year, reduce long-range impacts?

Unlike a near-term development, a GPA cannot be conditioned; hence, there is no effective legal mechanism for the City to require mitigation as a condition of approval of the GPA. The discussion of mitigation for long-range transportation impacts must therefore conclude that the impacts are significant and unavoidable.

## 8. CONTENTS OF TA REPORT

This section describes the key elements of a typical Transportation Analysis (TA) report.

### *Executive Summary*

The Executive Summary provides a brief description of the transportation analysis that the project is expected to have on the transportation system. The Executive Summary should provide a table that presents the vehicle-miles travelled (VMT) findings for all applicable land uses of the project. Figures generated from the Santa Clara Countywide VMT Evaluation Tool or alternative method, along with results of Project VMT and Project with Mitigation VMT, if applicable, should be included in the Executive Summary. Any transportation impacts and proposed mitigation measures should also be identified. Other noteworthy findings, conclusions, and recommendations on the local transportation analysis, such as those related to intersection operations, bicycle/pedestrian issues, site access and circulation issues, etc., should also be addressed in the Executive Summary as appropriate.

**Figure 11 Sample Table of Contents**

EXECUTIVE SUMMARY .....	
1. INTRODUCTION .....	
1.1 Project Description.....	
1.2 CEQA Transportation Analysis Scope .....	
1.3 Local Transportation Analysis Scope.....	
1.4 Report Organization.....	
2. EXISTING TRANSPORTATION CONDITIONS .....	
2.1 VMT.....	
2.2 Roadway Network.....	
2.3 Traffic Volumes .....	
2.4 Pedestrian and Bicycle Facilities .....	
2.5 Transit Facilities and Services.....	
2.6 Observed Transportation Conditions.....	
3. CEQA TRANSPORTATION ANALYSIS .....	
3.1 Vehicle-Miles Traveled Analysis .....	
3.1.1 Methodology .....	
3.1.2 Significance Criteria.....	
3.1.3 Project VMT.....	
3.1.4 Project Impacts and Mitigation Measures .....	
3.1.5 Cumulative Impacts and Mitigation Measures .....	
4. TDM PLAN	
5. LOCAL TRANSPORTATION ANALYSIS .....	
5.1 Bicycle and Pedestrian .....	
5.2 Transit.....	
5.3 Transportation Demand Management .....	
5.4 Intersection Operations Analysis .....	
5.4.1 Trip Generation.....	
5.4.2 Project Trip Distribution.....	
5.4.3 Project Trip Assignment .....	
5.4.4 Background Conditions.....	
5.4.5 Background plus Project Conditions.....	
5.4.6 Recommendations .....	
5.5 Queuing Analysis.....	
5.6 Signal Warrant .....	
5.7 Site Circulation and Access.....	
5.8 Delivery, Waste, and Moving Trucks .....	
5.9 Parking.....	
5.10 Neighborhood Traffic Intrusion.....	

6. GENERAL PLAN AMENDMENT LONG-RANGE TRANSPORTATION ANALYSIS.....

7. CONCLUSIONS .....

TECHNICAL APPENICES.....

- Appendix A – Santa Clara Countywide VMT Evaluation Tool Output Sheet .....
- Appendix B – Transportation Counts .....
- Appendix C – Approved Trip Inventory .....
- Appendix D – Intersection Operations Analysis Output Sheets.....
- Appendix E – Signal Warrant Study Output Sheets.....

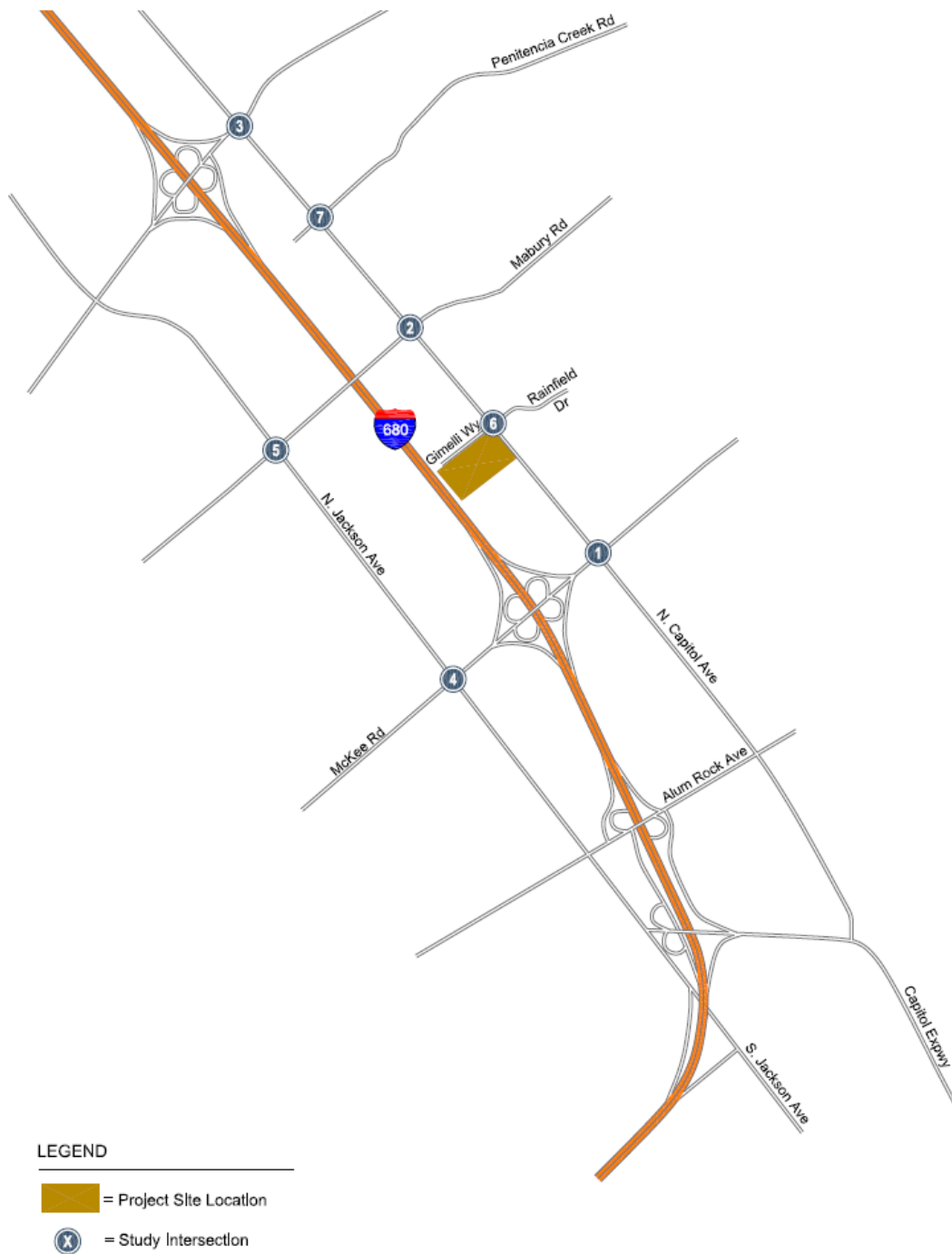


## *Introduction*

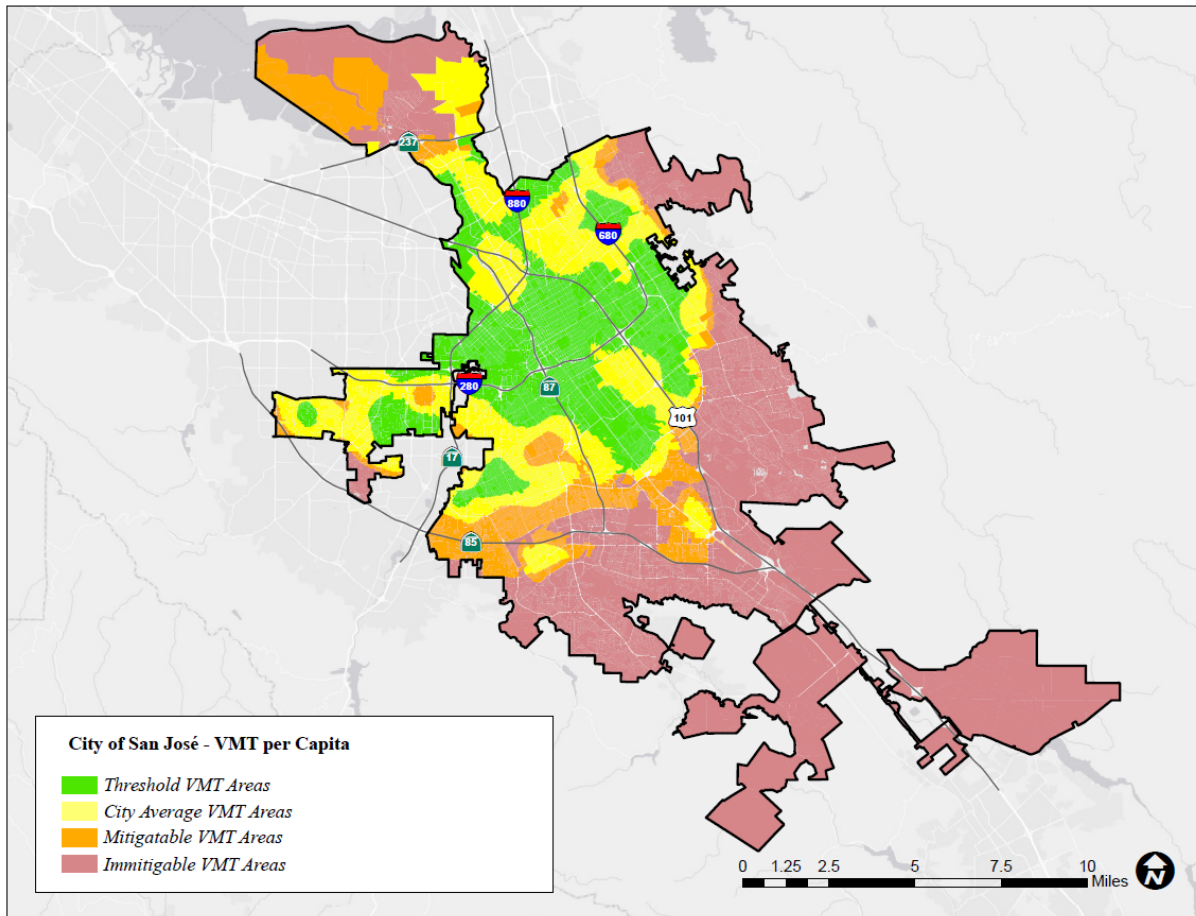
The first chapter of the TA report should include a project description, a site location map (**Figure 12**) and a site plan. The site plan should include adjacent intersections, site access, on-site circulation, pedestrian and bicycle facilities, and parking layout of the project. This chapter should describe the scope of the CEQA transportation analysis and/or local transportation analysis, if applicable.

When describing the CEQA transportation analysis scope, the report should describe what VMT is, the benefits of reducing VMT, and the City's General Plan goals and strategies that address VMT. The report should include a discussion of the VMT analysis that includes how to read and interpret the VMT output for the project. The report should also include the City's VMT heat maps and a discussion of what the heat maps are. For most projects, the City's VMT heat maps (**Figure 13**, **Figure 14**, and **Figure 15**) should be included.

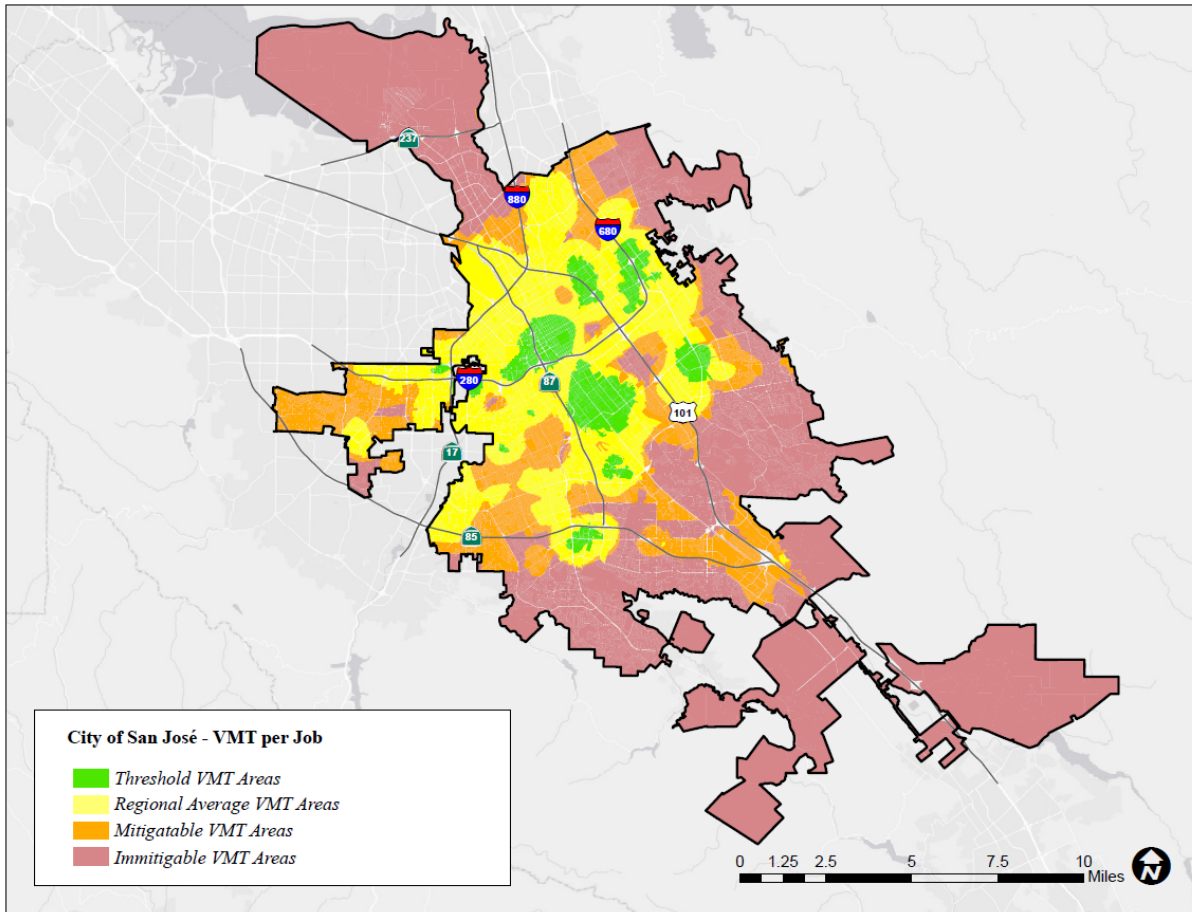
**Figure 12 Sample Site Location Map**



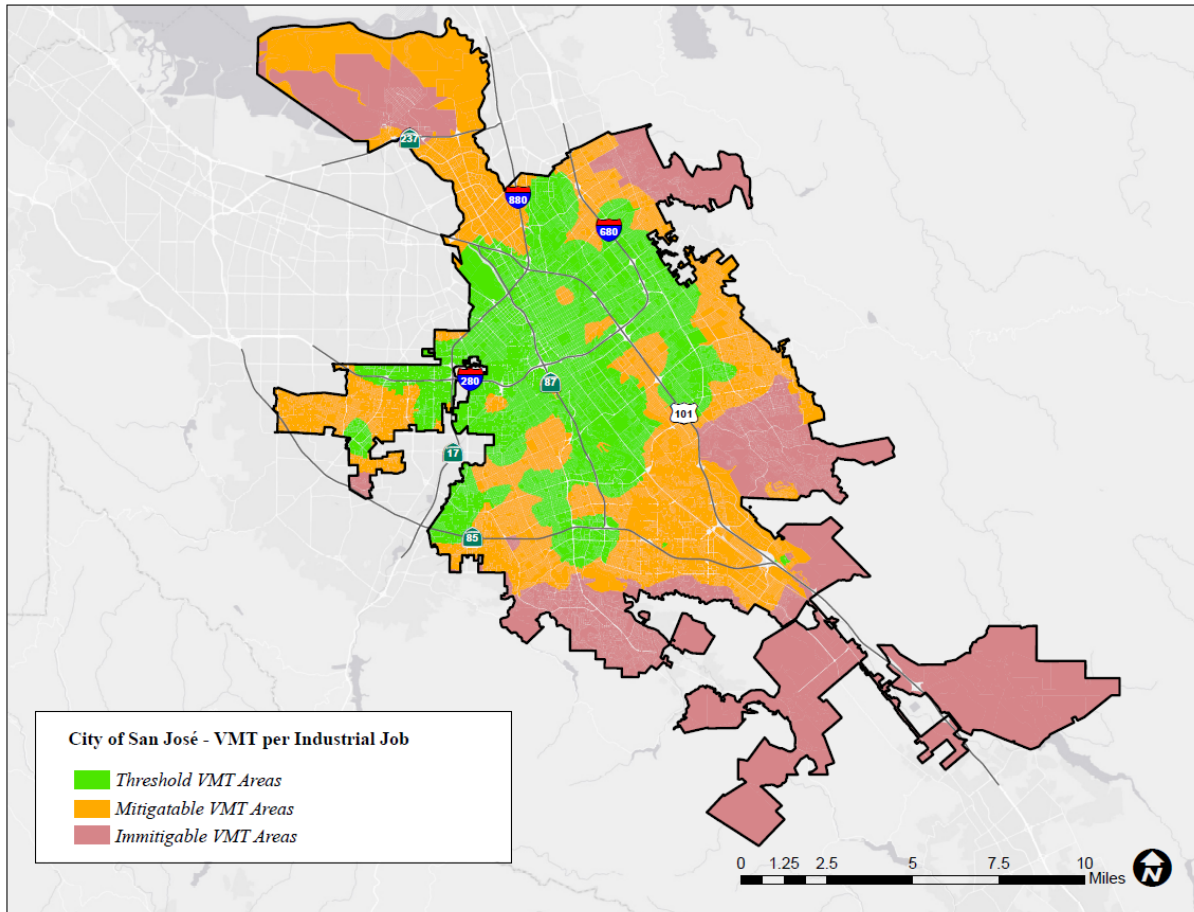
**Figure 13** VMT Heat Map for Residential Projects in San José (April 2023)



**Figure 14 VMT Heat Map for Office Projects in San José (April 2023)**



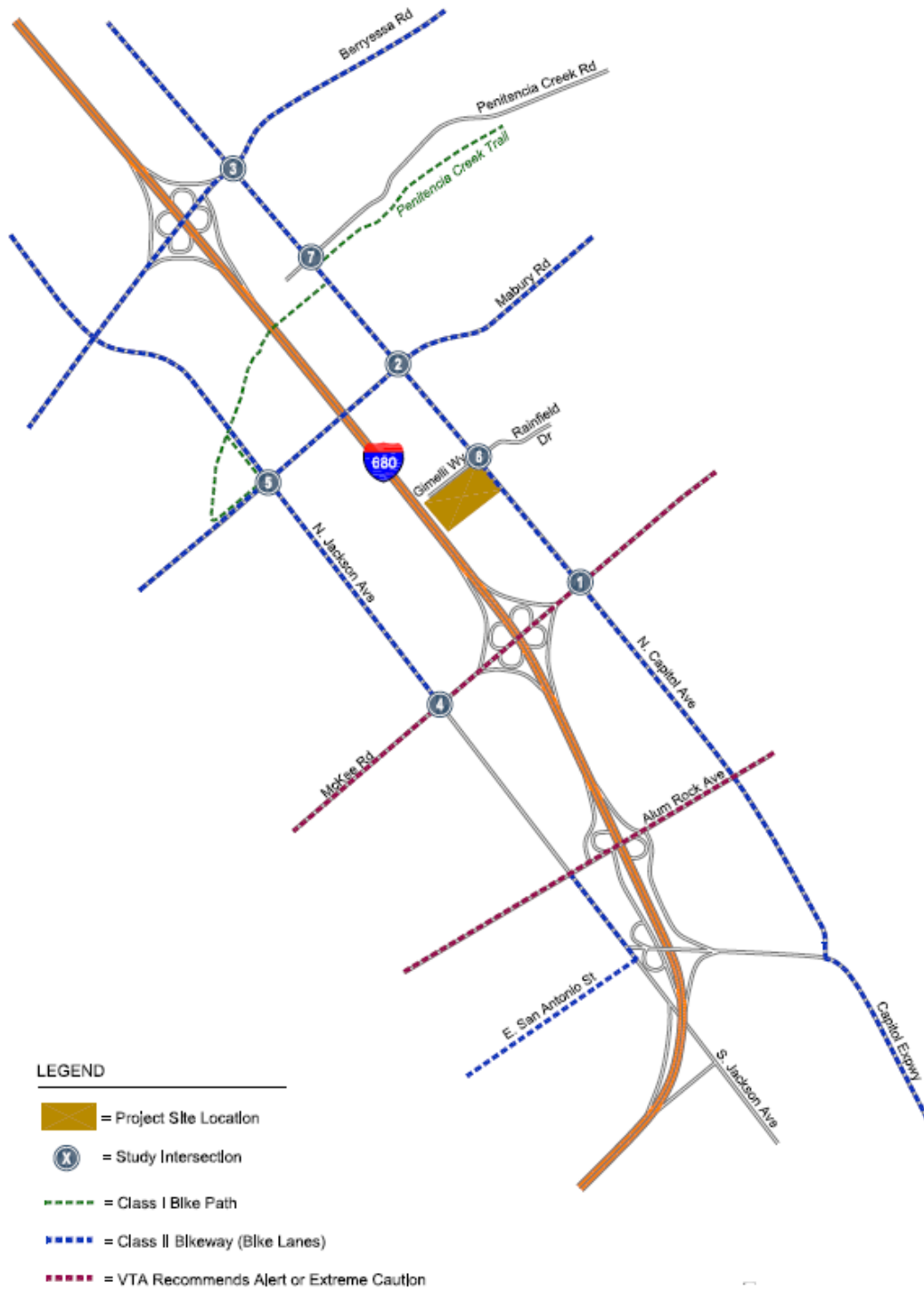
**Figure 15** VMT Heat Map for Industrial Projects in San José (April 2023)



### *Existing Conditions*

The second chapter should include the existing conditions of the transportation system within the study area of the project. It should first present, both textually and graphically, the VMT of the existing land uses in the proximity of the project. Then, it should describe the physical characteristics of the surrounding roadway network, including the existing roadway cross-sections, intersection lane configurations, traffic control devices and surrounding land uses. The existing turning movement volumes, lane configurations and traffic control devices should be shown (in one figure if possible). Next, the report should include, both textually and graphically, the availability, accessibility and quality of the existing pedestrian, bicycle (**Figure 16**) and transit facilities (**Figure 17**). Operational issues based on the field observations should be identified as well.

**Figure 16 Sample Pedestrian and Bicycle Facilities**



**Figure 17 Sample Transit Facilities**





### *CEQA Transportation Analysis*

The third chapter describes the CEQA transportation analysis. It should include the performance metrics, the significance criteria, the thresholds of significance, and the methodology for the analysis.

Figure(s) showing how Project VMT is generated is required. If the project uses the sketch tool to calculate Project VMT, the report should summarize the VMT analysis results and the output sheets produced by the sketch tool should be included (**Figure 18**) in the appendix. The analysis should include the assumptions made in using the sketch tool to calculate Project VMT – the project inputs and the selected measures that resulted in the reduction from Existing VMT to Project VMT. If the project is shown to have a significant impact, the analysis should include the recommended mitigation measures and the resulting project with mitigation.

If the sketch tool cannot be used to measure Project VMT, an alternative method, such as the *San José Travel Demand Model*, is required. The analysis method will be determined during the scoping process. The chapter should describe how Project VMT is calculated using the alternative method. Tables or figures, similar to the Santa Clara Countywide VMT Evaluation Tool output, that compare Project VMT and Project with Mitigation VMT against the thresholds of significance.

**Figure 18 Sample Santa Clara Countywide VMT Evaluation Tool Output**

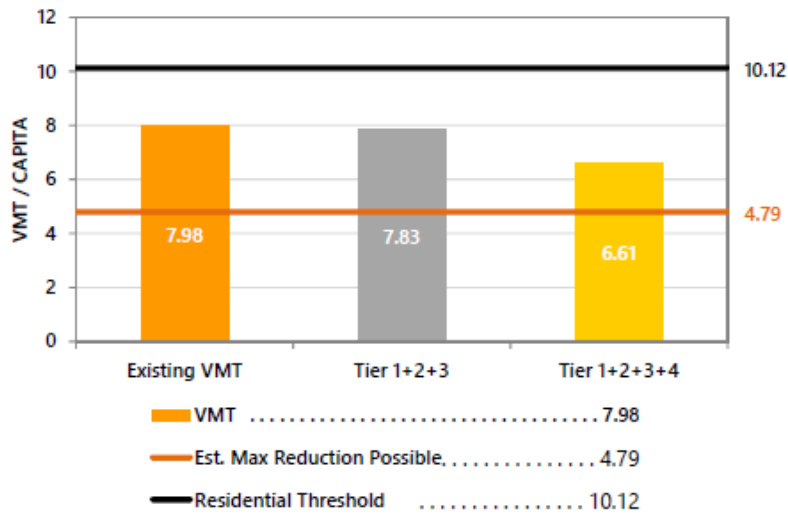
<b>CITY OF SAN JOSE VEHICLE MILES TRAVELED EVALUATION TOOL SUMMARY REPORT</b>			
<b>PROJECT:</b>			
Name:	(no project name entered)		
Location:	(no project location entered)		
Parcel:	26435066	Parcel Type:	Urban High Transit
Proposed Parking:	Vehicles: 200	Bicycles:	20
<b>LAND USE:</b>			
Residential:		Percent of All Residential Units	
Single Family	100 DU	Extremely Low Income ( ≤ 30% MFI)	0 % Affordable
Multi Family	20 DU	Very Low Income ( > 30% MFI, ≤ 50% MFI)	0 % Affordable
Subtotal	120 DU	Low Income ( > 50% MFI, ≤ 80% MFI)	0 % Affordable
Office:	100 KSF		
Retail:	100 KSF		
Industrial:	0 KSF		
<b>VMT REDUCTION STRATEGIES</b>			
<b>Tier 1 - Project Characteristics</b>			
Increase Residential Density			
	Existing Density (DU/Residential Acres in half-mile buffer) .....		8
	With Project Density (DU/Residential Acres in half-mile buffer) .....		9
Increase Development Diversity			
	Existing Activity Mix Index .....		0.46
	With Project Activity Mix Index .....		0.49
Integrate Affordable and Below Market Rate			
	Extremely Low Income BMR units .....		0 %
	Very Low Income BMR units .....		0 %
	Low Income BMR units .....		0 %
Increase Employment Density			
	Existing Density (Jobs/Commercial Acres in half-mile buffer) .....		32
	With Project Density (Jobs/Commercial Acres in half-mile buffer) .....		39
<b>Tier 2 - Multimodal Infrastructure</b>			
Traffic Calming Measures <i>(In Coordination with SJ)</i>			
	Are improvements provided beyond the development frontage? .....		Yes
<b>Tier 3 - Parking</b>			
End of Trip Bike Facilities			
	Bicycle Parking Spaces Provided by Project .....		20 spaces
	Project Provides Additional End-of-Trip Facilities Beyond Parking? .....		Yes
<b>Tier 4 - TDM Programs</b>			
Bike Sharing Program <i>(In Coordination with SJ)</i>			
Car Sharing Program <i>(In Coordination with SJ)</i>			
	Percent of Eligible Residents/Employees .....		100 %
Subsidized or Discounted Transit Program			
	Percent of Transit Subsidy .....		50 %

**Figure 19 Sample Santa Clara Countywide VMT Evaluation Tool Output (continued)**

**CITY OF SAN JOSE VEHICLE MILES TRAVELED EVALUATION TOOL SUMMARY REPORT**

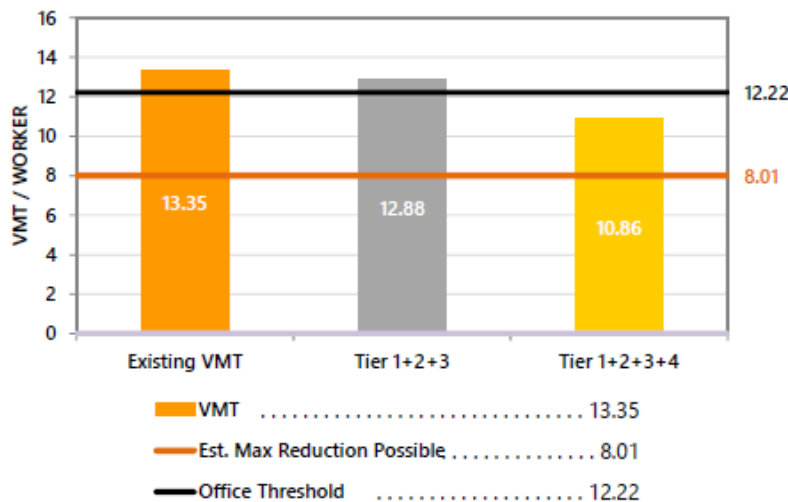
**RESIDENTIAL ONLY**

The tool estimates that the project would generate per capita VMT below the City's threshold. There are selected strategies that require coordination with the City of San Jose to implement.



**EMPLOYMENT ONLY**

The tool estimates that the project would generate per non-industrial worker VMT below the City's threshold. There are selected strategies that require coordination with the City of San Jose to implement.



### *Local Transportation Analysis*

This chapter should describe the local transportation analysis in conformance with the guidelines set forth in this Handbook (**Section 5**). For each analysis, the chapter should include operational constraints of the project and any proposed improvements.

In the intersection operations analysis, the chapter should include a figure showing the intersection turning movements, lane configurations and traffic control devices for Background Conditions, and another figure for Background plus Project Conditions. It should also present a table for project vehicle-trip generation (with adjustments), a figure for project vehicle-trip distribution, and a figure for the project vehicle-trip assignment at the study intersections. Intersection average control delays and corresponding standards, increase in average critical delays (relative to Background Conditions), and increase in critical volume-to-capacity ratio (relative to Background Conditions), should be presented in tables for the Background and Background plus Project Conditions.

### *General Plan Amendment Long-Range Transportation Analysis*

The GPA long-range transportation analyses are conducted during the City's General Plan Amendment cycle for applicant-initiated GPA's. Projects that require an EIR should file an application for environmental clearance with the Department of Planning, Building and Code Enforcement by November prior to the Fall General Plan hearing. Projects that do not require an EIR should file an application with the Department of Planning, Building and Code Enforcement by the beginning of March prior to the Fall General Plan hearing. In some cases, projects may file for both a GPA and a project level environmental clearance. For all projects proposing GPA's, the City will need to determine whether a site-specific long-range transportation analysis would be required. All projects included in a GPA cycle for that year will be included in the cumulative long-range transportation analysis.

This chapter should present the long-range evaluation of the effects of the proposed GPA on the citywide transportation system following the guidelines described in this Handbook (**Section 6**). It should include a table comparing the measures of effectiveness among the Base Year Conditions, the adopted General Plan 2040 Conditions, and the proposed General Plan Amendment 2040 Conditions.

## APPENDIX A GLOSSARY OF TERMS

Term	Definition
<b>Active Transportation</b>	A means of getting around that is powered by human energy, primarily walking and biking.
<b>Alternative Transportation Modes</b>	Sustainable transportation methods that are alternative to personal motorized vehicles, primarily walking, biking, and riding transit.
<b>Approved Trip Inventory (ATI)</b>	A City-maintained database of vehicle-trips generated by projects for which an entitlement to build has been granted that have yet been built or occupied. Consists of assigned vehicle-trips by turn movement at signalized intersections.
<b>Area Development Policy (ADP)</b>	A City-adopted implementation policy of an Area Plan.
<b>Area Plan</b>	A City-adopted plan that coordinates transportation infrastructure improvements and land use development in support of a unique vision for a subarea of the City (e.g. an Urban Village Plan).
<b>Boundary VMT Method</b>	A method used to calculate total VMT on roadways bounded within the City. VMT per service population, a performance metric for General Plan amendments, is based on this method.
<b>Effect</b>	Project-related effects on elements of the transportation system for which no transportation standards or CEQA thresholds of significance have been established by the City. Distinct from “impact”.
<b>Existing VMT</b>	Current VMT levels for the existing buildings within a one-half-mile buffer of a development project.
<b>High-Quality Transit Areas</b>	Areas are within half a mile of a high-quality transit corridor or major transit stop.
<b>High-Quality Transit Corridor</b>	A corridor with fixed route bus service with service intervals no longer than 15 minutes during peak commute hours (Pub. Resources Code § 21155 (b)).
<b>Impact</b>	Refer to a project’s impacts as determined by the transportation standards or CEQA thresholds of significance established by the City. Distinct from “effect”.
<b>Improvement</b>	A change that addresses the effects, particularly adverse effects, of a project on elements of the transportation system

	for which no transportation standards or CEQA thresholds of significance have been established by the City. Distinct from “mitigation’.
<b>Induced Trips</b>	Increase in traffic volume that occurs soon after a new road is opened or a previously congested road is widened. Increases in roadway capacity are typically quickly filled up with additional traffic.
<b>Infill Opportunity Zone (IOZ)</b>	Areas designated by the City that exempt intersection operations standards in the Congestion Management Program (CMP). CMP facilities located within IOZs are exempt from provisions of the CMP’s operations standard requirements.
<b>Internal trips</b>	Trips between different land use types within the same development project that are accommodated at the project site. Trips that are not internal are those with the project at one end and other locations at the other end.
<b>Intersection Operations Standard</b>	A measure of automobile vehicle delays through a signalized intersection, graded on a scale A through F.
<b>Major Transit Stop</b>	A rail transit station, a ferry terminal served by either a bus or rail transit service, or the intersection of two or more major bus routes with a frequency of service interval of 15 minutes or less during the morning and afternoon peak commute periods (Pub. Resources Code § 21064.3).
<b>Mitigation</b>	A change that addresses the CEQA impacts of a project on elements of the transportation system for which transportation standards or CEQA thresholds of significance have been established. Distinct from “improvement”.
<b>Mixed-Use Project</b>	A development project that combines two or more land uses.
<b>Mode Share</b>	The share of all person-trips to and from a project taken by each transportation mode (personal motorized vehicles, transit, bicycle, and pedestrian).
<b>Multimodal Improvement Plan (MIP)</b>	VTA terminology for “Deficiency Plan” as defined by CMA statue. VTA’s plans developed to identify offsetting measures to improve transportation conditions on CMP facilities in lieu of making physical traffic capacity improvements such as widening a roadway.
<b>Multimodal Transportation Improvement Plan (MTIP)</b>	The City’s area-based prioritized list of projects and programs intended to facilitate realization of goals and objectives identified in a long-range plan.

<b>Net Change in Total VMT</b>	Difference in total VMT in the area with and without the project. Performance metric for regional retail projects and transportation projects.
<b>Origin-Destination (O-D) VMT Method</b>	A method used to calculate the total vehicle-miles traveled a study area (e.g. a development project, the City, or the region) is expected to generate in a day. For a personal motorized vehicle-trip to be included in the VMT calculation using the O-D VMT method, one of the trip ends must be within the study area.
<b>Passive Parks</b>	Less structured recreational activities and casual pursuit of hobbies that allow for the preservation of natural habitat.
<b>Peak Hour</b>	The highest morning or evening hour of travel reported on a transportation network or street.
<b>Personal Motorized Vehicles</b>	Mainly personal motor vehicles that transport people rather than goods. VMT is based on only personal motor vehicles in this Handbook.
<b>Physical VMT Reduction Strategies</b>	Strategies that development projects can physically construct to encourage the shift from driving alone to walking, biking, and riding transit. Include three of the four VMT reduction strategies – project characteristics, multimodal network improvements, and parking measures.
<b>Plan Bay Area</b>	The Regional Transportation Plan and Sustainable Community Strategies for the nine-county Bay Area. Developed by Bay Area Metro and updated every four years.
<b>Planned Growth Area (PGA)</b>	Areas designated in the <i>Envision San José 2040 General Plan</i> to accommodate certain growth expected in the General Plan’s horizon.
<b>Priority Development Area (PDA)</b>	Areas identified for concentrated development as part of the regional transportation plan for the nine-county Bay Area.
<b>Project VMT</b>	Calculated VMT generation of a development project.
<b>Service Population</b>	The sum of residents and workers in an area such as the City.
<b>Sphere of influence</b>	Area in which travel patterns are expected to change due to a transportation project.
<b>Transportation Demand Management (TDM)</b>	Programmatic measures that discourage drive-alone trips and encourage pedestrian, bicycle, and transit use. One of the

	four categories of VMT reduction strategies for development projects.
<b>Trip Cap</b>	A maximum number of vehicle-trips that a development project is allowed to generate in a day.
<b>Trip Adjustments</b>	Effort to reduce the number of vehicle-trips to and from a project.
<b>Trip Assignment</b>	An assignment of vehicle-trips to transportation facilities based on trip distribution percentages.
<b>Trip Distribution</b>	A forecast of the travel direction of vehicle-trips to and from a project.
<b>Trip Generation</b>	The estimated total number of vehicle-trips to and from a project.
<b>Vehicle-Miles Traveled</b>	The total miles of travel by personal motorized vehicles in a day. A measure on which a project' transportation impact(s) are based.
<b>Vision Zero San José</b>	The City's commitment to prioritize street safety and eliminate deaths and severe injuries on roadways. A multi-national road traffic safety program started in Sweden in 1997 and joined by the City in 2015.
<b>VMT per Capita</b>	The sum of VMT for personal motorized vehicle-trips made by all residents of a development project, divided by the total number of residents of the project.
<b>VMT per Employee</b>	The sum of VMT for personal motorized vehicle-trips made by all workers of an office or industrial development project, divided by the total number of workers at the project.



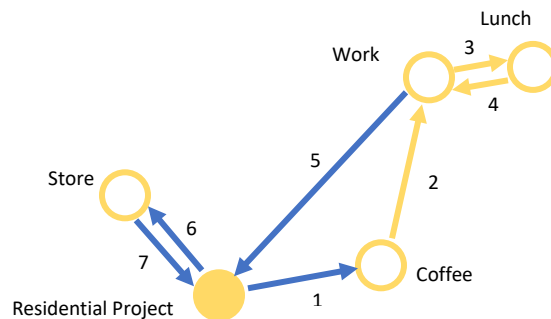
## APPENDIX B TRIP-BASED VMT ASSESSMENT

For development projects, the trip-based assessment for VMT is the method currently used in the *San José Travel Demand Model*. Because a trip-based model does not capture tours of individual vehicles, multi-linked trips cannot be fully accounted for when using a trip-based model. However, because the City’s prevailing method for the CEQA transportation analysis as described in this Handbook only requires an assessment of VMT in relationship to a baseline, the City finds this method acceptable. If the City transitions to a tour-based travel demand model, a full accounting of trips would be included in the VMT assessment.

### *VMT per Capita (Residential Projects)*

VMT per capita measures a residential project’s impact on VMT using a trip-based approach. Capita is defined as the number of residents expected to occupy the residential project. It counts VMT from individual trips to and from the project. For example, the driving characteristics of a typical resident may include:

1. Residential Project to Coffee Shop;
2. Coffee Shop to Work;
3. Work to Sandwich Shop;
4. Sandwich Shop to Work;
5. Work to Residential Project;
6. Residential Project to Store;
7. Store to Residential Project.

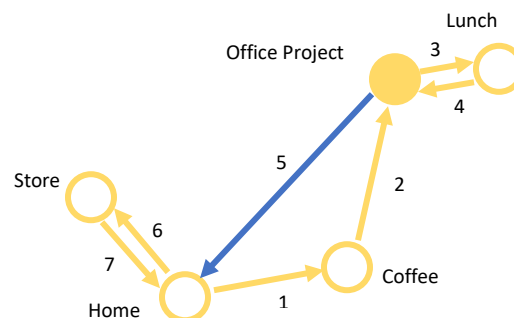


A trip-based VMT assessment of a residential project accounts for VMT associated with only home-based trips, or segments 1, 5, 6 and 7 (highlighted in blue). VMT per capita is calculated by dividing the total home-based VMT by the number of residents.

### *VMT per Employee (Office or Industrial Projects)*

VMT per employee measures an office or industrial project’s impact on VMT using a trip-based approach. It counts VMT from only linked trips made between residence and the project. For example, the travel characteristics of a typical commuter may include:

1. Home to Coffee Shop;
2. Coffee Shop to Office Project;
3. Office Project to Sandwich Shop;
4. Sandwich Shop to Office Project;
5. Office Project to Home;
6. Home to Store;
7. Store to Home.



A trip-based VMT assessment of an office or industrial project accounts for VMT associated with only home-based-work trips, or segment 5 (highlighted in blue). Home-based-work trips are defined as directly-linked home-to-work or work-to-home trips. Note that segments 1 and 2 are not captured in the VMT calculation because they are multi-linked home-to-work trips. In other words, if an employee makes a directly-linked home-to-work trip in the morning (not represented in the graphic) and another directly-linked work-to-home trip in the evening, the VMT associated with both directly-linked home-based-work trips would be captured. VMT per employee is calculated by dividing the total home-based-work VMT by the number of employees.

VMT per capita and VMT per employee should not be evaluated against one another; instead, they should be evaluated against their thresholds, as defined in this section.

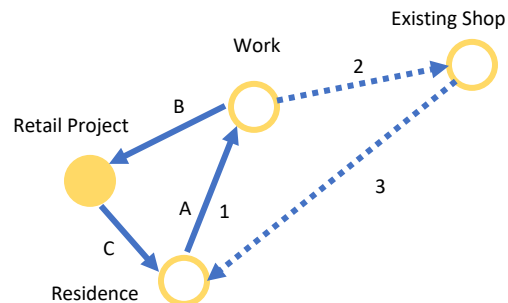
### *Net Change in Total VMT (Retail Projects)*

New retail development typically attracts existing customers rather than creating new trips<sup>25</sup>. Therefore, estimating the net change in total VMT (i.e., the difference in total VMT in the area with and without the project) is the best way to analyze a proposed retail project's effect on the travel behavior of existing customers within a community. For example: a travel characteristic of typical retail customer may include:

1. Home to Work;
2. Work to Existing Shop;
3. Existing Shop to Home.

Once the project is constructed, the customer may opt to shop at the new project instead of the existing retail site:

- A. Home to Work;
- B. Work to Retail Project;
- C. Retail Project to Home.



An assessment of the total VMT from all trips with the project (i.e., segments A, B, and C) and an assessment without the project (i.e., segments 1, 2, and 3) is made. Since all the non-shop trips (i.e., segments 1 and A) are not affected by the project and would cancel out each other, the difference between the two assessments is the net change in total VMT that is attributable to the retail project.

<sup>25</sup> Lovejoy, et al. (2012). Measuring the impacts of local land-use policies on vehicle miles of travel: The case of the first big-box store in Davis, California. *The Journal of Transport and Land Use*.

## APPENDIX C MENU OF TDM MEASURES

### Project Characteristics [PC01 – PC04]

PC01	Increase Residential Density
<b>Description</b>	Where consistent with the <i>Envision San José 2040 General Plan</i> and where in compliance with the <i>San José Municipal Code</i> , design the Project to be denser than existing conditions in the surrounding area. Increased residential densities affect the distances people travel and provide more options for the mode of travel they choose.
<b>CEQA <sup>(1)</sup></b>	<p><b>Home-End Uses Only:</b></p> $\% \text{ Change in VMT} = \frac{\left(\frac{VMT}{Hh} \text{ with Project} - \frac{VMT}{Hh} \text{ without Project}\right)}{\frac{VMT}{Hh} \text{ without Project}}$ <p>where</p> $\frac{VMT}{Hh} = 16.476 \left(\frac{9.548 + \frac{Hh}{RA}}{9.548 + 9.884}\right)^{-0.817}$ <p><math>RA = \text{Existing residential areage within } \frac{1}{2} \text{ miles of the Project}</math></p>
<b>TDM Program</b>	Not applicable
<b>Proof of Implementation</b>	City staff will confirm the Project meet the conditions of approval and specified standards during a pre-occupancy inspection of the Project.

Note:

- (1) Holtzclaw, J., Clear, R., Dittmar, H., Goldstein, D., & Haas, P. (2002). Location efficiency: Neighborhood and socio-economic characteristics determine auto ownership and use - studies in Chicago, Los Angeles and San Francisco. *Transportation Planning and Technology*, 25(1), 1–27.

PC02	Increase Diversity of Land Uses
<b>Description</b>	Where consistent with the <i>Envision San José 2040 General Plan</i> and in compliance with the <i>San José Municipal Code</i> , increase the amount of space dedicated to mixed employment and high-density residential uses in the area surrounding the project (defined as a ½-mile buffer from the Project). Different types of uses near one another can reduce VMT because trips between use types are shorter and may be accommodated more easily by non-personal motorized vehicle modes of travel.
<b>CEQA <sup>(1)</sup></b>	<p><b>Home-End Uses, Commute-End Uses, and Visit-End Uses Only:</b></p> <p>% change in VMT = elasticity by place type and development use × % change in activity mix index</p>
<b>TDM Program</b>	Not applicable

<b>Proof of Implementation</b>	City staff will confirm the Project meet the conditions of approval and specified standards during a pre-occupancy inspection of the Project.
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Notes:

- (1) Salon, D. (2014). *Quantifying the effect of local government actions on VMT*. California Air Resources Board, California Environmental Protection Agency.

PC03	Provide Affordable Housing
<b>Description</b>	Provide affordable for-sale or rental housing for low-income households. Households with incomes at or below 80% of the Santa Clara County Area Median Income (AMI) generally make fewer trips by personal motorized vehicles than households with higher incomes, resulting in reduced VMT. Affordable housing provides greater opportunity for households to live closer to transit.
<b>CEQA <sup>(1)</sup></b>	<p><b>Home-End Uses Only:</b></p> <p>% reduction in VMT is based on the proportion of Project households with income levels below:</p> <ul style="list-style-type: none"> <li>▪ Extremely Low Income (0-30% of AMI): -32.5%</li> <li>▪ Very Low Income (30-50% of AMI): -25.2%</li> <li>▪ Low Income (50-80% of AMI): -10.2%</li> </ul>
<b>TDM Program (1 – 4 Points)</b>	<p><b>Home-End Uses Only:</b></p> <p>Provide affordable housing units on-site, off-site, or via dedication of land, credits and transfers, acquisition and rehab of units, HUD restricted units, option to purchase, partnership for clustered units, or a combination of methods:</p> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> At least 5% above and beyond the City’s Inclusionary Housing Ordinance obligation.</li> <li>▪ <b>2 Points:</b> At least 10% above and beyond the City’s Inclusionary Housing Ordinance obligation.</li> <li>▪ <b>3 Points:</b> At least 15% above and beyond the City’s Inclusionary Housing Ordinance obligation.</li> <li>▪ <b>4 Points:</b> At least 20% above and beyond the City’s Inclusionary Housing Ordinance obligation.</li> </ul>
<b>Proof of Implementation</b>	City staff will monitor and require occupancy certification of affordable units during the annual monitoring and reporting process. The City will maintain the right to require the tenant or designated representative of an affordable unit to verify their level of income on an annual basis.

Notes:

- (1) Newmark, G., & Haas, P. (2015). *Income, Location Efficiency, and VMT: Affordable Housing as a Climate Strategy*. The California Housing Partnership.

PC04	Increase Employment Density
<b>Description</b>	Where consistent with the <i>Envision San José 2040 General Plan</i> and in compliance with the <i>San José Municipal Code</i> , design the Project to be denser than existing

	conditions in the surrounding area. Increased employment densities affect the distances people travel and provide more options for the mode of travel they choose.
<b>CEQA <sup>(1)</sup></b>	<b><u>Commute-End Uses and Other Uses Only:</u></b> % change in VMT (for suburban place types) = -0.03 × % change in employment density
<b>TDM Program</b>	Not applicable
<b>Proof of Implementation</b>	City staff will confirm the Project meet the conditions of approval and specified standards during a pre-occupancy inspection of the Project.

Notes:

(1) Zhou, B., & Kockelman, K.M. (2008). Self-selection in home choice: use of treatment effects in evaluating relationship between built environment and travel behavior. *Transportation Research Record: Journal of the Transportation Research Board*, 2077(1): 54-61.

*Multimodal Network Improvements [MI01 – MI05]*

MI01	Provide Bike and Micro-mobility Network Improvements
<b>Description</b>	<p>Design, fund, and/or construct bike and micro-mobility network improvements beyond the Project’s frontage. Examples of bike and micro-mobility network improvements include:</p> <ul style="list-style-type: none"> <li>▪ Trails;</li> <li>▪ Street, bikeway, and/or sidewalk connections to trails;</li> <li>▪ Separated and/or raised bike lanes;</li> <li>▪ Low-stress bike boulevards;</li> <li>▪ Raised cycle tracks;</li> <li>▪ Bike share stations;</li> <li>▪ Bike and scooter corrals;</li> <li>▪ On-street bike lockers;</li> <li>▪ Protected intersections;</li> <li>▪ Curb extensions;</li> <li>▪ ADA-compliant ramps;</li> <li>▪ Traffic calming measures for lowering traffic volumes and speeds;</li> <li>▪ Bike detection and priority at crossings;</li> <li>▪ Signal modifications to improve pedestrian and/or bicyclist safety/comfort;</li> <li>▪ Pedestrian lighting;</li> <li>▪ Wayfinding signage;</li> <li>▪ New or improved bike access to bus stops;</li> <li>▪ Street trees and landscaping;</li> <li>▪ Green infrastructure for stormwater management;</li> <li>▪ Waste receptacles;</li> <li>▪ Passenger and commercial loading zones; and</li> <li>▪ Other features that improve the biking and scootering experience in local community.</li> </ul>

**CEQA <sup>(1,2)</sup>**

**Home-End Uses and Commute-End Uses Only:**

% change in bike mode share =  $-0.371 \times$  % change in distance to bike and micro-mobility corridor.

This provides the mode shift from drive to bike or micro-mobility devices. VMT reduction is then calculated by applying the ratio of average bike or micro-mobility trip lengths to the average drive trip lengths.

**TDM Program  
(1 – 4 Points)**

**Home-End Uses, Commute-End Uses, Visit-End Uses, and Other Uses:**

Fund or perform the design and/or construction of bike and micro-mobility network improvements outside of the Project’s property frontage and within 1 mile of the Project site, for a total cost equivalent to:

- **1 Point:** \$1,000 per dwelling unit or \$1 per square feet of non-residential gross floor area.
- **2 Points:** \$2,000 per dwelling unit or \$2 per square feet of non-residential gross floor area.
- **3 Points:** \$3,000 per dwelling unit or \$3 per square feet of non-residential gross floor area.
- **4 Points:** \$4,000 per dwelling unit or \$4 per square feet of non-residential gross floor area.

To satisfy this measure, the Project must improve at least one (1) General Plan-designated On-Street Primary Bike Facility Street or Trail beyond the project frontage within 1 mile of the site. The Project must work with City staff to identify improvements for the selected street(s) based on the:

- *Move San José Plan;*
- *Multimodal Transportation Improvement Plans (MTIPs);*
- *Better Bike Plan 2025;*
- *Walk Safe San José Plan;*
- *Trail Master Plans;*
- *Vision Zero Action Plan;*
- *Emerging Mobility Action Plan;*
- *Green Stormwater Instructure Plan;*
- *Urban Village Plans;*
- *Station Area Plans;*
- *Complete Street Design Standards and Guidelines;*
- *Fast Transit Program (VTA);*
- *Pedestrian Access to Transit Plan (VTA);*
- *Transit Passenger Environment Plan (VTA);*
- *Santa Clara Countywide Bike Plan (VTA);*
- *Complete Streets Studies (VTA);*
- *Measure B Transit Operations Program (VTA); and*
- *Measure B Bicycle & Pedestrian Program (VTA), etc., as appropriate.*

	Based on the status of the selected street improvements, the Project will opt to fund or perform conceptual designs, full designs and/or construction of the selected improvements. All barriers to bike and micro-mobility access and interconnectivity must be minimized. Physical barriers such as walls, landscaping, and slopes that impede bike and micro-mobility access must be removed from project design.
<b>Proof of Implementation</b>	City staff will provide comments to the Project on possible improvement and funding options and ensure compliance with community values, citywide goals, and the City’s and VTA’s relevant design standards. City staff will confirm the implemented improvements meet specified standards during a pre-occupancy inspection of the Project. Upon approval, ongoing maintenance of all approved improvements contained within City rights-of-way will become the City’s responsibility.

Notes:

- (1) Zahabi, S.A., Chang, A., Miranda-Moreno, L.F., & Patterson, Z. (2016). Exploring the link between the neighborhood typologies, bicycle infrastructure and commuting cycling over time and the potential impact on commuter GHG emissions. *Transportation Research Part D: Transport and Environment*, 47, 89–103.
- (2) Payment cannot be used towards CEQA VMT mitigation per Council Policy 5-1.

<b>MI02</b>	<b>Provide New Street Connections</b>
<b>Description</b>	Design, fund, and/or construct new street connections and removal of existing cul-de-sacs on the Project site to provide pedestrian and bicycle access.
<b>CEQA <sup>(1)</sup></b>	<b>Home-End Uses and Commute-End Uses Only:</b> % change in VMT= -0.12 × % change in intersection density
<b>TDM Program</b>	Not applicable <sup>(2)</sup>
<b>Proof of Implementation</b>	City staff will provide comments to the Project on possible improvement and funding options and ensure compliance with community values, citywide goals, and street design standards. City staff will confirm the implemented improvements meet specified standards during a pre-occupancy inspection of the Project. Upon approval, ongoing maintenance of all approved improvements contained within City rights-of-way will become the City’s responsibility.

Notes:

- (1) Ewing, R., & Cervero, R. (2010). Travel and the Built Environment - A Meta-Analysis. *Journal of the American Planning Association*, Table 3.
- (2) New street connections on the Project site do not qualify for the TDM program because it focuses on street improvements outside of the Project’s property frontage. However, if the Project proposes new street connections outside of its property frontage which improve bike and pedestrian access in the surrounding neighborhood, the Project should receive TDM points via MI01 and MI05.

<b>MI03</b>	<b>Provide Transit Network Improvements</b>
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<p><b>Description</b></p>	<p>Design, fund, and/or construct transit improvements on surface streets beyond the Project’s frontage. Examples of transit network improvements on surface streets include:</p> <ul style="list-style-type: none"> <li>▪ Transit stations;</li> <li>▪ Bus shelters;</li> <li>▪ Bus stop signage with service maps;</li> <li>▪ Bus stop real-time display monitors;</li> <li>▪ Bus stop seating areas;</li> <li>▪ Waste receptacles;</li> <li>▪ Mobility hubs;</li> <li>▪ Dedicated bus lanes or public service lanes;</li> <li>▪ Bus boarding islands;</li> <li>▪ Queue-jumps for buses;</li> <li>▪ Transit signal priority;</li> <li>▪ Couplet conversion from one-way to two-way streets;</li> <li>▪ Turn movement restrictions for traffic;</li> <li>▪ Signal modifications, wide sidewalks;</li> <li>▪ High-visibility crosswalks;</li> <li>▪ ADA-compliant curb ramps;</li> <li>▪ Protected intersections;</li> <li>▪ Protected bike lanes;</li> <li>▪ Wayfinding signage;</li> <li>▪ Pedestrian lighting;</li> <li>▪ Landscaping; and</li> <li>▪ Other features that improve access to transit for people traveling to/from the Project and in local community.</li> </ul>
<p><b>CEQA</b> <sup>(1,2)</sup></p>	<p><b><u>Home-End Uses and Commute-End Uses Only:</u></b>  % change in VMT = -0.08 × % change in distance to nearest transit stop</p>
<p><b>TDM Program</b> <b>(1 – 4 Points)</b></p>	<p><b><u>Home-End Uses, Commute-End Uses, Visit-End Uses, and Other Uses:</u></b>  Fund or perform the design and/or construction of transit network improvements outside of the Project’s property frontage and within 1 mile of the Project site, for a total cost equivalent to:</p> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> \$1,000 per dwelling unit or \$1 per square feet of non-residential gross floor area.</li> <li>▪ <b>2 Points:</b> \$2,000 per dwelling unit or \$2 per square feet of non-residential gross floor area.</li> <li>▪ <b>3 Points:</b> \$3,000 per dwelling unit or \$3 per square feet of non-residential gross floor area.</li> <li>▪ <b>4 Points:</b> \$4,000 per dwelling unit or \$4 per square feet of non-residential gross floor area.</li> </ul> <p>To satisfy this measure, the Project must provide improvements on at least one (1) General Plan-designated Grand Boulevard within 1 mile of the Project. The Project</p>



	<p>must work with City staff to identify improvements for the selected street(s) based on the:</p> <ul style="list-style-type: none"> <li>▪ <i>Move San José Plan;</i></li> <li>▪ <i>Multimodal Transportation Improvement Plans (MTIPs);</i></li> <li>▪ <i>Better Bike Plan 2025;</i></li> <li>▪ <i>Walk Safe San José Plan;</i></li> <li>▪ <i>Trail Master Plans;</i></li> <li>▪ <i>Vision Zero Action Plan;</i></li> <li>▪ <i>Emerging Mobility Action Plan;</i></li> <li>▪ <i>Green Stormwater Instructure Plan;</i></li> <li>▪ <i>Urban Village Plans;</i></li> <li>▪ <i>Station Area Plans;</i></li> <li>▪ <i>Complete Street Design Standards and Guidelines;</i></li> <li>▪ <i>Fast Transit Program (VTA);</i></li> <li>▪ <i>Pedestrian Access to Transit Plan (VTA);</i></li> <li>▪ <i>Transit Passenger Environment Plan (VTA);</i></li> <li>▪ <i>Santa Clara Countywide Bike Plan (VTA);</i></li> <li>▪ <i>Complete Streets Studies (VTA);</i></li> <li>▪ <i>Measure B Transit Operations Program (VTA); and</i></li> <li>▪ <i>Measure B Bicycle &amp; Pedestrian Program (VTA), etc., as appropriate.</i></li> </ul> <p>Based on the status of the selected street improvements, the Project will opt to fund or perform conceptual designs, full designs, and/or construction. All barriers to bike and micro-mobility access and interconnectivity must be minimized. Physical barriers such as walls, landscaping, and slopes that impede bike and micro-mobility access must be removed from project design.</p>
<p><b>Proof of Implementation</b></p>	<p>City staff will provide comments to the Project on possible improvement and funding options and ensure compliance with community values, citywide goals, and the City’s and VTA’s relevant design standards. City staff will confirm the implemented improvements meet specified standards during a pre-occupancy inspection of the Project. Upon approval, ongoing maintenance of all approved improvements contained within City rights-of-way will become the City’s responsibility.</p>

Notes:

- (1) Bento, A.M., Cropper, M.L., Mobarak, A.M., & Vinha, K. (2003). The impact of urban spatial structure on travel demand in the United States. *World Bank policy research working paper, 3007.*
- (2) Payment cannot be used towards CEQA VMT mitigation per Council Policy 5-1.

<p><b>MI04</b></p>	<p><b>Provide Residential Street Improvements</b></p>
<p><b>Description</b></p>	<p>Design, fund, and/or construct neighborhood street improvements beyond the Project’s frontage. Examples of neighborhood street improvements include neighborhood traffic management measures such as:</p>

	<ul style="list-style-type: none"> <li>▪ Curb markings;</li> <li>▪ Traffic signage;</li> <li>▪ High-visibility and/or raised crosswalks;</li> <li>▪ Signal modifications;</li> <li>▪ Radar trailer;</li> <li>▪ Stop signs;</li> <li>▪ Edgeline striping;</li> <li>▪ Truck restrictions;</li> <li>▪ Residential permit parking;</li> <li>▪ Flashing beacons;</li> <li>▪ Radar speed display signs;</li> <li>▪ Mid-block chokers;</li> <li>▪ Medians;</li> <li>▪ Curb extensions (detached or attached);</li> <li>▪ Speed humps and/or speed tables;</li> <li>▪ Traffic circles or roundabouts;</li> <li>▪ Chicanes;</li> <li>▪ Traffic diverters;</li> <li>▪ Extended median;</li> <li>▪ Partial or full street closure;</li> <li>▪ Traffic safety education programs; and</li> <li>▪ Traffic enforcement.</li> </ul> <p>Examples of other improvements on neighborhood streets include:</p> <ul style="list-style-type: none"> <li>▪ Low-stress bike boulevards;</li> <li>▪ Protected and/or raised bike lanes;</li> <li>▪ Continuous sidewalks;</li> <li>▪ ADA-compliant curb ramps;</li> <li>▪ Bus stops;</li> <li>▪ Lighting;</li> <li>▪ Wayfinding signage;</li> <li>▪ Landscaping;</li> <li>▪ Waste receptacles; and</li> <li>▪ Other features that improve transportation safety and quality of life.</li> </ul>
<p><b>CEQA</b> <sup>(1,2)</sup></p>	<p><b><u>Home-End Uses and Commute-End Uses Only:</u></b> % reduction in VMT = rate based on place type</p>
<p><b>TDM Program</b> <b>(1 – 4 Points)</b></p>	<p><b><u>Home-End Uses, Commute-End Uses, Visit-End Uses, and Other Uses:</u></b> Fund or perform the relevant design and/or construction of neighborhood traffic management improvements outside of the Project’s property frontage and within 1 mile of the Project site, for a total cost equivalent to:</p> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> \$1,000 per dwelling unit or \$1 per square feet of non-residential gross floor area.</li> </ul>

- **2 Points:** \$2,000 per dwelling unit or \$2 per square feet of non-residential gross floor area.
- **3 Points:** \$3,000 per dwelling unit or \$3 per square feet of non-residential gross floor area.
- **4 Points:** \$4,000 per dwelling unit or \$4 per square feet of non-residential gross floor area.

To satisfy this measure, the Project must improve at least one (1) neighborhood street within 1 mile of the Project. A neighborhood street is defined as one of General Plan-designed Main Streets, On-Street Primary Bike Facilities, and Resident Streets. The Project must work with City staff to identify improvements for the selected street(s) based on the:

- *Move San José Plan;*
- *Traffic Calming Toolkit;*
- *Traffic Calming Policy for Residential Neighborhoods;*
- *Stop Sign Policy;*
- *Road Hump Policy;*
- *Multimodal Transportation Improvement Plans (MTIPs);*
- *Better Bike Plan 2025;*
- *Walk Safe San José Plan;*
- *Trail Master Plans;*
- *Vision Zero Action Plan;*
- *Emerging Mobility Action Plan;*
- *Green Stormwater Instructure Plan;*
- *Urban Village Plans;*
- *Station Area Plans;*
- *Complete Street Design Standards and Guidelines;*
- *Fast Transit Program (VTA);*
- *Pedestrian Access to Transit Plan (VTA);*
- *Transit Passenger Environment Plan (VTA);*
- *Santa Clara Countywide Bike Plan (VTA);*
- *Complete Streets Studies (VTA);*
- *Measure B Transit Operations Program (VTA); and*
- *Measure B Bicycle & Pedestrian Program (VTA), etc., as appropriate.*

Based on the status of the selected street improvements, the Project will opt to fund or perform warrant studies, conceptual designs, full designs, and/or construction.

**Proof of Implementation**

City staff will provide comments to the Project on possible improvement and funding options and ensure compliance with community values, citywide goals, and the City’s and VTA’s relevant design standards. City staff will confirm the implemented improvements meet specified standards during a pre-occupancy inspection of the Project. Upon approval, ongoing maintenance of all approved

improvements contained within City rights-of-way will become the City’s responsibility.

- Notes:
- (1) Cambridge Systematics, Inc. (2009). *Moving Cooler: An Analysis of Transportation Strategies for Reducing Greenhouse Gas Emissions*, Table 3.1. Urban Land Institute. Washington, D.C.
  - (2) Payment cannot be used towards CEQA VMT mitigation per Council Policy 5-1.

MI05	Provide Pedestrian Network Improvements
<p><b>Description</b></p>	<p>Design, fund, and/or construct pedestrian network improvements beyond the Project’s frontage. Examples of pedestrian network improvements include:</p> <ul style="list-style-type: none"> <li>▪ Wider sidewalks;</li> <li>▪ Sidewalk extensions (detached or attached);</li> <li>▪ Public art;</li> <li>▪ High-visibility crosswalks;</li> <li>▪ Raised crosswalks;</li> <li>▪ Pedestrian scramble;</li> <li>▪ ADA-compliant curb ramps;</li> <li>▪ Leading pedestrian intervals at intersections;</li> <li>▪ Signal modifications;</li> <li>▪ Wayfinding signage;</li> <li>▪ Lighting;</li> <li>▪ Street trees and landscaping;</li> <li>▪ Green infrastructure for stormwater management;</li> <li>▪ Waste receptacles;</li> <li>▪ Parklets;</li> <li>▪ Protected bike lanes;</li> <li>▪ Traffic calming measures for achieving low traffic volume and speeds;</li> <li>▪ Passenger and commercial loading zones;</li> <li>▪ Vehicle metered parking; and</li> <li>▪ Other features that improve the walking experience in the local community.</li> </ul>
<p><b>CEQA</b> <sup>(1,2)</sup></p>	<p><b><u>Home-End Uses and Commute-End Uses Only:</u></b> % reduction in VMT = rate based on place type</p>
<p><b>TDM Program</b> <b>(1 – 4 Points)</b></p>	<p><b><u>Home-End Uses, Commute-End Uses, Visit-End Uses, and Other Uses:</u></b> Fund or perform the design and/or construction of pedestrian street improvements beyond and within 1 mile of the Project’s property frontage, for a total cost equivalent to:</p> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> \$1,000 per dwelling unit or \$1 per square feet of non-residential gross floor area.</li> <li>▪ <b>2 Points:</b> \$2,000 per dwelling unit or \$2 per square feet of non-residential gross floor area.</li> <li>▪ <b>3 Points:</b> \$3,000 per dwelling unit or \$3 per square feet of non-residential gross floor area.</li> </ul>

- **4 Points:** \$4,000 per dwelling unit or \$4 per square feet of non-residential gross floor area.

To satisfy this measure, the Project must improve at least one (1) General Plan-designated Main Street or Paseo within 1 mile of the Project. The Project must work with City staff to identify improvements for the selected street(s) based on the:

- *Move San José Plan;*
- *Multimodal Transportation Improvement Plans (MTIPs);*
- *Better Bike Plan 2025;*
- *Walk Safe San José Plan;*
- *Trail Master Plans;*
- *Vision Zero Action Plan;*
- *Emerging Mobility Action Plan;*
- *Green Stormwater Instructure Plan;*
- *Urban Village Plans;*
- *Station Area Plans;*
- *Complete Street Design Standards and Guidelines;*
- *Fast Transit Program (VTA);*
- *Pedestrian Access to Transit Plan (VTA);*
- *Transit Passenger Environment Plan (VTA);*
- *Santa Clara Countywide Bike Plan (VTA);*
- *Complete Streets Studies (VTA);*
- *Measure B Transit Operations Program (VTA); and*
- *Measure B Bicycle & Pedestrian Program (VTA), etc., as appropriate.*

Based on the status of the selected street improvements, the Project will opt to fund or perform conceptual designs, full designs, and/or construction. All barriers to pedestrian access and interconnectivity must be minimized. Physical barriers such as walls, landscaping, and slopes that impede pedestrian access must be removed from project design.

**Proof of Implementation**

City staff will provide comments to the Project on possible improvement and funding options and ensure compliance with community values, citywide goals, and the City's and VTA's relevant design standards. City staff will confirm the implemented improvements meet specified standards during a pre-occupancy inspection of the Project. Upon approval, ongoing maintenance of all approved improvements contained within City rights-of-way will become the City's responsibility.

Notes:

- (1) Cambridge Systematics, Inc. (2009). *Moving Cooler: An Analysis of Transportation Strategies for Reducing Greenhouse Gas Emissions*, Table 3.1. Urban Land Institute. Washington, D.C.
- (2) Payment cannot be used towards CEQA VMT mitigation per Council Policy 5-1.

Parking [PK01 – PK03]

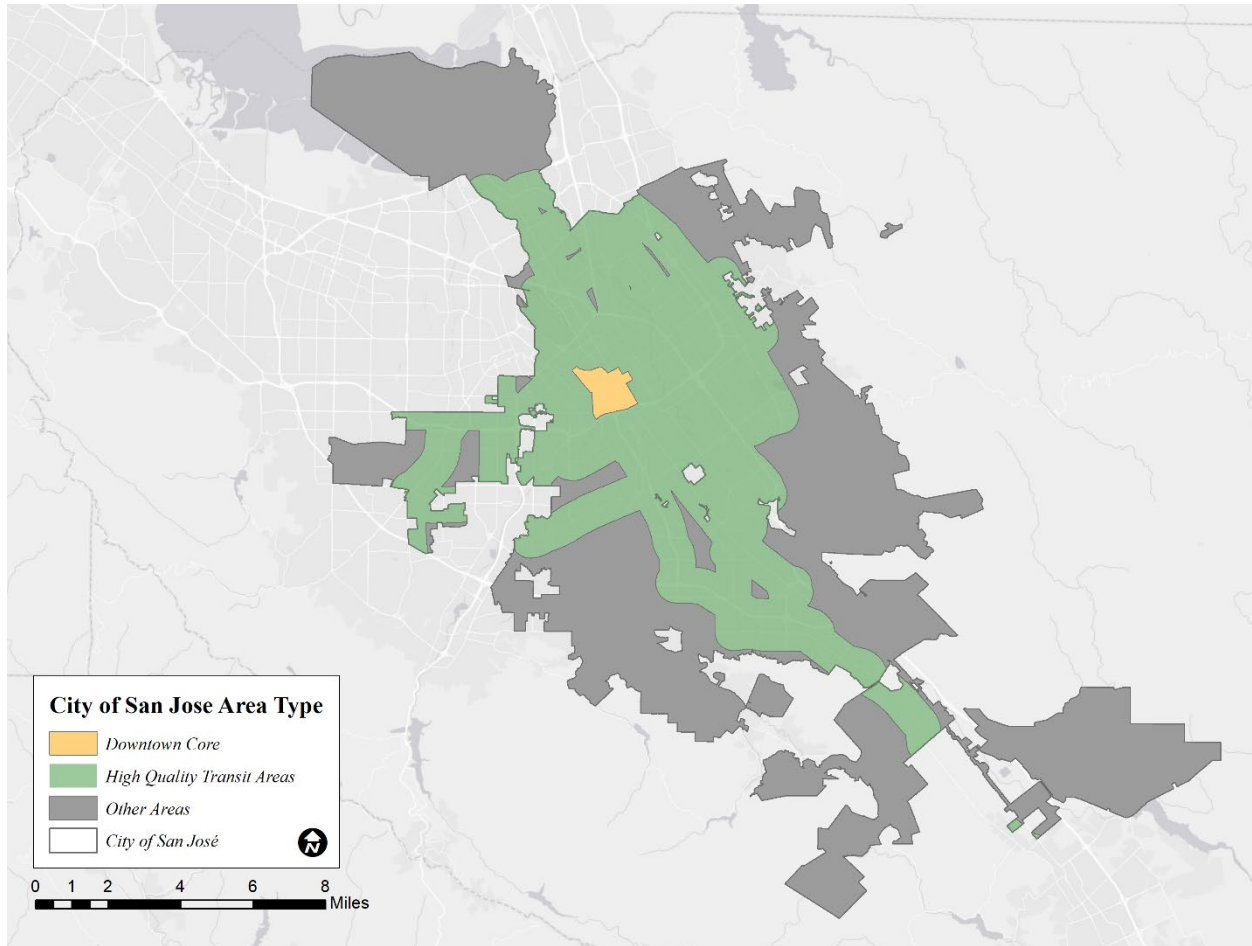
PK01	Right-size Parking Supply						
<b>Description</b>	Provide off-street automobile parking supply at ratios lower than those documented in the Institute of Transportation Engineers (ITE) Parking Generation Manual.						
<b>CEQA <sup>(1)</sup></b>	<p><b>Commuter-End Uses Only:</b> % VMT Reduction = % Reduction of parking supply from the parking generation rate in ITE Parking Generation Manual × 0.5</p> <p><b>Home-End Uses, Commuter-End Uses, and Visitor-End Uses Only:</b> TDM point values are based on the Project’s off-street parking ratio, which accounts for <u>both</u> any on-site automobile parking spaces built by the Project <u>and</u> any off-site automobile parking spaces shared with the Project (Refer to PK03 for more information about shared parking). The parking ratio does not account for any on-site car share spaces.</p>						
<b>TDM Program (1 – 20 Points)</b>	Parking Ratio						
	Points	Downtown		High-Quality Transit Areas		Other Areas	
		Home-End (per dwelling unit)	Commuter-End/ Visitor-End (per 1,000 square feet)	Home-End (per dwelling unit)	Commuter-End/ Visitor-End (per 1,000 square feet)	Home-End (per dwelling unit)	Commuter-End/ Visitor-End (per 1,000 square feet)
	20	0-0.75	0-1.00	0-1.24	0-1.50	0-1.40	0-2.00
	18	.76-.84	1.01-1.20	1.25-1.37	1.51-1.80	1.41-1.57	2.01-2.30
	16	.85-.93	1.21-1.40	1.38-1.50	1.81-2.10	1.58-1.74	2.31-2.60
	14	.94-1.02	1.41-1.60	1.51-1.63	2.11-2.40	1.75-1.91	2.61-2.90
	12	1.03-1.11	1.61-1.80	1.64-1.76	2.41-2.70	1.92-2.08	2.91-3.20
	10	1.12-1.20	1.81-2.00	1.77-1.89	2.71-3.00	2.09-2.25	3.21-3.50
	8	1.21-1.29	2.01-2.20	1.90-2.02	3.01-3.30	2.26-2.42	3.51-3.80
	6	1.30-1.38	2.21-2.40	2.03-2.15	3.31-3.60	2.43-2.57	3.81-4.10
	4	1.39-1.47	2.41-2.60	2.16-2.28	3.61-3.90	2.58-2.74	4.11-4.40
	2	1.48-1.56	2.61-2.80	2.29-2.41	3.91-4.20	2.75-2.91	4.41-4.70
	1	1.57-1.65	2.81-3.00	2.42-2.54	4.21-4.50	2.92-3.08	4.71-5.00
0	1.66+	3.01+	2.55+	4.51+	3.09+	5.01+	
<p>- Downtown: Projects located in the Downtown core as defined in the City’s <i>Downtown Strategy 2040</i>, approximately bounded by Taylor Street and</p>							

	<p>Coleman Avenue to the north, Fourth Street to the east, I-280 to the south, and Stockton Ave and the railroad tracks to the west.</p> <ul style="list-style-type: none"> <li>- High-Quality Transit Area: Projects located within ½ miles of an existing major transit stop <sup>(2)</sup> or an existing stop along a high-quality transit corridor <sup>(3)</sup>.</li> <li>- Other Area: Projects located in areas outside of Downtown or High-Quality Transit Area.</li> </ul> <p>Refer to <b>Figure 20</b> for a map of the Downtown, High-Quality Transit, and Other Areas in the city.</p>
<p><b>Proof of Implementation</b></p>	<p>City staff will confirm the number of vehicle parking spaces built on-site during a pre-occupancy inspection of the site. As necessary, City staff will conduct site visits to confirm that the amenities meet specified standards.</p>

Notes:

- (1) Nelson\Nygaard, Inc. (2005). *Crediting Low-Traffic Developments*, 16.  
<http://www.montgomeryplanning.org/transportation/documents/TripGenerationAnalysisUsingURBEMIS.pdf>
- (2) Defined in the Pub. Resources Code § 21064.3 (“Major transit stop” means a site containing an existing rail transit station, a ferry terminal served by either a bus or rail transit service, or the intersection of two or more major bus routes with a frequency of service interval of 15 minutes or less during the morning and afternoon peak commute periods”).
- (3) Defined in the Pub. Resources Code § 21155 (b) (“A high-quality transit corridor means a corridor with fixed route bus service with service intervals no longer than 15 minutes during peak commute hours”).

**Figure 20 Downtown, High-Quality Transit, and Other Areas in San José (April 2023)**



PK02	Provide Bike Parking Facilities
<b>Description</b>	<p>Provide on-site secure bicycle parking facilities including bike racks, bike lockers, showers, changing rooms, personal lockers, bike repair station, and bike maintenance services at applicable rate prescribed below.</p> <p>Short-term spaces, such as inverted-u racks or post and ring installations, must be weather protected, sturdy, and well anchored. Short-term spaces typically meet the needs of shoppers or visitors and are used for a couple of hours at a time.</p> <p>Long-term spaces, such as bike lockers or bike cages, must be fully sheltered from weather elements and provide a form of access control such as keys or smart cards. Long-term spaces are typically designed to meet the needs of commuters or residents who require storing their bike safely for an entire day or longer.</p>



	Spaces must meet all City requirements and reflect design best practices such as those identified by the Association of Pedestrian and Bicycle Professionals (APBP).
<b>CEQA <sup>(1)</sup></b>	<p><b><u>Commute-End Uses Only:</u></b></p> <p>% VMT reduction = bike mode share × level-of-facility-multiplier, then discounted to take into account that bike trip lengths are shorter than drive trip lengths</p>
<b>TDM Program (1 – 2 Points)</b>	<p><b><u>Home-End Uses, Commute-End Uses, and Visit-End Uses Only:</u></b></p> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> Provide two (2) of the following on-site bike parking facilities.</li> <li>▪ <b>2 Points:</b> Provide four (4) of the following on-site bike parking facilities. <ul style="list-style-type: none"> <li>- Short-term and long-term parking: Provide at least 2 times as many secure short-term and long-term bicycle parking spaces on site as required by zoning. Include wayfinding signage.</li> <li>- Showers, changing rooms, lockers: Provide at least 2 times as many showers, changing rooms, and clothes lockers on site as required by zoning. Include wayfinding signage.</li> <li>- Bike repair station: Provide a covered area such as a bike storage room or garage on site. Tools and supplies must include, at minimum, those needed to fix a flat tire, adjust a chain, and performing other basic maintenance. Available tools must include, at minimum, a bicycle pump, wrenches, a chain tool, tire levers, hex keys/Allen wrenches, screwdrivers, and spoke wrenches. Although not required, vending machines selling items such as bike tubes, patch kits, lights, locks, hand warmers, and other bicycling gear can be paired with repair stations. Include wayfinding signage.</li> <li>- Bike maintenance services: Include, at minimum, a staffed facility on site providing basic bicycle maintenance services available to the public. Services can also include the sale and rental of bicycle parts, bicycling gear, and tools. Include wayfinding signage.</li> </ul> </li> </ul>
<b>Proof of Implementation</b>	City staff will confirm that the credited amenities meet the design requirements stated above during a pre-occupancy inspection of the site. HOAs/Property owners must include up-to-date photos of the amenities and any supportive facilities and signage to demonstrate that they are in good condition and accessible to Project residents/employees as attachments to their annual TDM Plan Compliance Forms. As necessary, City staff will conduct site visits to confirm that the amenities meet specified standards.

Notes:

(1) Buehler, R. (2012). Determinants of bicycle commuting in the Washington, DC region: The role of bicycle parking, cyclist showers, and free car parking at work. *Transportation Research Part D*, 17, 525-531.

<b>PK03</b>	<b>Provide Shared Parking</b>
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<p><b>Description</b></p>	<p>Provide off-street automobile parking spaces that are shared among a group of employees, residents, and/or visitors, allowing the parking spaces to be used more efficiently than if they were assigned to specific users. Examples of shared parking include:</p> <ul style="list-style-type: none"> <li>▪ Zoned parking: On-site parking is shared among Project dwelling units/employers, rather than assigned to individual dwelling units/employers.</li> <li>▪ Private parking shared between different uses of the Project: On-site parking are shared among different buildings and facilities of a mixed-use project to take advantage of different peak periods. For example, an office complex can efficiently share parking spaces with on-site shops since the parking demand of offices peaks during weekdays while that of the other uses normally peak during evenings and weekends.</li> <li>▪ Multiple private entities: Parking spaces are shared among buildings and facilities of multiple private entities in an area. For example, the Project can build zero parking and have a contractual agreement with an adjacent property that shares parking, or the Project can agree to share its on-site parking with an adjacent property.</li> <li>▪ Private and publicly accessible parking: On-site parking is shared between the Project and public users and destinations to take advantage of different peak periods. For example, an office complex in Downtown or an urban village can efficiently share parking spaces with the public, since the parking demand of offices peaks during weekdays while public parking for residential purposes, access to transit, restaurants, malls, theaters, parks, entertainment, or events in Downtown or urban villages normally peak during evenings and weekends.</li> <li>▪ Public parking: Parking needs are met by relying on public parking facilities rather than having the Project provide private parking, allowing for public spaces to serve the Project and other users and destinations at different peak periods. The Project can purchase public spaces at hourly or daily market rates. Monthly or yearly passes are strongly discouraged.</li> </ul>
<p><b>CEQA</b></p>	<p>Not applicable</p>
<p><b>TDM Program (1 – 2 Points)</b></p>	<p><b><u>Home-End Uses, Commute-End Uses, and Visit-End Uses Only:</u></b></p> <ul style="list-style-type: none"> <li>- <b>1 Point:</b> Provide at least 10 spaces, or 25% of the off-street parking spaces, whichever is greater, for at least one (1) of the following types of shared parking: <ul style="list-style-type: none"> <li>- On-site zoned parking</li> <li>- On-site private parking shared between Project uses</li> <li>- Off-site private parking shared by an adjacent property</li> <li>- On-site private parking shared with an adjacent property</li> </ul> </li> <li>- <b>2 Points:</b> Provide at least 10 spaces, or 25% of the off-street parking spaces, whichever is greater, for at least one (1) of the following types of shared parking:</li> </ul>

	<ul style="list-style-type: none"> <li>- On-site private parking, publicly accessible during daytime (e.g. 6 a.m. to 6 p.m.), Mondays to Fridays</li> <li>- On-site private parking, publicly accessible during nighttime (e.g. 6 p.m. to 6 a.m.), Mondays to Fridays</li> <li>- On-site private parking, publicly accessible on weekends and holidays</li> <li>- Off-site public parking facilities (charged hourly or daily)</li> </ul>
<b>Proof of Implementation</b>	The Project must identify the spaces to be shared, the signage identifying the times and terms of public access to them, to be confirmed by City staff during a pre-occupancy inspection of the site. Property owners must include up to date photos demonstrating that these spaces remain in place, properly marked and maintained, and accessible to the public upon submittal of their annual monitoring and reporting update. As necessary, City staff will conduct site visits to confirm that the amenities meet specified standards.

*Programmatic Transportation Demand Management [TP01 – TP18]*

TP01	Provide School Pool Program
<b>Description</b>	Provide a school pool program that match parents who transport students to/from schools without a bus program, including private schools, charter schools, and neighborhood schools. Open to all families in the Project, a school pool program would encourage families to find carpools for school pick-up and drop-off and reduce the total number of vehicle trips traveling to and from schools, thereby reducing VMT.
<b>CEQA</b> <sup>(1), (2)</sup>	<b>Home-End Uses Only:</b> % VMT Reduction = 8.25% × % of households expected to participate
<b>TDM Program (1 Point)</b>	<b>Home-End Uses Only:</b> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> Enroll parents and students in an online ride matching service that connects people through a secure network to post and search for shared rides.</li> </ul>
<b>Proof of Implementation</b>	HOAs/Property owners must submit copies active enrollment with a ride matching platform and provide any informational materials distributed that describe the school pool program as attachments to their annual TDM Plan Compliance Forms.

Notes:

(1) California Department of Transportation. (2013). *2010-2012 California Households Travel Survey*.

(2) U.S. Census Bureau. (2018). *2017 American Community Survey*.

TP02	Provide Bike Share Stations
<b>Description</b>	Provide bike share stations for Project residents/employees, allowing for on-demand access to shared bikes on an as-needed basis.
<b>CEQA</b>	Not applicable

<p><b>TDM Program (1 – 2 Points)</b></p>	<p><b><u>Home-End Uses, Commute-End Uses, and Visit-End Uses Only:</u></b></p> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> Provide one (1) of the following bike share facilities.</li> <li>▪ <b>2 Points:</b> Provide at least two (2) of the following bike share facilities. <ul style="list-style-type: none"> <li>- Provide at least six (6) shared bikes/e-bikes on site via Bay Wheels or a dedicated fleet on-site for use by Project residents/employees and the general public. Include wayfinding signage.</li> <li>- Subscribe to the City’s bike share program. Establish a new or expand an existing public bike share station to include six (6) bikes/e-bikes on public streets or garages within ½ miles of the Project for use by Project residents/employees and the general public.</li> <li>- Provide at least one (1) cargo bike and one (1) collapsible shopping/utility cart on site for use by Project residents/employees. Include wayfinding signage.</li> </ul> </li> </ul>
<p><b>Proof of Implementation</b></p>	<p>City staff will confirm that the required number of shared bikes are provided during a pre-occupancy inspection of the site. HOAs/Property owners must include up-to-date photos of the shared bikes and any supportive facilities and signage to demonstrate that they are in good condition and accessible to Project residents/employees as attachments to their annual TDM Plan Compliance Forms. As necessary, City staff will conduct site visits to confirm that the amenities meet specified standards.</p>

TP03	Provide Car Share Stations
<p><b>Description</b></p>	<p>Provide car share or neighborhood electric vehicles (NEV) share facilities for Project residents/employees, allowing for on-demand access to a shared fleet of vehicles on an as-needed basis. NEVs are light, electric, low-speed vehicles that offer an alternative to traditional vehicle trips and are ideal for short, local trips.</p>
<p><b>CEQA <sup>(1)</sup></b></p>	<p><b><u>Home-End Uses and Commute-End Uses Only:</u></b>  % VMT Reduction = 32.8% × 2% expected participation × % of total residents or employees that are eligible</p>
<p><b>TDM Program (1 – 4 Points)</b></p>	<p><b><u>Home-End Uses, Commute-End Uses, and Visit-End Uses Only:</u></b></p> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> Provide one (1) of the following.</li> <li>▪ <b>2 Points:</b> Provide two (2) of the following.</li> <li>▪ <b>3 Points:</b> Provide three (3) of the following.</li> <li>▪ <b>4 Points:</b> Provide each of the following. <ul style="list-style-type: none"> <li>- Provide at least one (1) car share vehicle with a reserved parking space, plus another such vehicle and space for every 40 dwelling units and every 10,000 square feet of non-residential occupied floor area on site for use by Project residents/employees. Include striping, signage, and educational tools.</li> </ul> </li> </ul>

	<ul style="list-style-type: none"> <li>- Provide a neighborhood electric vehicle (NEV) station including a shared fleet of at least one (1) NEV plus another such vehicle for every 40 dwelling units and every 10,000 square feet of non-residential occupied floor area on site for use by Project residents/employees. Include charging facilities, striping, signage, and educational tools. NEV routes must be designed on streets in a low-speed neighborhood.</li> <li>- Subscribe to the City’s one-way car share program. Establish a new or expand an existing public car share or NEV station to include a shared fleet of at least one (1) car share vehicle or NEV plus another such vehicle for every 40 dwelling units and every 10,000 square feet of non-residential occupied floor area on public streets or garages within ½ miles of the Project for use by <u>both</u> Project residents/employees <u>and</u> others in the local community.</li> <li>- Provide secure storage for car seats and strollers as complementary amenities for car share users at the car share facilities.</li> </ul>
<b>Proof of Implementation</b>	<p>City staff will confirm that the required number of spaces are provided during a pre-occupancy inspection of the site. HOAs/Property owners must include up-to-date photos of the car share or NEV spaces and any accompanying signage to demonstrate that they are in good condition and accessible to Project residents/employees as attachments to their annual TDM Plan Compliance Forms. As necessary, City staff will conduct site visits to confirm that the amenities meet specified standards.</p>

Notes:

(1) Cervero, R., Golub, A., & Nee, B. (2007). City Carshare: Longer-term travel demand and car ownership impacts. *Transportation Research Record*, 1992(1): 70-80. Journal of the Transportation Research Board.

TP04	Provide Education, Marketing, and Outreach
<b>Description</b>	Implement a marketing campaign to provide Project residents/employees with information on travel options and encourage the use of transit, shared rides, walking, and biking. The campaign strategies may include new resident/employee orientation on alternative travel options, event promotions, educational programs, and publications.
<b>CEQA <sup>(1)</sup></b>	<b><u>Commute-End Uses Only:</u></b> % VMT Reduction = 4% × 1 (vehicle trip to VMT ratio) × % of total employees that are eligible
<b>TDM Program (1 – 2 Points)</b>	<b><u>Home-End Uses and Commute-End Uses Only:</u></b> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> Provide one (1) of the following education, marketing, and outreach strategies to all Project residents/employees.</li> <li>▪ <b>2 Points:</b> Provide at least (2) of the following education, marketing, and outreach strategies all Project residents/employees.</li> </ul>

	<ul style="list-style-type: none"> <li>- Provide TDM promotions such as targeted messaging and communications campaigns, incentives, giveaways, and competitions.</li> <li>- Provide welcome packets with information about nearby amenities (e.g. transit centers, parks, schools, hospitals, stores, etc.), travel options (e.g. key transit service, biking, and walking routes, etc.), and available transportation benefits and incentives (e.g. transit pass subsidy, bike share program, etc.).</li> <li>- Enroll new residents/employees in a Transportation Management Platform (TMP) application such as ZAP Twin Cities, Luum, or RideAmigos, which offer commute planning functionality, parking management, and transit information online and through mobile applications. TMPs gamify commute behavior by actively logging how people travel and using this information to provide incentives, start friendly competition, or raise awareness about these decisions and the associated financial, environmental, and health impacts.</li> <li>- Organize commuter fairs to promote local routes and services for alternative travel options.</li> <li>- Organize educational programs to raise awareness, motivation, and action about travel choices.</li> <li>- Other education, marketing, and outreach strategies.</li> </ul>
<b>Proof of Implementation</b>	HOAs/Property owners must submit copies of all promotional materials, welcome packets, and TMP application information distributed to their residents/employees as attachments to their annual TDM Plan Compliance Forms.

Notes:

(1) Transit Cooperative Research Program. (2010). *TCRP 95 Traveler Response to Transportation System Changes – Chapter 19 Employer and Institutional TDM Strategies.*

TP05	Join a Transportation Management Association
<b>Description</b>	<p>Partake in an established Transportation Management Association (TMA) in a local area. The TMA implements a set of TDM programs for multiple projects in a local area and help them meet their TDM requirements. TMAs are usually more cost-effective than individual projects to deliver TDM programs. Potential funding mechanisms for the TMA include TMA membership fees, net parking revenue, a parking in-lieu fee, and special financing districts, etc. To date, the following TMAs have been approved by City Council for establishment:</p> <ul style="list-style-type: none"> <li>▪ Diridon Station Area TMA</li> <li>▪ Berryessa BART Urban Village Area TMA</li> </ul> <p>Examples of TDM programs provided by a TMA include:</p> <ul style="list-style-type: none"> <li>▪ School Pool Program (TP01)</li> <li>▪ Education, Marketing, and Outreach (TP04)</li> <li>▪ Transit Fare Subsidies (TP07)</li> </ul>

	<ul style="list-style-type: none"> <li>Alternative Transportation Benefits (TP11)</li> <li>Ride-share Program (TP13)</li> <li>Targeted Behavior Interventions (TP15)</li> <li>Vanpool Subsidy (TP17)</li> <li>Voluntary Travel Behavior Change Programs (TP18)</li> </ul>
<b>CEQA</b> <sup>(1,2)</sup>	<p><b>Commute-End Uses Only:</b></p> <p>% VMT Reduction = % reduction in commute VMT * % expected to participate</p>
<b>TDM Program</b>	<p><b>Home-End Uses, Commute-End Uses, and Visit-End Uses Only:</b></p> <p>Points will be awarded for the TDM programs provided by the TMA. HOAs/Property owners must subscribe to the TMA with payment of annual membership fees.</p>
<b>Proof of Implementation</b>	<p>HOAs/Property owners must submit copies of invoices for payment of annual TMA membership fees as attachments to their annual TDM Plan Compliance Forms.</p>

Notes:

- (1) For commute-end uses, joining a Transportation Management Association would qualify as establishing a “Commute Trip Reduction Program” under CEQA. In other words, by subscribing to an established TMA, office projects would be able to reduce their VMT under CEQA via the “Commute Trip Reduction Program” measure in the City-adopted VMT Evaluation Tool.
- (2) Cambridge Systematics, Inc. (2009). *Moving Cooler: An Analysis of Transportation Strategies for Reducing Greenhouse Gas Emissions* (Table 5.13 & Table D.3). Urban Land Institute. Washington, D.C.

<b>TP06</b>	<b>Provide Parking Cash-out</b>
<b>Description</b>	<p>Offer Project employees parking "cash-out". Where free automobile parking is provided, provide Project employees the option to forgo subsidized/free parking in exchange for a cash payment equivalent to the cost that the employer would otherwise bear for providing the automobile parking space.</p>
<b>CEQA</b> <sup>(1)</sup>	<p><b>Commute-End Uses Only:</b></p> <p>% VMT Reduction = % reduction of commute VMT by place type × % of total employees that are eligible</p>
<b>TDM Program (2 Points)</b>	<p><b>Commute-End Uses and Other Uses Only:</b></p> <ul style="list-style-type: none"> <li>Provide all Project employees eligible for subsidized or free automobile parking with the choice of forgoing a parking space for a cash payment equivalent to the market rates of parking prices.</li> </ul>
<b>Proof of Implementation</b>	<p>Property owners must submit copies of all informational materials about parking cash-out and current rates for all employers at the site as attachments to their annual TDM Plan Compliance Forms.</p>

Notes:

- (1) Cambridge Systematics, Inc. (2009). *Moving Cooler: An Analysis of Transportation Strategies for Reducing Greenhouse Gas Emissions* (Table 5.13 & Table D.3). Urban Land Institute. Washington, D.C.

<b>TP07</b>	<b>Provide Transit Fare Subsidies</b>
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<b>Description</b>	Provide transit passes and fare subsidies for Project residents/employees. Fare subsidies can be spent on VTA/BART/Caltrain fare tickets or monthly passes.
<b>CEQA <sup>(1)</sup></b>	<b>Home-End Uses and Commute-End Uses Only:</b> % VMT Reduction = (% Vehicle Share / (1 - % Transit Share)) × (0.43 * % Fare Subsidy × % Transit Share)
<b>TDM Program (1 – 8 Points)</b>	<b>Home-End Uses, Commute-End Uses, Visit-End Uses, and Other Uses:</b> For each Project dwelling unit or employee subscribed to a transit pass program: <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> Subsidize annual/monthly transit pass and trip expenses, or \$15/month, whichever is lower.</li> <li>▪ <b>2 Points:</b> Subsidize annual/monthly transit pass and trip expenses, or \$30/month, whichever is lower.</li> <li>▪ <b>3 Points:</b> Subsidize annual/monthly transit pass and trip expenses, or \$45/month, whichever is lower.</li> <li>▪ <b>4 Points:</b> Subsidize annual/monthly transit pass and trip expenses, or \$60/month, whichever is lower.</li> </ul> Commuter-end uses with 50 or more employees must provide such subsidy via the MTC’s Bay Area Commuter Benefits Program. <ul style="list-style-type: none"> <li>▪ <b>Double Points:</b> Receive twice as many points as described above by providing the same number of the selected transit passes and fare subsidies to low-income families in the local community. For example, a 100-unit residential project which provides transit fare subsidies of up to \$60 per month per unit (4 Points) would receive additional 4 Points (a total of 8 Points) if the project provides another set of the same transit fare subsidies to 100 low-income families in the surrounding neighborhood.</li> </ul>
<b>Proof of Implementation</b>	HOAs/Property owners must submit copies of invoices for transit pass and subsidy contributions and any informational materials that describe available transit subsidies that have been provided to Project dwelling units/employees as attachments to their annual TDM Plan Compliance Forms.

Notes:

(1) Handy, S., Lovejoy, K., Boarnet, M.G., Spears, S. (2013). *Impacts of Transit Service Strategies on Passenger Vehicle Use and Greenhouse Gas Emissions*. California Environmental Protection Agency Air Resources Board.

<b>TP08</b>	<b>Provide Flexible Work Schedules</b>
<b>Description</b>	Implement alternative work schedules or telecommuting options, such as staggered shift start times, flexible schedules, compressed work weeks, and partial telecommuting schedules, etc.
<b>CEQA <sup>(1)</sup></b>	<b>Commuter-End Uses Only:</b> % VMT Reduction = reduction based on type of alternative schedule × % of total employees that participate



<b>TDM Program (1 – 4 Points)</b>	<b>Commute-End Uses Only:</b>					
	Work Schedule	Employee Participation Rate				
		1-10%	11-25%	26-50%	51-75%	76-100%
		Points				
	9-day/80-hour/2 weeks	-	-	-	-	-
	4-day/40-hour/1 week	-	-	-	-	1
	Telecommuting 1 day/week	-	-	-	-	1
	Telecommuting 2 days/week	-	-	-	1	2
	Telecommuting 3 days/week	-	-	1	2	3
Telecommuting 4 days/week	-	1	2	3	4	
Telecommuting 5 days/week	1	2	3	4	4	
<b>Proof of Implementation</b>	Property owners must summarize all alternative work schedules or telecommuting options available to site employees, report participation counts, and copies of any informational materials that describe available flexible work schedule benefits that have been provided as attachments to their annual TDM Plan Compliance Forms.					

Notes:

- (1) Cambridge Systematics, Inc. (2009). *Moving Cooler: An Analysis of Transportation Strategies for Reducing Greenhouse Gas Emissions* (Table 5.13). Urban Land Institute. Washington, D.C.

<b>TP09</b>	<b>Provide Private Shuttle/ Transit Service</b>
<b>Description</b>	Provide direct neighborhood, employer, or school shuttle service for use by residents, employees, students, and/or visitors. Neighborhood shuttles must serve key transit hubs, commercial centers, civic destinations, and places with high concentrations of residents and visitors. Employer-based shuttles must serve key transit hubs, destinations relevant to the business, commercial centers, and places with high concentrations of employees. School shuttles must serve private schools, charter schools, and neighborhood schools. Shuttle service must be provided free of charge to Project residents, employees, students, and visitors.
<b>CEQA <sup>(1)</sup></b>	<b>Commute-End Uses Only:</b> % VMT Reduction = 47% × % of total employees that participate
<b>TDM Program (4 – 8 Points)</b>	<b>Home-End Uses, Commute-End Uses, and Visit-End Uses Only:</b> ▪ <b>4 Points:</b>

	<ul style="list-style-type: none"> <li>- Provide free neighborhood shuttle service to Project residents and visitors at least every 30 minutes during peak periods on weekdays and at least every 60 minutes during off-peak periods on weekdays and weekends, serving destinations within 2 miles of the Project; or</li> <li>- Provide free employer shuttle service to Project employees during commute periods on weekdays, serving areas with high concentrations of Project employees; or</li> <li>- Work with the school district or private schools to provide new or expanded free school shuttle service to transport on-site students to/from private schools, charter schools, and/or neighborhood schools.</li> </ul> <ul style="list-style-type: none"> <li>▪ <b>8 Points:</b> <ul style="list-style-type: none"> <li>- Provide free neighborhood shuttle service to both Project residents and visitors and others in the local community at least every 15 minutes during peak periods on weekdays and at least every 30 minutes during off-peak periods on weekdays and weekends, serving destinations within 2 miles of the Project; or</li> <li>- Work with the school district or private schools to provide new or expanded free school shuttle service to transport both on-site students and other students in the local community to/from private schools, charter schools, and/or neighborhood schools.</li> </ul> </li> </ul>
<b>Proof of Implementation</b>	HOAs/Property owners must submit copies of the shuttle schedule, routes, stops, contact information of the shuttle operator, and any informational materials distributed to promote the service as attachments to their annual TDM Plan Compliance Forms.

Notes:

(1) San Francisco Municipal Transportation Agency. (2015). *Commuter Shuttle Pilot Program Evaluation Report*.

TP10	Price Parking
<b>Description</b>	Require Project employees and visitors to pay for automobile parking on-site. Charge hourly and/or daily parking at market rate or dynamically.
<b>CEQA</b> <sup>(1), (2)</sup>	<b>Commute-End Uses Only:</b> % VMT Reduction = % reduction based on parking fee and place type × % of total employees subject to priced parking
<b>TDM Program (1 – 2 Points)</b>	<b>Commute-End Uses (2 points), and Visit-End Uses (1 point) Only:</b> <ul style="list-style-type: none"> <li>▪ Price all available on-site automobile parking at hourly and/or daily rates. Parking prices must be set at market rate or dynamically based on demand throughout the day. Weekly, monthly, annual, or other long-term parking pass options must not be provided. Parking validation may be provided for invited guests only.</li> </ul>

**Proof of Implementation**

Property owners must submit copies of all informational materials about available parking options and current parking rates as attachments to their annual TDM Plan Compliance Forms.

Notes:

- (1) Cambridge Systematics, Inc. (2009). *Moving Cooler: An Analysis of Transportation Strategies for Reducing Greenhouse Gas Emissions* (Table 5.13 & Table D.3). Urban Land Institute. Washington, D.C.
- (2) Litman, T. (2017). *Understanding Transport Demands and Elasticities*. Victoria Transport Policy Institute.

TP11	Provide Alternative Transportation Benefits
<b>Description</b>	Provide alternative transportation benefits to Project residents/employees, which may include financial subsidies or pre-tax deductions for transit, vanpooling, carpooling, bike-sharing, scooter-sharing, and car-sharing trips.
<b>CEQA</b>	Not applicable
<b>TDM Program (1 – 8 Points)</b>	<p><b><u>Home-End Uses, Commute-End Uses, Visit-End Uses, and Other Uses:</u></b></p> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> Provide one (1) of the following subsidies to each Project dwelling unit or employee.</li> <li>▪ <b>2 Points:</b> Provide two (2) of the following subsidies to each Project dwelling unit or employee.</li> <li>▪ <b>3 Points:</b> Provide three (3) of the following subsidies to each Project dwelling unit or employee.</li> <li>▪ <b>4 Points:</b> Provide four (4) of the following subsidies to each Project dwelling unit or employee.               <ul style="list-style-type: none"> <li>- Pre-tax deduction: Allow Project employees to exclude transit or vanpooling expenses from taxable income up to the IRS limit.</li> <li>- Bike share: Subsidize annual/monthly membership and trip expenses, or \$15/month, whichever is lower, for each Project dwelling unit or employee subscribed to Bay Wheels or other bike share providers.</li> <li>- Scooter share: Subsidize annual/monthly membership and trip expenses, or \$15/month, whichever is lower, for each Project dwelling unit or employee subscribed to scooter share providers.</li> <li>- Car share: Subsidize annual/monthly membership and trip expenses, or \$15/month, whichever is lower, for each Project dwelling unit or employee subscribed to car share providers.</li> <li>- Mobility Wallet: Subsidize mobility wallet membership and expenses, or \$15/month, whichever is lower, for each Project dwelling unit or employee. Available for Project residents/employees to purchase, mobility wallets including a package of transportation passes, vouchers, and credits for mobility options such as transit, bike share, scooter share, and car share, etc.</li> </ul> </li> </ul>

	<p>Commute-end uses with 50 or more employees must provide the selected subsidies via the MTC’s Bay Area Commuter Benefits Program.</p> <ul style="list-style-type: none"> <li>▪ <b>Double Points:</b> Receive twice as many points as described above by providing the same number of the selected subsidies to low-income families in the local community. For example, a 100-unit residential project which provides a set of 100 bike share subsidies of up to \$15 per month per unit and 100 car share subsidies of up to \$15 per month per unit (2 Points) would receive additional 2 Points (a total of 4 Points) if the project provides another set of the same bike share and car share subsidies to 100 low-income families in the surrounding neighborhood.</li> </ul>
<b>Proof of Implementation</b>	<p>HOAs/Property owners must submit copies of invoices for all memberships, subsidy notices sent to beneficiaries, and any informational/promotional materials that describe available subsidies that have been provided to Project dwelling units/employees as attachments to their annual TDM Plan Compliance Forms.</p>

TP12	Provide a Neighborhood School
<b>Description</b>	<p>Develop a neighborhood school as part of the Project to serve families living in the Project and local community. Neighborhood schools primarily serve the neighborhoods immediately surrounding the school and allow students to walk or bike to school, reducing the use of automobiles for drop-off and pick-up trips and thereby reducing VMT.</p>
<b>CEQA <sup>(1)</sup></b>	<p><b>Home-End Uses Only:</b>  <math>\% \text{ VMT Reduction} = 77.7\% \times 2.3\% \times \% \text{ of households with school-aged children living in the Project}</math></p>
<b>TDM Program (2 Points)</b>	<p><b>Home-End Uses Only:</b></p> <ul style="list-style-type: none"> <li>▪ <b>2 Points:</b> Provide a neighborhood school on-site for families living in the Project or in the local community.</li> </ul>
<b>Proof of Implementation</b>	<p>The developer must identify the location of the neighborhood school and submit plans for City staff to ensure that the school will meet any applicable State and City requirements. City staff will confirm the school meets the specifications of approved plans during a pre-occupancy inspection of the Project. HOAs/Property owners must submit a letter from the school describing its operations (days of week and hours of operation, level of enrollment, etc.) and contact information of all applicable parties as attachments to their annual TDM Plan Compliance Form. As necessary, City staff will conduct site visits to confirm that the amenities meet specified standards.</p>

Notes:

(1) Wilson, E.J., Wilson, R., & Krizek, K.J. (2007). The implications of school choice on travel behavior and environmental emissions. *Transportation Research Part D: Transport and Environment*, 12(7), 506-518.

TP13	Provide Ride-share Programs
<b>Description</b>	Provide a ride-matching service or platform to match Project residents/employees interested in carpooling or vanpooling who have similar commute patterns.
<b>CEQA <sup>(1)</sup></b>	<b><u>Commute-End Uses Only:</u></b> % VMT Reduction = 54.5% reduction in commute VMT × % of total employees that participate (typically between 2% and 10%)
<b>TDM Program (1 Point)</b>	<b><u>Home-End Uses, Commute-End Uses, and Other Uses Only:</u></b> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> Enroll all Project residents/employees in the MTC’s Bay Area Carpool and Vanpool Programs (Merge) or other online ride-matching services that connect them through a secure network to post and search for shared rides.</li> </ul>
<b>Proof of Implementation</b>	HOAs/Property owners must submit copies of active enrollment with a ride-matching platform and provide any informational materials distributed that describe the program as attachments to their annual TDM Plan Compliance Forms.

Notes:

(1) United States Environmental Protection Agency. (2005). *Implementing Commuter Benefits as One of the Nation's Best Workplaces for Commuters*.

TP14	Subsidize Public Transit Service Upgrade or Expansion
<b>Description</b>	Subsidize VTA transit service upgrades or expansion through fees and contributions to the VTA. Examples of VTA transit service upgrades or expansion include, but are not limited to, increasing service frequency, expanding service hours, and upgrading transit fleet, etc.
<b>CEQA <sup>(1), (2)</sup></b>	<b><u>Home-End Uses and Commute-End Uses Only:</u></b> % VMT Reduction = $0.5 \times 0.67 \times \% \text{ change in frequency} \times \text{Route Contribution Proxy} \times \text{existing transit mode share}$ Route Contribution Proxy = 50% (when less than 50% of the routes are improved); 85% (when more than or equal to 50% of the routes are improved)
<b>TDM Program (1 – 4 Points)</b>	<b><u>Home-End Uses, Commute-End Uses, and Visit-End Uses Only:</u></b> Fund VTA transit service upgrades or expansion for routes with stops within ½ miles of the Project, for a total cost equivalent to: <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> \$15/month for each Project dwelling unit or employee.</li> <li>▪ <b>2 Points:</b> \$30/month for each Project dwelling unit or employee.</li> <li>▪ <b>3 Points:</b> \$45/month for each Project dwelling unit or employee.</li> <li>▪ <b>4 Points:</b> \$60/month for each Project dwelling unit or employee.</li> </ul> <p>The Project must work with the City and VTA staff to select at least one (1) planned transit service upgrades or expansion in the VTA’s <i>Transit Service Plan, Advanced Transit Bus Vehicle to Grid Integration Project, and Measure B Transit Operations Program</i>.</p>

**Proof of Implementation**

HOAs/Property owners must submit copies of receipt from the VTA confirming their financial contribution towards the selected VTA transit service upgrades as attachments to their annual TDM Plan Compliance Forms.

Notes:

- (1) Handy, S., Lovejoy, K., Boarnet, M.G., Spears, S. (2013). *Impacts of Transit Service Strategies on Passenger Vehicle Use and Greenhouse Gas Emissions*. California Environmental Protection Agency Air Resources Board.
- (2) California Air Pollution Control Officers Association (CAPCOA). (2010). *Quantifying Greenhouse Gas Mitigation Measures: A Resource for Local Government to Assess Emission Reductions from Greenhouse Gas Mitigation Measures*.

TP15	Provide Targeted Behavior Interventions
<b>Description</b>	Provide targeted behavior intervention to help individuals identify all their travel options and offer custom recommendations based on their work schedule, commitments before and after work, and other factors that are important to them. The program includes one-on-one counseling, personalized commute planning, experiential learning events, travel diaries, and other interventions to promote users' awareness, motivation, and actions.
<b>CEQA</b>	Not applicable
<b>TDM Program (1 – 2 Points)</b>	<p><b><u>Home-End Uses, Commute-End Uses, and Visit-End Uses Only:</u></b></p> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> Provide one (1) of the following targeted behavior interventions to all Project residents/employees annually.</li> <li>▪ <b>2 Points:</b> Provide at least (2) of the following targeted behavior interventions to all Project residents/employees annually. <ul style="list-style-type: none"> <li>- One-on-one counseling</li> <li>- Personalized commute planning</li> <li>- Experimental learning events: Allow for hands-on experience with different travel options, routes, services, and benefits.</li> <li>- Travel diaries</li> <li>- Other targeted behavior interventions</li> </ul> </li> </ul>
<b>Proof of Implementation</b>	HOAs/Property owners must submit copies of invoices for all service-cost expenses and any informational materials distributed to their residents/employees that describe the program as attachments to their annual TDM Plan Compliance Forms.

TP16	Unbundle Parking Costs from Property Costs
<b>Description</b>	Lease or sell accessory automobile parking spaces separately from the dwelling units for the life of the Project. Project tenants/residents have the option of renting or buying a parking space at an additional cost, and would, thus, experience a cost savings if they opt not to rent or purchase parking.
<b>CEQA <sup>(1), (2), (3)</sup></b>	<b><u>Home-End Uses Only:</u></b>

	<p>% Reduction in VMT = Change in vehicle cost × elasticity × A Where: Change in vehicle cost = monthly parking cost / (\$4,000 / 12), with \$4,000 representing the annual vehicle cost. The annual vehicle cost has been updated to \$10,728 in 2022 dollars. A = Adjustment from Vehicle Ownership to VMT = 0.85 (taken from CAPCOA)</p>
<b>TDM Program (1 – 2 Points)</b>	<p><b>Home-End Uses Only:</b></p> <p>Detach the cost of accessory automobile parking spaces from all residential lease or purchase fees for the lifetime of the Project. Do not market dwelling units with the amenity of “free parking” or similar terms. Lease or sell the accessory parking spaces separately so that Project tenants/residents have the option of renting or buying a space at an additional cost.</p> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> For Projects located <u>outside of</u> Downtown and High-Quality Transit Area (defined in PK01).</li> <li>▪ <b>2 Points:</b> For Projects located <u>within</u> Downtown or High-Quality Transit Area (defined in PK01).</li> </ul>
<b>Proof of Implementation</b>	<p>HOAs/Property owners must submit copies of all informational materials about unbundled parking and current lease or sales prices of the parking spaces as attachments to their annual TDM Plan Compliance Forms.</p>

Notes:

- (1) Litman, T. (2009). *Parking Requirement Impacts on Housing Affordability* (p.8, Table 3). Victoria Transport Policy Institute.
- (2) American Automobile Association (n.d.). *Your Driving Costs*. Retrieved 2022, from <https://newsroom.aaa.com/auto/your-driving-costs/>
- (3) California Air Pollution Control Officers Association (CAPCOA). (2010). *Quantifying Greenhouse Gas Mitigation Measures: A Resource for Local Government to Assess Emission Reductions from Greenhous Gas Mitigation Measures*.

<b>TP17</b>	<b>Provide Vanpool Subsidies</b>
<b>Description</b>	Provide vanpool membership costs and discounts for Project residents/employees.
<b>CEQA <sup>(1), (2), (3)</sup></b>	<p><b>Commute-End Uses Only:</b></p> <p>% VMT Reduction = elasticity × % reduction in vanpool fare × 82.1% × % of total employees that participate</p>
<b>TDM Program (1 – 4 Points)</b>	<p><b>Home-End Uses, Commute-End Uses, and Visit-End Uses Only:</b></p> <p>For each Project dwelling unit/employee subscribed to the MTC’s Bay Area Vanpool Program (Merge) or other online ride-matching services:</p> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> Subsidize annual/monthly vanpool membership and trip expenses, or \$15/month, whichever is lower.</li> <li>▪ <b>2 Points:</b> Subsidize annual/monthly vanpool membership and trip expenses, or \$30/month, whichever is lower.</li> <li>▪ <b>3 Points:</b> Subsidize annual/monthly vanpool membership and trip expenses, or \$45/month, whichever is lower.</li> </ul>



	<ul style="list-style-type: none"> <li>▪ <b>4 Points:</b> Subsidize annual/monthly vanpool membership and trip expenses, or \$60/month, whichever is lower.</li> </ul> <p>Commute-end uses with 50 or more employees must provide such subsidy via the MTC’s Bay Area Commuter Benefits Program.</p>
<b>Proof of Implementation</b>	HOAs/Property owners must submit copies of invoices for invoices for vanpool memberships, subsidy notices sent to beneficiaries, and any informational materials distributed that describe the program as attachments to their annual TDM Plan Compliance Forms.

Notes:

- (1) Victoria Transport Policy Institute. (2018). *Online TDM Encyclopedia*. <https://www.vtpi.org/tdm/tdm34.htm>
- (2) Sisinnio, C., Winters, P.L., Wambalaba, F.W. (2005). Fare Pricing Elasticity, Subsidies, and Demand for Vanpool Services. *Transportation Research Record*, 1924(1), 215-223. Journal of Transportation Research Board.
- (3) Waytogo. (2015) *2015 Annual Report*. <https://waytogo.org/sites/default/files/attachments/waytogo-annual-report-2015.pdf>

TP18	Provide Voluntary Travel Behavior Change Programs
<b>Description</b>	Provide a voluntary travel behavior change program that targets individual attitudes and behaviors towards travel and helps individuals analyze and alter their travel choice and behavior. The program features mass communication campaigns such as employee and community travel surveys, green trip competitions, employer recognition, and web-based tools that promote cost savings, pro-environmental, and pro-healthy impacts of travel choices.
<b>CEQA <sup>(1)</sup></b>	<p><b><u>Commute-End Uses Only:</u></b></p> <p>% VMT Reduction = 4% × percent of participants</p>
<b>TDM Program (1 – 2 Points)</b>	<p><b><u>Home-End Uses, Commute-End Uses, and Visit-End Uses Only:</u></b></p> <ul style="list-style-type: none"> <li>▪ <b>1 Point:</b> Provide one (1) of the following travel behavior change programs to all Project residents/employees annually.</li> <li>▪ <b>2 Points:</b> Provide two (2) of the following travel behavior change programs to all Project residents/employees annually. <ul style="list-style-type: none"> <li>- Employee and community travel surveys: Investigate people’s travel modes, trip purpose, trip frequency, and perceptions toward alternative travel options, routes, services, and benefits offered, etc.</li> <li>- “Green trip” competitions</li> <li>- Employer recognition: Create public relations exposure via local media and annual awards programs spotlighting employees’ participation in alternative travel choices.</li> <li>- Web-based or mobile Transportation Management Platform (TMP) applications: Develop, update, or subscribe to a third-party TMP application, such as ZAP Twin Cities, Luum, or RideAmigos, which offer commute planning functionality, parking management, transit</li> </ul> </li> </ul>



	<p>information, routes, and information about environmental, health, and financial benefits.</p> <ul style="list-style-type: none"> <li>- Other mass communication campaigns.</li> </ul>
<b>Proof of Implementation</b>	HOAs/Property owners must submit copies of invoices for all service-cost expenses and any informational materials distributed to their residents/employees that describe the program as attachments to their annual TDM Plan Compliance Forms.

Notes:

Spears, S., & Boarnet, M.G., & Handy, S. (2013). *Policy Brief on the Impacts of Voluntary Travel Behavior Change Programs Based on a Review of the Empirical Literature*. California Air Resources Board.

<b>Provide a User-Defined TDM Measure</b>	
<b>Description</b>	Provide a TDM measure that is not included in the City’s preset menu of TDM measures. The project’s TDM Plan must include a clear description of the proposed user-defined measure, provide research data or other evidence to prove the efficacy of the proposed measure, and explain why the measure fits the project better than those in the City’s preset menu of TDM measures. City staff will review the proposed measure, accept or reject with justification, and assign a TDM point value as appropriate.
<b>CEQA</b>	Not applicable
<b>TDM Program</b>	<b><u>Home-End Uses, Commute-End Uses, Visit-End Uses, and Other Uses:</u></b> Determined by City staff upon submission of a TDM Checklist and a TDM Plan.
<b>Proof of Implementation</b>	Determined by City Staff upon submission of a TDM Checklist and a TDM Plan.