

## **1.0 PURPOSE AND NEED**

### **1.1 Project Background**

In 2006, the Cities of West Sacramento and Sacramento, in cooperation with Sacramento Regional Transit (RT) and Yolo County Transportation District (YCTD), formed a partnership to study the reintroduction of the streetcar to connect the cities of West Sacramento and Sacramento and their shared riverfront. Over the past 30 years, public and private interests examined the feasibility of streetcar service that would travel between West Sacramento and downtown Sacramento. The partnership was aided by funding from Sacramento Area Council of Governments (SACOG) Community Design Program to perform a thorough analysis so that elected officials, public agencies, citizens groups, and other stakeholders could make an informed decision on the most appropriate transportation investment. The feasibility study, which included a discussion of technology, alignment, financing opportunities, and operating plans, was completed in May 2007 and summarized in the Phase I Summary Report, *Downtown/Riverfront Streetcar Study*. The West Sacramento City Council adopted the findings of the Phase I report on May 9, 2007. In addition, the YCTD and RT boards adopted the findings of the Phase I report on May 14, 2007, and the City of Sacramento did the same on May 22, 2007. The selection of the preferred alternative is described in more detail in Chapter 2.

### **1.2 Location and Study Area**

The location of the proposed streetcar alignment is in downtown Sacramento and the Washington/Triangle/Civic Center areas of West Sacramento, which are separated by the Sacramento River and linked by Tower Bridge. The project-level Environmental Impact Report (EIR) analyzes environmental impacts in a study area that encompasses a one-quarter-mile buffer around the proposed alignment, as shown in Figure 1-1. The proposed alignment's western terminus is at the City of West Sacramento's Civic Center, which is located in the City's central business district. It would travel east on West Capitol Avenue and Tower Bridge Gateway, through a redeveloping area that consists of commercial and a few legacy industrial uses, and Raley Field, which is used for baseball games and special events. The alignment would cross Tower Bridge and travel through downtown Sacramento, which is a relatively dense area consisting of commercial, government, and institutional uses. The alignment's eastern terminus is at 15th and K Streets.

### **1.3 Purpose of Proposed Action**

The purpose of the proposed project is to improve transit service and local circulation by connecting West Sacramento and downtown Sacramento with an alternative (non-auto) mode and supporting existing and future development in the City of West Sacramento and downtown Sacramento. The purpose is consistent with local plans and policies, as further discussed in Chapter 3.

### **1.4 Need for Transportation Improvements in the Corridor**

It is anticipated that the development plans and growth projections for West Sacramento's redevelopment areas and downtown Sacramento will generate greater travel demand for local mobility and roadway capacity than is currently available, especially given the projected traffic congestion scenarios at Tower Bridge (SACOG, 2008). West Sacramento is undergoing rapid urban development that would introduce a high concentration of new residential, commercial, civic, and cultural land uses. This intense development is projected to increase the number of residents and

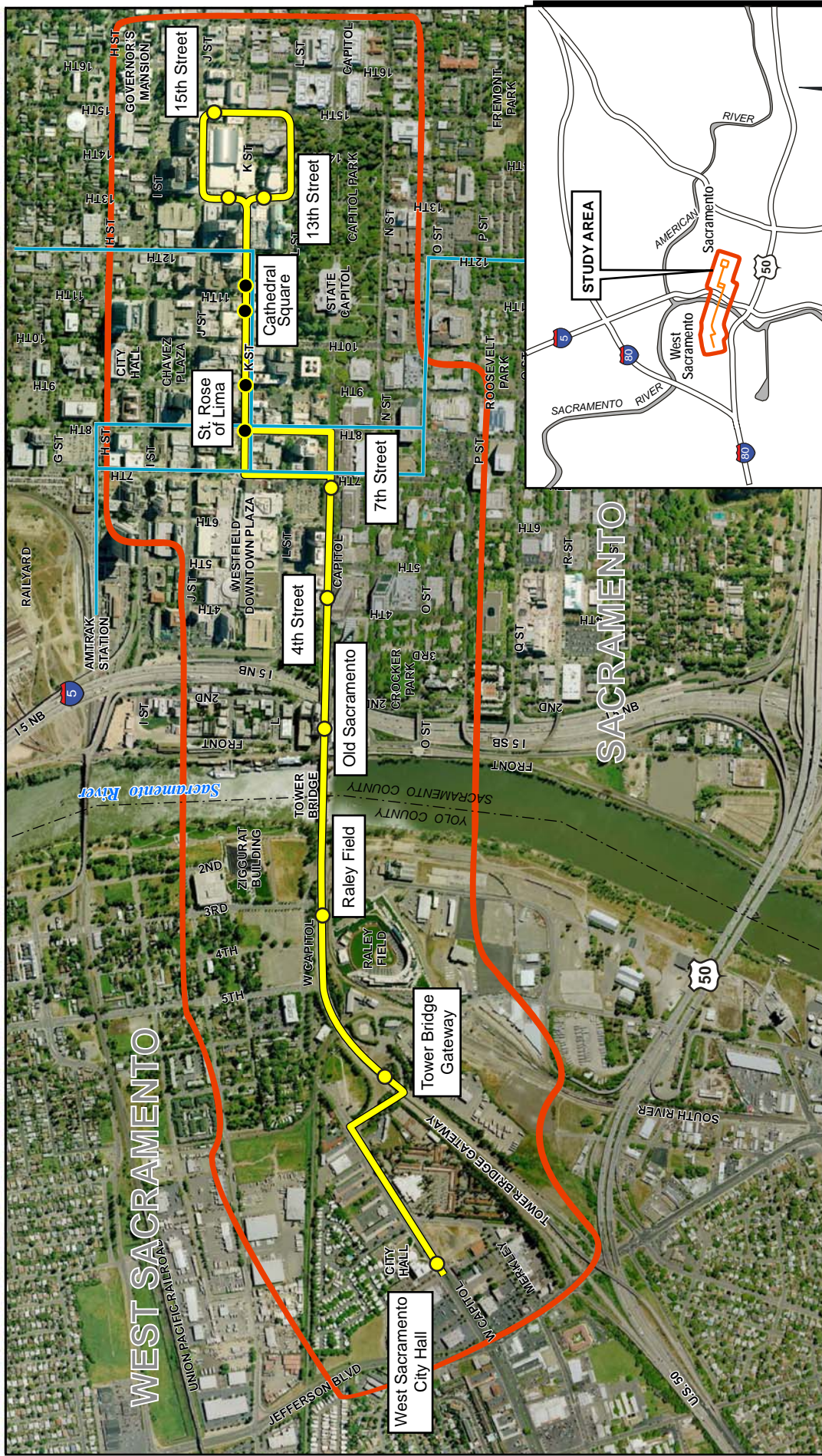
workers who will live and/or work in this area (see explanation below). The City of Sacramento has an established downtown that caters to high-density residential and office development, currently planned and under construction. The proposed streetcar service would provide additional capacity between the two cities by supplementing existing transit operations, which primarily consist of intercity service provided by YCTD (Yolobus).

#### 1.4.1 Population and Employment Growth

Data on current and projected population and employment to indicate growth in the study area were obtained from SACOG. The data is available by Traffic Analysis Zone (TAZ), which are subdistricts used to disaggregate regional data. While the TAZ analysis area for this EIR is slightly larger than the study area (Figure 1-2), it illustrates the substantial growth in population and employment resulting from planned development in West Sacramento and downtown Sacramento. The projects (approved or under construction) that are fueling this growth and are located within the study area include (City of West Sacramento, 2008a):

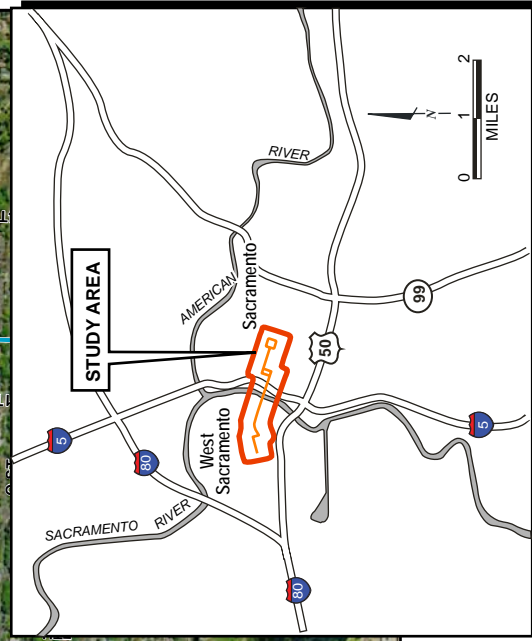
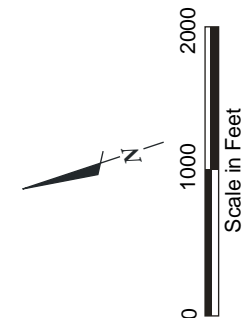
- CalPERS on Capitol Mall in Sacramento – 65,000 square feet of retail, 230 hotel rooms, 804 housing units;
- U.S. Bank Tower/621 Capitol Mall in Sacramento – 344,289 square feet of office, 23,000 square feet of retail;
- 701 L Street in Sacramento – 10,500 square feet of retail, 240,000 square feet of office, 80 dwelling units;
- Hotel Joie De Vivre in Sacramento – 11,000 square feet of retail, 200 hotel rooms;
- Zeiden/Corritore in Sacramento – 56,000 square feet of retail;
- Hale Building Lofts in Sacramento – 33 dwelling units;
- Capitol Grand Tower in Sacramento – 5,000 square feet of retail, 200 hotel rooms, 85 dwelling units;
- Performing Arts Center in Sacramento – 46,000 square feet;
- 16th and H Streets/Cooper Union Bldg in Sacramento – residential (13 dwelling units) and mixed-use development;
- 1000 K Street Redevelopment in Sacramento – 38,000 square feet of retail, 12,000 square feet of office;
- One Riverfront Plaza in West Sacramento – 7.24-acre mixed-use development;
- California State Teachers' Retirement System Headquarters (3rd and E Streets) in West Sacramento – 600,000 square feet of offices, 20,000 square feet of commercial;
- River 1 in West Sacramento – commercial office, retail, and restaurant uses;
- River 2 in West Sacramento – 20-story tower with 150 condominium units;
- Ironworks at the Triangle – 180 single-family units and 16 apartments; and
- Los Rios Community College.

SACOG predicts that the number of residents, households, and workers in this area will increase measurably by 2035, especially in West Sacramento (Table 1-1). Triple-digit growth is projected in West Sacramento, with residents increasing 190 percent, households 167 percent, and workers 185 percent by 2035. Downtown Sacramento is also expected to have considerable growth, with residents increasing 48 percent, households 42 percent, and workers 12 percent by 2035. Future land uses and development plans are further discussed in Chapter 3. Population and employment increases are often accompanied by increases in person trips (Glover, 2007). These increases may introduce or exacerbate existing traffic congestion in the study area, as discussed below.



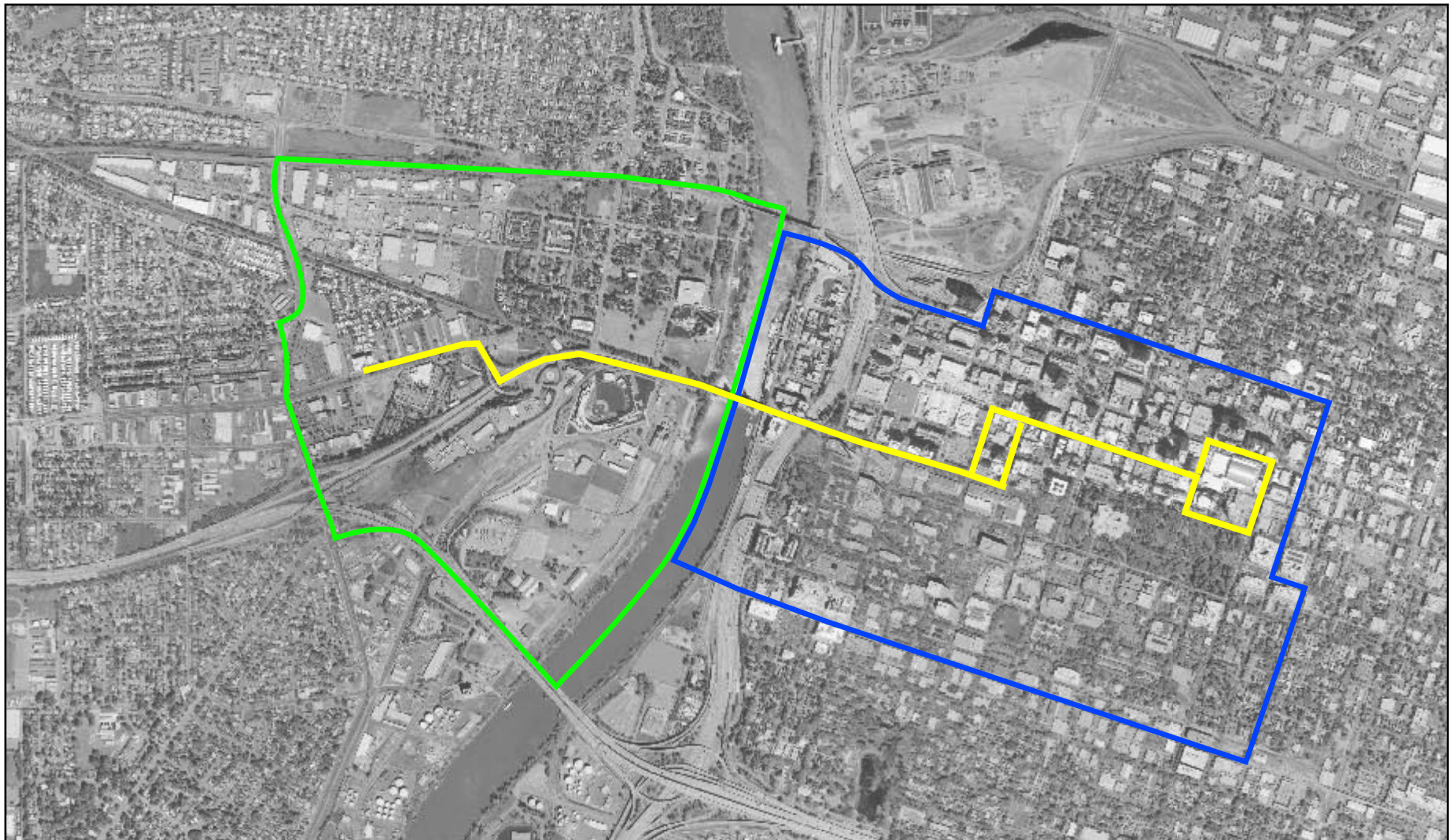
**LEGEND**

- Study Area Boundary
- Proposed Alignment
- Existing LRT Route
- New Streetcar Platform
- Existing RT Platform to be used by Streetcar



**PROJECT STUDY AREA**  
 September 2008     Downtown/Riverfront Streetcar  
 25696500     West Sacramento, California  
**URS**     **FIGURE 1-1**





Source: SACOG Traffic Analysis Zones, 2007  
 Not to Scale

**LEGEND**

- TAZs in City of Sacramento
- TAZs in City of West Sacramento
- Proposed streetcar alignment

**TRAFFIC ANALYSIS ZONES**

September 2008  
 25696500

Downtown/Riverfront Streetcar  
 West Sacramento, California



**FIGURE 1-2**



Table 1-1. Existing and Projected Population and Employment Numbers for Study Area

Population	2005	2035	% increase
<b>Residents</b>			
Sacramento	4,500	6,650	48
West Sacramento	2,150	12,650	488
Total Residents	6,650	19,300	190
<b>Households</b>			
Sacramento	3,300	4,700	42
West Sacramento	900	6,500	622
Total Households	4,200	11,200	167
<b>Workers</b>			
Sacramento	85,900	96,200	12
West Sacramento	5,500	15,700	185
Total Workers	91,400	111,900	22

Source: Glover, 2007. Total population is derived from the 2007 SACSIM travel model.

### 1.4.2 Roadway Congestion

The proposed streetcar alignment travels along a corridor that consists of the established downtown of Sacramento and the developing city center of West Sacramento, both of which are directly connected by Tower Bridge and indirectly connected by I Street Bridge to the north and the US-50 “Pioneer” Bridge to the south. Traffic congestion on all three bridges is currently high and projected to increase, in some cases markedly, as shown in Tables 1-2 and 1-3, which present volume to capacity (v/c) ratios followed by Level of Service (LOS) equivalents, which indicate, in parentheses, the degree of congestion along roadway segments and local intersections. Greater v/c ratios and LOS equivalents of E or F indicate greater congestion. LOS is more explicitly defined in Section 3.5.

**Tower Bridge.** The traffic data for Tower Bridge during peak commute periods reveal a highly congested picture. In the eastbound direction, the v/c ratio in 2005 was 92 percent (LOS E) in the morning and 99 percent (LOS E) in the afternoon. SACOG projects that congestion will increase to 105 percent (LOS F) during peak morning hours and 120 percent (LOS F) during peak afternoon hours by 2035. Similarly, in the westbound direction, the current v/c of 57 percent (LOS A) in the morning and 94 percent (LOS E) in the afternoon peak hours is projected to increase to 87 percent (LOS D) and 110 percent (LOS F), respectively, by 2035.

**I Street Bridge.** The I Street Bridge is congested during peak periods and projected to worsen by 2035. Its v/c ratio in 2005 was 68 percent (LOS B) in the morning and 98 percent (LOS E) in the afternoon in the eastbound direction. Projections for 2035 show that this will increase to 173 percent (LOS F) in the morning commute hours and 219 percent (LOS F) in the afternoon commute period. Similarly, in the westbound direction the current v/c ratio of 71 percent (LOS C) in the morning and 90 percent (LOS E) in the afternoon commute hours is expected to increase to 152 percent (LOS F) in the morning commute hours and 212 percent (LOS F) in the afternoon commute hours by 2035.

Table 1-2. Existing and Projected Traffic Patterns - Daily

Roadway Segment	Daily Capacity	2005 Daily Volume	2005 Volume to Capacity Ratio (LOS equivalent)	2035 Projections	2035 Volume to Capacity Ratio (LOS equivalent)	Percent Increase in Volume
<b>Eastbound</b>						
Tower Bridge	40,800	18,837	46% (A)	25,200	62% (B)	34
I Street Bridge	19,200	7,952	41% (A)	19,988	104% (F)	151
US-50 Bridge	192,000	85,445	45% (A)	101,793	53% (A)	19
<b>Westbound</b>						
Tower Bridge	40,800	15,355	38% (A)	20,965	51% (A)	37
I Street Bridge	19,200	8,278	43% (A)	19,325	101% (F)	134
US-50 Bridge	192,000	90,433	47% (A)	109,638	57% (A)	21

Source: Sacramento Area of Governments. Projections for 2035 are based on SACOG Board's Adopted Growth Allocation (May 2007) and Draft of SACOG Draft Metropolitan Transportation Plan (June 2007).

Table 1-3. Existing and Projected Traffic Patterns - Daily, Peak Periods Only

Roadway Segment	2005 Peak Volume	2005 Volume to Capacity Ratio (LOS equivalent)	2035 Projections	2035 Volume to Capacity Ratio (LOS equivalent)	Percent Increase in Volume
<b>Eastbound – A.M. Peak</b>					
Tower Bridge	4,701	92% (E)	5,372	105% (F)	14
I Street Bridge	1,628	68% (B)	4,153	173% (F)	155
US-50 Bridge	17,083	71% (C)	18,507	77% (C)	8
<b>Westbound – A.M. Peak</b>					
Tower Bridge	2,886	57% (A)	4,449	87% (D)	54
I Street Bridge	1,694	71% (C)	3,654	152% (F)	116
US-50 Bridge	19,738	82% (D)	24,007	100% (F)	22
<b>Eastbound – P.M. Peak</b>					
Tower Bridge	5,063	99% (E)	6,098	120% (F)	20
I Street Bridge	2,345	98% (E)	5,261	219% (F)	124
US-50 Bridge	20,211	84% (D)	24,259	101% (F)	20
<b>Westbound – P.M. Peak</b>					
Tower Bridge	4,789	94% (E)	5,585	110% (F)	17
I Street Bridge	2,166	90% (E)	5,086	212% (F)	135
US-50 Bridge	21,381	89% (D)	24,025	100% (F)	12

Source: Sacramento Area of Governments. Projections for 2035 are based on SACOG Board's Adopted Growth Allocation (May 2007) and Draft of SACOG Draft Metropolitan Transportation Plan (June 2007).

**US-50 Bridge.** Traffic volumes are also projected to increase on the US-50 Bridge by 2035. The v/c ratio on the bridge in 2005 was 71 percent (LOS C) in the morning and 84 percent (LOS D) in the afternoon in the eastbound direction. Projections for 2035 indicate that the v/c ratio will increase to 77 percent (LOS C) in the morning peak and 101 percent (LOS F) in the afternoon peak. Similarly, in the westbound direction, the v/c ratio of 82 percent (LOS D) in the morning peak and 89 percent (LOS D) in the afternoon peak are both projected to increase to 100 percent (LOS F) by 2035.

## 1.5 Air Quality

As indicated below, the Cities of Sacramento and West Sacramento are located in air districts that do not comply with federal and state air quality standards for ozone (O<sub>3</sub>) and small-diameter particulate matter. Emissions from motor vehicle exhaust, industrial facilities and electric utilities, gasoline vapors, and chemical solvents are major sources of oxides of nitrogen (NO<sub>x</sub>) and volatile organic compounds (VOCs), O<sub>3</sub> precursors, as well as particulate matter less than 10 micrometers (µm) in diameter (PM<sub>10</sub>), and particulate matter less than 2.5 µm in diameter (PM<sub>2.5</sub>). The smaller particles are lighter and can stay in the air for days or weeks (U.S. EPA, 2008). Given the projected increase in traffic congestion discussed earlier, there is the potential that air quality could worsen in Sacramento and West Sacramento.

### 1.5.1 City of Sacramento

The City of Sacramento falls within the jurisdiction of the Sacramento Metropolitan Air Quality Management District (SMAQMD), which encompasses all of Sacramento County. The attainment status for air emissions in the SMAQMD is indicated in Table 1-4.

*Table 1-4. Air Quality Standards Attainment Status Chart for Sacramento Metropolitan Air Quality Management District*

Parameter	California Standard	Federal Standard
Ozone	Non-Attainment	Non-Attainment
PM <sub>10</sub>	Non-Attainment	Non-Attainment <sup>1</sup>
PM <sub>2.5</sub>	Non-Attainment	Attainment/Unclassified
Carbon Monoxide	Attainment	Attainment
Nitrogen Dioxide	Attainment	Attainment
Sulfur Dioxide	Attainment	Attainment

Source: Sacramento Metropolitan Air Quality Management, <http://www.airquality.org/aqdata/attainmentstat.shtml>, accessed October 12, 2007.

Note:

<sup>1</sup> Air Quality meets federal PM<sub>10</sub> Standards. The SMAQMD must request redesignation to attainment and submit a maintenance plan to be formally designated to attainment.

### 1.5.2 City of West Sacramento

The City of West Sacramento is part of the Yolo-Solano Air Quality Management District (YSAQMD), which includes all of Yolo County and the eastern portion of Solano County. The attainment status for air emissions in the Yolo Solano district is indicated in Table 1-5.

Table 1-5. Air Quality Standards Attainment Status Chart for Yolo-Solano Air Quality Management District

Parameter	California Standard	Federal Standard
Ozone	Non-Attainment	Non-Attainment
PM <sub>10</sub>	Non-Attainment	Attainment
PM <sub>2.5</sub> <sup>1</sup>	Unclassified	Unclassified
Carbon Monoxide	Attainment	Attainment
Nitrogen Dioxide	Attainment	Attainment
Sulfur Dioxide	Attainment	Attainment

Source: Kathy Coulter, Yolo-Solano Air Quality Management District (YSAQMD), via phone correspondence with Tam Tran on October 16, 2007 and November 5, 2007.

Note:

<sup>1</sup> YSAQMD did not place filters for PM<sub>2.5</sub> until 2007.

## 1.6 Transit Issues

The study area is served by two transit operators, RT and YCTD. While both agencies anticipate the substantial growth in West Sacramento and Sacramento, their services for the study area are primarily regional, with RT providing local and commuter service within the City of Sacramento and YCTD’s bus lines providing intercity service during commute hours between Yolo County and downtown Sacramento. There is currently inadequate service to meet localized travel demand between the two cities over Tower Bridge.

## 1.7 Project Goals and Objectives

For the Phase I Downtown/Riverfront Streetcar Study, a set of goals was prepared to support the proposed project’s Purpose and Need. The goals reflect regional and local transportation and development plans and adhere to the guiding principles established by the cooperating agencies. The four project goals and associated objectives are:

- **Goal 1:** Improve mobility and connectivity between West Sacramento and downtown Sacramento and the shared riverfront.
  - Enhance connectivity between existing and new downtown housing in both cities and the major employment, commercial, recreational, and cultural activities.
  - Offer a convenient and attractive means of transportation for residents, workers, customers, and visitors.
  - Improve access and opportunities for all existing and potential transit rider groups.
  - Enhance access to the riverfront.
- **Goal 2:** Provide a sustainable transit investment to support existing and proposed development in the core areas of West Sacramento and Sacramento.
  - Maximize project placemaking attributes.
  - Link major destinations in the study area.
  - Support adopted plans.
  - Minimize impacts on the environment.
- **Goal 3:** Maximize the efficiency and effectiveness of the local and regional transit system.
  - Attract new riders to the local and regional transit system.

- Enhance connectivity among regional public transportation modes.
  - Support pedestrian circulation.
  - Accommodate future transit expansion opportunities.
- **Goal 4:** Provide a transit investment that is affordable in terms of capital and operating expenses, and can be implemented on a fast track.
    - Minimize capital costs.
    - Maximize use of existing transit infrastructure.
    - Expedite project implementation.
    - Maximize public-private partnership opportunities.

The Purpose and Need and project goals provide the basis for selecting alternatives to be carried forward for environmental analysis, as described in Chapter 2.

## 1.8 Planning Context

The need for transportation improvements to better link downtown Sacramento and West Sacramento is supported by the goals described in the following local plans:

- City of West Sacramento General Plan;
- City of West Sacramento Strategic Plan;
- Washington Specific Plan and Triangle Specific Plan;
- City of Sacramento General Plan Update; and
- The 2003 Sacramento Riverfront Master Plan.

More detailed information about the plans relative to the proposed project is presented in the Land Use sections of Chapters 3 and 4.

## 1.9 EIR Process and Agency Involvement

The environmental process began with the publication of a Notice of Preparation of an EIR for the proposed project. The Notice of Preparation announced two public scoping meetings on September 12 and 13, 2007, and a 36-day period to receive public comments on environmental issues to be addressed in the EIR (Appendix F). Ongoing coordination with participating and interested agencies is occurring to keep them informed about the project. A summary of this coordination effort is included in Appendix G. The environmental analysis for the proposed project is contained in this Draft EIR for the Downtown/Riverfront Streetcar Project, which is available for public review and comment. A public hearing will be conducted on October 2, 2008, to receive comments on the Draft. Written comments can also be submitted to the City of West Sacramento Public Works and Community Development Department and on the streetcar project website ([www.riverfrontstreetcar.com](http://www.riverfrontstreetcar.com)). Comments will be reviewed by the City of West Sacramento and its partner agencies to determine if the proposed project will be carried forward as proposed. Comments on the Draft are then addressed and incorporated into the Final EIR, which will be certified by the City of West Sacramento. Other agencies, including the city of Sacramento, may certify the Final EIR as responsible agencies. The proposed project will move forward into preliminary engineering and final design before proceeding into construction. Construction is anticipated to begin in 2010.