



# ACTIVE TRANSPORTATION PROGRAM - CYCLE 2

## Application Form for Part A

*Parts B & C must be completed using a separate document*

**PROJECT unique APPLICATION NO.:**

Auto populated

**Total ATP Funds Requested:**

(in 1000s)

Auto populated

**Important:** Applicants must follow the CTC Guidelines and Chapter 22 of the Local Assistance Program Guidelines, and include attachments and signatures as required in those documents. Ineligible project elements may result in a lower score/ranking or a lower level of ATP funding. Incomplete applications may be disqualified.

Applicants are expected to use the corresponding “step-by-step” Application Instructions and Guidance to complete the application (3 Parts):

- Part A: General Project Information**
- Part B: Narrative Questions**
- Part C: Application Attachments**

### Application Part A: General Project Information

**Implementing Agency:** This agency must enter into a Master Agreement with Caltrans and will be financially and contractually responsible for the delivery of the project within all pertinent Federal and State funding requirements, including being responsible and accountable for the use and expenditure of program funds. This agency is responsible for the accuracy of the technical information provided in the application and is required to sign the application.

**IMPLEMENTING AGENCY'S NAME:**

**IMPLEMENTING AGENCY'S ADDRESS**

**CITY**

**ZIP CODE**

200 Lincoln Avenue	Salinas	CA	93901
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**IMPLEMENTING AGENCY'S CONTACT PERSON:**

**CONTACT PERSON'S TITLE:**

**CONTACT PERSON'S PHONE NUMBER:**

**CONTACT PERSON'S EMAIL ADDRESS :**



**Project Partnering Agency:** Entities that are unable to apply for Active Transportation Program funds or that are unable to enter into a Master Agreement with the State must partner with an eligible applicant that can implement the project. **In addition, entities that are unfamiliar with the requirements to administer a Federal-Aid Highway Program project may partner with an eligible applicant that can implement the project.**

If another entity (Partnering Agency) agrees to assume responsibility for the ongoing operations and maintenance of the facility, documentation of the agreement (e.g., letter of intent) must be submitted with the project application, and a copy of the Memorandum of Understanding or Interagency Agreement between the parties must be submitted with the first request for allocation. For these projects, the Project Partnering Agency's information shall be provided below.  
*(The Grant Writer's or Preparer's information should not be provided)*

**PROJECT PARTNERING AGENCY'S NAME:**

N/A

**PROJECT PARTNERING AGENCY'S ADDRESS**

**CITY**

**ZIP CODE**

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**PROJECT PARTNERING AGENCY'S CONTACT PERSON:**

**CONTACT PERSON'S TITLE:**

**CONTACT PERSON'S PHONE NUMBER:**

**CONTACT PERSON'S EMAIL ADDRESS :**

**MASTER AGREEMENTS (MAs):**

Does the Implementing Agency currently have a MA with Caltrans?

Yes  No

Implementing Agency's Federal Caltrans MS number

055045R

Implementing Agency's State Caltrans MS number

00256S

\* Implementing Agencies that do not currently have a MA with Caltrans, must be able to meet the requirements and enter into an MA with Caltrans prior to funds allocation. The MA approval process can take 6 to 12 months to complete and there is no guarantee the agency will meet the requirements necessary for the State to enter into a MA with the agency. Delays could also result in a failure to meeting the CTC Allocation timeline requirements and the loss of ATP funding.

**PROJECT NAME:** (To be used in the CTC project list)

City of Salinas Alvin Dr and Linwood Dr Safe Routes to School Improvements

**Application Number:**  out of  **Applications**

**PROJECT DESCRIPTION:** (Max of 250 Characters)

The project improves & adds bicycle and pedestrian facilities along Alvin Drive, Linwood Drive, Chaparral Drive, and Maryal Drive with the implementation of road diets, buffered bike lanes and sharrows, and pedestrian crossing and ramp enhancements.

**PROJECT LOCATION:** (Max of 250 Characters)

The project is located within Salinas city limits along Alvin Drive, Linwood Drive, Chaparral Drive, and Maryal Drive, fronting North Salinas High, Natividad Elementary, El Gabilan Elementary, and Madonna del Sasso Schools.



Will any infrastructure-improvements permanently or temporarily encroach on the State right-of-way?  Yes  No

If yes, see the application instructions for more details on the required coordination and documentation.

Project Coordinates: (latitude/longitude in decimal format) Lat. 36.705908 /long. -121.640425

Congressional District(s):

State Senate District(s):    State Assembly District(s):

Caltrans District(s):

County:

MPO:

RTPA:

MPO UZA Population:

**ADDITIONAL PROJECT GENERAL DETAILS: (Must be consistent with Part B of Application)**

**ESTIMATION OF ACTIVE TRANSPORTATION USERS**

Existing Counts:	<b>Pedestrians</b>	<u>530</u>	<b>Bicyclists</b>	<u>56</u>
One Year Projection:	<b>Pedestrians</b>	<u>795</u>	<b>Bicyclists</b>	<u>84</u>
Five Year Projection:	<b>Pedestrians</b>	<u>1,060</u>	<b>Bicyclists</b>	<u>112</u>

**BICYCLE AND/OR PEDESTRIAN INFRASTRUCTURE (Check all that apply)**

**Bicycle:** Class I  Class II  Class III  Other \_\_\_\_\_

**Pedestrian:** Sidewalk  Crossing  Other \_\_\_\_\_

**Multiuse Trails/Paths:** Meets "Class I" Design Standards  Other \_\_\_\_\_

**DISADVANTAGED COMMUNITIES**

Project contributes toward the Disadvantaged Communities funding requirement: the project must clearly demonstrate a direct, meaningful, and assured benefit to a community that meets any of the following criteria:  Yes  No

If yes, which criterion does the project meet in regards to the Disadvantaged Community (mark all that apply):

**Household Income**  Yes  No **CalEnvioScreen**  Yes  No

**Student Meals**  Yes  No **Local Criteria**  Yes  No

Is the majority of the project physically located within the limits of a Disadvantaged Community:  Yes  No

**CORPS**

Does the agency intend to utilize the Corps:  Yes  No



**PROJECT TYPE** (Check only one: I, NI or I/NI)

**Infrastructure (I)**       **OR Non-Infrastructure (NI)**       **OR Combination (N/NI)**

“Plan” applications to show as NI only

**Development of a Plan in a Disadvantaged Community:**       Yes       No

If Yes, check all Plan types that apply:

- Bicycle Plan**
- Pedestrian Plan**
- Safe Routes to School Plan**
- Active Transportation Plan**

**Indicate any of the following plans that your agency currently has:** (Check all that apply)

Bicycle Plan       Pedestrian Plan       Safe Routes to School Plan       Active Transportation Plan

**PROJECT SUB-TYPE** (check all Project Sub-Types that apply):

- Bicycle Transportation**      % of Project 60.0 % (ped + bike must = 100%)
- Pedestrian Transportation**      % of Project 40.0 %
- Safe Routes to School**      *(Also fill out Bicycle and Pedestrian Sub-Type information above)*

**How many schools does the project impact/serve:**      3

If the project involves more than one school: 1) Insert “Multiple Schools” in the School Name, School Address, and distance from school; 2) Fill in the student information based on the total project; and 3) Include an attachment to the application which clearly summarizes the following school information and the school official signature and person to contact for each school.

School name: Multiple Schools

School address: Multiple Schools

District name: Multiple Districts

District address: Multiple Districts

Co.-Dist.-School Code: Multiple Schools

School type (K-8 or 9-12 or Both)       Both      Project improvements maximum distance from school      0.0 mile

Total student enrollment: 3,394

% of students that currently walk or bike to school%      20.0 %

Approx. # of students living along route proposed for improvement: 2,035

Percentage of students eligible for free or reduced meal programs \*\*      80.0 %

\*\*Refer to the California Department of Education website: <http://www.cde.ca.gov/ds/sh/cw/filesafdc.asp>

*A map must be attached to the application which clearly shows the limits of: 1) the student enrollment area, 2) the students considered to be along the walking route being improved, 3) the project improvements.*



**Trails (Multi-use and Recreational):** *(Also fill out Bicycle and Pedestrian Sub-Type information above)*

Trails Projects constructing multi-purpose trails and are generally eligible in the Active Transportation Program. If the applicant believes all or part of their project meets the federal requirements of the Recreational Trails Program they are encouraged to seek a determination from the California Department of Parks and Recreation on the eligibility of their project to complete for this funding. This is optional but recommended because some trails projects may compete well under this funding program.

**For all trails projects:**

Do you feel a portion of your project is eligible for federal Recreational Trail funding?  Yes  No

If yes, estimate the total projects costs that are eligible for the Recreational Trail funding: \_\_\_\_\_

If yes, estimate the % of the total project costs that serve “transportation” uses? \_\_\_\_\_ %

Applicants intending to pursue “Recreational Trails Program funding” **must submit** the required information to the California Department of Parks and Recreation prior to the ATP application submissions deadline. (See the Application Instructions for details)

**PROJECT STATUS and EXPECTED DELIVERY SCHEDULE**

Applicants need to enter **either** the date the milestone was completed (for all milestones already complete prior to submitting the application) **or** the date the applicant anticipates completing the milestone. Applicants should enter "N/A" for all CTC Allocations that will not be requested as part of the project. Per CTC Guidelines, all project applications must be submitted with the expectation of receiving partially federally funded and therefore the schedule below must account for the extra time needed for federal project delivery requirements and approvals. *See the application instructions for more details.*

The agency is responsible for meeting all CTC delivery requirements or their ATP funding will be forfeited. For projects consisting of entirely non-infrastructure elements are not required to complete all standard infrastructure project milestones listed below. Non-infrastructure projects only have to provide dates for the milestones identified with a “ \* ” and can provide “N/A” for the rest.

MILESTONE:	DATE COMPLETED	OR	EXPECTED DATE
<b>CTC - PA&amp;ED Allocation:</b>	_____		7/15/16
* CEQA Environmental Clearance:	_____		1/16/17
* NEPA Environmental Clearance:	_____		1/16/17
<b>CTC - PS&amp;E Allocation:</b>	_____		5/15/17
<b>CTC - Right of Way Allocation:</b>	_____		9/15/17
* Right of Way Clearance & Permits:	_____		1/15/18
Final/Stamped PS&E package:	_____		5/15/18
* <b>CTC - Construction Allocation:</b>			9/17/18
* Construction Complete:			10/26/19
* Submittal of “Final Report”			4/15/20



**PROJECT FUNDING** (in 1000s)

Per CTC Guidelines, Local Matching funds are not required for any ATP projects, but Local Leveraging funds are strongly encouraged. See the Application instructions for more details and requirements relating to ATP funding.

**ATP funds being requested for this application/project by project delivery phase:**

ATP funds for PA&D:	\$50	
ATP funds for PS&E:	\$472	
ATP funds for Right of Way:	\$42	
ATP funds for Construction:	\$2,395	
ATP funds for Non-Infrastructure:		<i>(All NI funding is allocated in a project's Construction Phase)</i>
<b>Total ATP funds being requested for this application/project:</b>		<b>\$2,959</b>

**Local funds leveraging or matching the ATP funds:** \$0

For local funding to be considered Leveraging/Matching it must be for ATP eligible activities and costs. Per CTC Guidelines, Local Matching funds are not required for any ATP projects, but Local Leveraging funds are strongly encouraged. See the Application instructions for more details and requirements relating to ATP funding.

**Additional Local funds that are 'non-participating' for ATP:** \$0

These are local funds required for the overall project, but not for ATP eligible activities and costs. They are not considered leverage/match.

**TOTAL PROJECT FUNDS:** \$2,959

**ATP - FUNDING TYPE REQUESTED:**

Per the CTC Guidelines, All ATP projects must be eligible to receive federal funding. Most ATP projects will receive federal funding, however some projects may be granted State only funding (SOF) for all or part of the project.

**Do you believe your project warrants receiving state-only funding?**  Yes  No

If "Yes", provide a brief explanation. (Max of 250 characters) Applicants requesting SOF must also attach an "Exhibit 22-f"

**ATP PROJECT PROGRAMMING REQUEST (PPR):** In addition to the project funding information provided in Part A of the application, all applicants must complete the ATP Project Programming Request form and include it as Attachment B. More information and guidance on the completion and submittal of this form is located in the Application Instructions Document under Part C - Attachment B.

Schools Within the Study Area

- North Salinas High School
- Natividad Elementary School
- El Gabilan Elementary School
- Madonna Del Sasso School (Private School not included)

<b>School Name: North Salinas High School</b>	
School Address	55 Kip Drive Salinas, CA 93906 Tel: (831) 796-7505
District Name	Salinas Union High School District
District Address	431 West Alisal Street Salinas, CA 93901 Tel: (831) 796-7005
Co.-Dist.-School Code	27661592733178
School Type (K-8 or 9-12 or both)	9-12
Project Improvements maximum distance from school (mi)	0
Total Student Enrollment	1920
% of students living along route proposed for improvement	50%
Approx. number of students living along route proposed for improvement	960
Percentage of students eligible for free or reduced meal programs	63.0%
Person to contact	Principal: Lawrence-Emanuel,B. Tel: (831) 796-7510

\*Salinas Union High School District Letter of support including signature is included in **Attachment J**.

<b>School Name: Natividad Elementary School</b>	
School Address	1465 Modoc Avenue Salinas, CA 93906 Tel: (831) 753-5675
District Name	Salinas City Elementary School District
District Address	840 South Main Street Salinas, CA 93901 Tel: (831) 753-5600
Co.-Dist.-School Code	27661426026595
School Type (K-8 or 9-12 or both)	K-8
Project Improvements maximum distance from school (mi)	0
Total Student Enrollment	702
% of students living along route proposed for improvement	65%
Approx. number of students living along route proposed for improvement	457
Percentage of students eligible for free or reduced meal programs	91.0%
Person to contact	Principal: Patricia Lopez Tel: (831) 753-5600

\* Salinas City Elementary School District Letter of support including signature is included in **Attachment J**.

<b>School Name: El Gabilan Elementary School</b>	
School Address	1256 Linwood Drive Salinas, CA 93906 Tel: (831) 753-5660
District Name	Salinas City Elementary School District
District Address	840 South Main Street Salinas, CA 93901 Tel: (831) 753-5600
Co.-Dist.-School Code	27661426026520
School Type (K-8 or 9-12 or both)	K-8
Project Improvements maximum distance from school (mi)	0
Total Student Enrollment	772
% of students living along route proposed for improvement	80%
Approx. number of students living along route proposed for improvement	618
Percentage of students eligible for free or reduced meal programs	85.8%
Person to contact	Katherine Reddick, Ph.D. Principal, El Gabilan 831-456-5600 kreddick@salinascity.k12.ca.us

\* Salinas City Elementary School District Letter of support including signature is included in **Attachment J**.



# **ACTIVE TRANSPORTATION PROGRAM - CYCLE 2**

## **Part B: Narrative Questions**

(Application Screening/Scoring)

Project unique application No.: 05-Salinas-2

Implementing Agency's Name: City of Salinas

**Important:**

- *Applicants must ensure all data in Part B of the application is fully consistent with Part A and C.*
- *Applicants must follow all instructions and guidance to have a chance at receiving full points for the narrative question and to avoid flaws in the application which could result in disqualification.*

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## **Part B: Narrative Questions**

### **Detailed Instructions for: Screening Criteria**

**The following Screening Criteria are requirements for applications to be considered for ATP funding. Failure to demonstrate a project meets these criteria will result in the disqualification of the application.**

#### **1. Demonstrated fiscal needs of the applicant:**

Funding options for this project are limited to General Funds and Gas Tax. General Funds are very limited, with priority given to emergency and governmental services. Remaining funds compete with all City services, including safety (police, fire, etc.), and General Fund money will not be available for this project. Gas tax funds also compete with all City street rehabilitation, street reconstruction, sidewalk repairs and storm and sanitary sewer improvements. It is unlikely that Gas Tax will be available for this project in the immediate future.

No elements of the proposed project are directly or indirectly related to past or future environmental mitigations resulting from a separate development or capital improvement project.

#### **2. Consistency with Regional Plan.**

The project is consistent with several Regional Plan documents. Selected portions of these documents are attached in **Attachment K**.

The 2014 Monterey County Regional Transportation Plan (MCRTTP) sets goals to meet most daily needs without having to drive by improving the convenience and quality of trips, especially for walk, bike, transit, car/vanpool and freight trips. The MCRTTP defines complete streets and



roundabouts as highlighted as key ways to obtain these goals. Further, the MCRTP has goals to include transportation systems that reduce serious injuries and fatalities, promote active living, and lessen exposure to pollution. It is encouraged and promoted in the MCRTP to integrate bicycle and pedestrian facilities that show high demand in an effort to find alternative transportation modes. Part of the discussion highlights the need for connectivity of these systems.

- The project transforms Alvin Drive and Linwood Drive into a multi-modal “complete street” corridor, providing enhanced bicycle and pedestrian facilities consistent with goals established in the MCRTP. The project also connects existing bicycle lanes on Maryal Road to existing bicycle facilities further north on Chaparral Street and Alvin Drive, filling gaps in the bicycle network. The project provides pedestrian ramps and crosswalks at key locations along Alvin Drive, Linwood Drive, and Maryal Drive. The addition of a roundabout at Alvin Drive and El Dorado Drive aligns with the MCRTP. The project clearly follows the goals and policies outlined at a regional level and applies the active transportation improvements at a local level.

The Monterey Bay 2035 Metropolitan Transportation Plan / Sustainable Communities Strategy (MTP/SCS) describe bicycling and walking as essential parts of the region’s transportation system. It discusses the importance of sidewalks and streets being accommodating to all users. Further, it explains that when local jurisdictions provide bicycle and pedestrian amenities, they are encouraging alternative modes of transportation at both a local and regional level. Specifically, the MTP/SCS explains how Safe Route to School programs can play a critical role in eliminating vehicle trips during peak school periods.

- The project helps provide Safe Routes to School by focusing improvements along key roadways that directly access Natividad and El Gabilan Elementary and North Salinas High, and also benefits other schools in the area. The project includes multiple bicycle and pedestrian improvements, as well as vehicle delay and queue improvements that create roadways attractive to all users. In addition to following the goals of the MTP/SCS,



connectivity of the City-wide bicycle and pedestrian network feeds into the regional system defined in the MTP/SCS to encourage regional active transportation options.

The Transportation Agency for Monterey County's Bicycle and Pedestrian Master Plan (2011) (B&PMP) sets goals to improve the quality, operation and integrity of bikeway and walkway network facilities, improve bicycle and pedestrian safety, and increase the number of bicycle and pedestrian trips, among others. It also illustrates the lack of connected bicycle lanes between Williams Drive and Alisal Road.

- The project meets the goals of the B&PMP by providing high quality bicycle and pedestrian facilities along Alvin Drive, Linwood Drive, and Maryal Drive. Further, it completes a couple projects noted on the Salinas Bikeway Project map to connect current gaps and enhances existing bicycle lanes and routes by adding buffers or improving awareness of shared roads.



## **Part B: Narrative Questions**

### **Detailed Instructions for: Question #1**

#### **QUESTION #1**

**POTENTIAL FOR INCREASED WALKING AND BICYCLING, ESPECIALLY AMONG STUDENTS, INCLUDING THE IDENTIFICATION OF WALKING AND BICYCLING ROUTES TO AND FROM SCHOOLS, TRANSIT FACILITIES, COMMUNITY CENTERS, EMPLOYMENT CENTERS, AND OTHER DESTINATIONS; AND INCLUDING INCREASING AND IMPROVING CONNECTIVITY AND MOBILITY OF NON-MOTORIZED USERS. (0-30 POINTS)**

**A. Describe the following:**

**-Current and projected types and numbers/rates of users. (12 points max.)**

East Alvin Drive is an active street with a mix of pedestrian, bicyclist, and vehicle demand. 24 hour video counts of pedestrians, bicycles and vehicles were taken by National Data Services (NDS) on Wednesday, February 25, 2015 on Alvin Drive between Kip Drive and Linwood Drive. The counts showed a total of 343 pedestrians on a typical weekday. Many of these pedestrians are students, walking to and from North Salinas High or Natividad Elementary. There were also 42 bicyclists counted on that same day. These bicyclists were using the section of East Alvin Drive between Kip Drive and Linwood Drive which does not provide any on-street bicycle facilities.

The collected data shows that there is already a high demand of pedestrians along this route and that there is need for some enhanced pedestrian crossings to improve safety. The number of bicyclists is high for not having any facilities, and it is anticipated that the number would elevate with dedicated and buffered bicycle lanes. Reducing the number of lanes in each direction is still expected to accommodate the vehicle traffic on the roadway, but would slow vehicles down and reduce potential conflicts. As part of the lane reduction and improved non-vehicle facilities, it is anticipated that some vehicle trips would be converted to pedestrian or bicycle trips.



Linwood Drive is a key north-south connection in a residential area of Salinas that fronts El Gabilan Elementary and connects to major east-west streets on either end. 24 hour video counts of pedestrians, bicycles, and vehicles were taken by National Data Services (NDS) on Wednesday, February 25, 2015 on Linwood Drive north of Laurel Drive. The counts showed a total of 187 pedestrians on a typical weekday. A majority of the pedestrians along Linwood Drive are students and, therefore, highest activity occurs around the school schedule. There were also 14 bicyclists observed on the roadway even though Linwood Drive does not currently have any bicycle facilities provided.

Pedestrian and bicyclist demand exists, but is limited due to the lack of good facilities that occur beyond Linwood Drive. With the implementation of the proposed project, the experience and connections along Linwood Drive will be improved. The number of users, both students and non-students, are anticipated to greatly increase with the proposed project.

A ConsumerStyles survey was conducted for the Center of Disease Control to ask parents of children aged 5-18 years how many times their youngest child walks to or from school. Approximately 17% reported that their child walked to or from school at least once per week. The percentage of students who walked was higher among elementary aged kids (5-11) versus older age brackets (12-18). Additionally, the most commonly reported barriers were distance (61.5%), traffic-related danger (30.4%), and weather (18.6%).

There is a total of 702 and 772 students enrolled in Natividad Elementary and El Gabilan Elementary respectively. Assuming an acceptable walking radius of 0.5 mile, it is estimated that 65% and 80% of enrolled students live within a reasonable walking distance from the schools respectively. Assuming an acceptable biking radius of 3 miles, all students within each school's enrollment boundary live within a reasonable biking distance from school. Estimated reasonable walking distance and enrollment boundaries for the applicable schools are included on the School Enrollment map in **Attachment I**.



While students would be the primary beneficiaries of the improvements, the project would also increase general pedestrian and bicycle use of these streets. The project is expected to significantly increase bicycle and pedestrian mode share by making a package of improvements that will slow down travel speeds on the busiest street in the corridor (Alvin Road). It also adds bicycle facilities and enhanced pedestrian crossings along Linwood Drive and sharrows to better identify the bicycle route along Chaparral Street and portions of Maryal Drive. The portion of Maryal Drive between Laurel Drive and Bernal Drive will add buffered bicycle lanes, a new sidewalk, and curb/gutter improvements. This roadway fronts several recreational uses that attract youth after school and on weekends. It is expected that these improvements will transform the area into an active transportation friendly environment with a unified bicycle and pedestrian network. Based on the current roadway conditions and proposed improvements, it is expected that pedestrians and bicycling activity will double in the area following the project.

**B. Describe how the project links or connects, or encourages use of existing routes (for non-infrastructure applications) to transportation-related and community identified destinations where an increase in active transportation modes can be realized, including but not limited to: schools, school facilities, transit facilities, community, social service or medical centers, employment centers, high density or affordable housing, regional, State or national trail system, recreational and visitor destinations or other community identified destinations via:**

**(12 points max.)**

- a. **creation of new routes**
- b. **removal of barrier to mobility**
- c. **closure of gaps**
- d. **other improvements to routes**
- e. **educates or encourages use of existing routes**

The roads that the project would modify serve several major attractions. Along East Alvin Drive there is North Salinas High, Natividad Elementary, and a private Christian School and Fellowship



and accompanying church. Along Linwood Drive is El Gabilan Elementary. Along Maryal Drive is the private school Madonna del Sasso, a Boys and Girls Club, Santa Lucia Park, and a major recreation area. This recreation area west of Maryal Drive and south of Laurel Drive hosts Salinas Municipal Stadium, Rebobank Stadium, Salinas Sports Complex, park areas, tennis courts, batting cages, aquatics center, and playground areas. All destinations and their general size are included on the Project Map included in **Attachment E**.

East Alvin Drive currently has bicycle lanes west of Kip Drive, but does not have any facilities east of Kip Drive. The project adds these facilities east of Kip Drive, connecting to the existing bicycle lanes along El Dorado Drive. The bicycle route along Chaparral Drive and Maryal Drive have posted signs to indicate bicycle routes. The project would improve bicycle awareness on these streets by adding sharrows. Maryal Drive south of Laurel Drive has a missing portion of bicycle lanes that would be completed with the project, connecting the existing bicycle network near the stadium on the south end of the project to the existing bicycle network to the north. The addition of bicycle lanes on Linwood Drive provides new facilities that connects residential areas with schools and other parts of the City.

**C. Referencing the answers to A and B above, describe how the proposed project represents one of the Implementing Agencies (and/or project Partnering Agency's) highest unfunded non-motorized active transportation priorities. (6 points max.)**

The City of Salinas has a variety of planning documents that includes “encouraging increased use of active modes of transportation, such as walking or biking” as a goal. Highlighted portions of these documents are attached in **Attachment I**. Included in **Attachment J** is a letter of support from the AMBAG documenting their support for the application for the project.

The Salinas General Plan serves as a blueprint for the future growth and development of the city. Several elements within the plan include promoting the use of alternative modes of transportation by maintaining and improving the biking and walking environment for both recreational and



commuting users. Specific policies within the Circulation Element related to bicycle access include providing safe and attractive cut-throughs, bicycle lanes, and bicycle paths and the insurance that all pedestrian and bicycle route improvements meet ADA standards for accessibility. Specific policies related to pedestrian access include safe routes to school and the increase in the availability of safe and well-maintained sidewalks in all areas of the City.

The Salinas Bikeways Plan identifies and addresses the need for well designed, convenient, and safe bicycle facilities integrated into an overall bicycle network to reduce the number of trips being made by single occupant vehicles. The plan proposes bicycle lanes on Alvin Drive between McKinnon Street and Natividad Road and is included as a 'C' priority project (5+ year completion).

The City of Salinas Pedestrian Plan calls for the installation of appropriate streets, sidewalks, pedestrian access ramps, traffic calming measures, lighting and related facilities to encourage walking and to construct all pedestrian facilities in compliance with ADA standards. The plan identifies Maryal Drive from Laurel Drive to Bernal Drive as having no existing sidewalk.

The bicycle and pedestrian network in this area of Salinas is almost fully connected, but has some missing pieces. The project focuses on filling those missing connections (including those identified in the Salinas Bikeways Plan and Pedestrian Plan and others identified through the project development stages) to increase the use of active modes of travel. With major recreation centers and several schools integrated into this residential area, there are short vehicle trips occurring that could easily be replaced by walking or bicycling if the facilities were provided. With the high pedestrian activity and high number of collisions documented in this area (discussed later), the City of Salinas has identified the need for safety improvements as a high priority. Funding to accomplish the series of improvements is beyond typical funding available for the City.



## **Part B: Narrative Questions**

### **Detailed Instructions for: Question #2**

#### **QUESTION #2**

**POTENTIAL FOR REDUCING THE NUMBER AND/OR RATE OF PEDESTRIAN AND BICYCLIST FATALITIES AND INJURIES, INCLUDING THE IDENTIFICATION OF SAFETY HAZARDS FOR PEDESTRIANS AND BICYCLISTS. (0-25 POINTS)**

- A. Describe the plan/program influence area or project location's history of collisions resulting in fatalities and injuries to non-motorized users and the source(s) of data used (e.g. collision reports, community observation, surveys, audits). (10 points max.)**

Alvin Drive from Main Street to Natividad Road is currently two lanes in each direction and approximately 65 feet wide. Bike lanes exist between Main Street and Kip Drive, but there are no bicycle facilities on the other portion of Alvin Drive. This creates an unsafe condition for both pedestrians and bicyclists as the wide exclusive vehicular facility promotes high vehicular speeds and long pedestrian crossings. With no dedicated bicycle facilities and a limited number of crosswalks, cyclists are using the vehicular facilities to travel along the roadway.

Collision reports were obtained from the Transportation Injury Mapping System (TIMS) online database for 2009 - 2013. Below is a summary of collisions involving pedestrian and bicyclists, all collisions resulted in one or more injuries:



Location	Pedestrian/Bicycle Involved Collision	Year
Alvin Dr / Main St	Pedestrian	2011
Alvin Dr / Main St	Bicycle	2011
Alvin Dr / Main St	Pedestrian	2012
Alvin Dr / Main St	Bicycle	2012
Alvin Dr / Main St	Bicycle	2012
Alvin Dr / Main St	Bicycle	2012
Alvin Dr / Main St	Bicycle	2013
Alvin Dr / McKinnon St (250 ft west)	Pedestrian	2010
Alvin Dr / McKinnon St	Pedestrian	2009
Alvin Dr / McKinnon St	Pedestrian	2009
Alvin Dr / McKinnon St	Pedestrian	2012
Alvin Dr / Kip Dr	Bicycle	2009
Alvin Dr / Kip Dr	Bicycle	2012
Alvin Dr / Kip Dr	Bicycle	2013
Alvin Dr / Linwood Dr	Bicycle	2009
Alvin Dr / Linwood Dr	Pedestrian	2010
Alvin Dr / Linwood Dr	Bicycle	2012
Alvin Dr / Linwood Dr	Bicycle	2013
Alvin Dr / Lessen Ave	Pedestrian	2009
Alvin Dr / Modoc Ave	Pedestrian	2010

As noted above and summarized in **Attachment I**, there have been a very high number of pedestrian and bicycle collisions along East Alvin Drive in the past few years (20 accidents).



**B. Describe how the project/program/plan will remedy (one or more) potential safety hazards that contribute to pedestrian and/or bicyclist injuries or fatalities; including but not limited to the following possible areas:**

**(15 points max.)**

- **Reduces speed or volume of motor vehicles in the proximity of non-motorized users.**
- **Improves sight distance and visibility between motorized and non-motorized users.**
- **Eliminates potential conflict points between motorized and non-motorized users, including creating physical separation between motorized and non-motorized users.**
- **Improves compliance with local traffic laws for both motorized and non-motorized users.**
- **Addresses inadequate traffic control devices.**
- **Eliminates or reduces behaviors that lead to collisions involving non-motorized users.**
- **Addresses inadequate or unsafe traffic control devices, bicycle facilities, trails, crosswalks and/or sidewalks.**

In 2012, The National Highway Traffic Safety Administration conducted a national telephone survey. According to the survey, poor quality facilities and motor vehicles are the leading causes of pedestrian injury. 41% of pedestrian injuries were caused by tripping and/or falling and 12% were caused by getting hit by a car. Nearly a third of all bicycle injuries (29%) were caused when bicyclists were struck by cars. A copy of the survey is included in **Attachment I**. Common bicycle collisions include midblock rideout (when bicyclists enter the roadway from a driveway or bicycle facility without slowing), bicycles riding the wrong way on the street, bicyclists making left turns, right hooks (the condition that happens when a car passes a cyclist to the left and then makes a right turn in front of the cyclist), and failure of bicyclists to obey stop signs. Specifically along Alvin Drive, the majority of collisions took place at intersections. The project utilizes many



countermeasures including pedestrian ramps, curb bulb-outs, buffered bicycle lanes, and high visibility pedestrian school crossings to improve pedestrian and bicycle safety. The project also proposes many traffic calming measures (road diet, roundabout, and curb extensions) to slow vehicular speeds and provide more dedicated space for active modes of transportation.

The project addresses inadequate or unsafe bicycle facilities and sidewalks. Roadway enhancements include the reduction of vehicular travel lanes and addition of buffered bicycle lanes on Alvin Drive between Main Street and Natividad Road. It also includes the addition of bicycle lanes, buffered bicycle lanes, or sharrows on Linwood Drive, Maryal Drive and Chaparral Street and the addition of sidewalk, curb, and gutter on Maryal Drive between Laurel Drive and Bernal Drive.

- The reduction of vehicular lanes will reduce vehicle speeds by narrowing the roadway cross-section and the space allotted to vehicles.
- The installation of bicycle lanes and buffered bicycle lanes gives bicyclists a separate facility. This will reduce the number of potential conflict points between bicyclists, vehicles, and pedestrians and reduce behaviors that lead to collisions by putting bicyclists in a designated area where drivers and pedestrians can expect them to be. It also improves compliance with local traffic laws by discouraging bicyclists from riding on the sidewalks.
- The installation of sharrows will place bicyclists in the travel lane. This will reduce behaviors that lead to collisions by providing a reminder to vehicles that the roadway is a shared facility. It also will improve compliance with local traffic laws by discouraging bicyclists from riding on the sidewalks.
- The installation of sidewalk, curb, and gutter will give pedestrians a separate facility. This will eliminate potential conflict points between bicyclists, vehicles, and pedestrians and reduce behaviors that lead to collisions by placing pedestrians in a designated area where drivers and bicyclists can expect them to be. It will also improve compliance with local traffic laws by discouraging pedestrians from walking in the roadway.



The project also addresses inadequate or unsafe traffic control devices and crosswalks at the intersections of Alvin Drive at Main Street, McKinnon Street, Linwood Drive, Lesson Avenue, El Dorado Drive, Modoc Avenue, Linwood Drive at Rainier Drive, and Sequoia Street. Intersection enhancements include inside bicycle lanes, curb bulb-outs, high visibility pedestrian school crossings, and median pedestrian refuge islands. It also includes the installation of either a roundabout or traffic signal at Alvin Drive and El Dorado Drive.

- Curb bulb outs will extend the sidewalk toward the street at crossing locations. This will reduce vehicle speeds by further narrowing the roadway and reduce turning vehicle speeds by creating tighter intersection corners. It will also improve sight distance and visibility by improving sightlines for both motorists and pedestrians. It will also eliminate potential conflict points by placing crossing pedestrians at a more visible location to help avoid right-hook collisions between a motor vehicle and a pedestrian (the condition that happens when a car passes a pedestrian to the left and then makes a right turn in front of the pedestrian).
- High visibility pedestrian school crossings will increase the visibility of the crosswalk to approaching vehicles. This will improve compliance with local traffic laws by discouraging pedestrians from illegally crossing the roadway at other midblock locations and at the same time encourage vehicles to yield to pedestrians.
- A roundabout will address the inadequate traffic control devices at the intersection of Alvin Drive and El Dorado Drive. A roundabout will act as a traffic calming devices to further reduce vehicle travel speeds along Alvin Drive and El Dorado Drive. The roundabout will also greatly reduce the number and severity of potential conflict points at the intersection by eliminating the possibility for T-bone and head-on collisions. Because roundabouts create a constant traffic flow, vehicles do not have an incentive to speed up to try and “beat the light” and therefore will reduce behaviors that lead to collisions.
- A traffic signal will also address the inadequate traffic control devices at the intersection of Alvin Drive and El Dorado Drive.
- Placing the westbound bicycle lane at the intersection of Alvin Drive and Main Street inside the right-turn lane will eliminate potential conflict points and reduce behaviors that lead to



collisions. Placing the bicycle lanes on the inside will prevent right-hook collisions (the condition that happens when a car passes a cyclist to the left and then makes a right turn in front of the cyclist).

Individual crash data including location, major hazards, and counter measures are described and illustrated on the Safety Improvements Map included in **Attachment I**.



## **Part B: Narrative Questions**

### **Detailed Instructions for: Question #3**

#### **QUESTION #3**

#### **PUBLIC PARTICIPATION and PLANNING (0-15 POINTS)**

**Describe the community based public participation process that culminated in the project/program proposal or will be utilized as part of the development of a plan.**

**A. Who: Describe who was engaged in the identification and development of this project/program/plan (for plans: who will be engaged). (5 points max)**

The City of Salinas was responsible for the development of this ATP project application concept. The idea was in response to concerns express approximately one year ago when a young girl was hit by a car while crossing East Alvin Drive on the way to school. A meeting was held at Natividad Elementary shortly after that accident occurred which was attended by the City of Salinas, school officials and a full auditorium of concerned parents. In preparing this ATP application, the City of Salinas met with Mr. Terry Ryan, the Assistant Superintendent for the Salinas City School District to gain his feedback on the concept and to receive permission to contact nearby school principals. Principals from Natividad and El Gabilian Elementary were contacted and both agreed to send flyers home with their students notifying parents of a public open house. The flyers were prepared with a Spanish version on one side and an English version on the reverse side. The flyers are included in **Attachment I**.

In addition, the Transportation Agency of Monterey County (TAMC), Association of Monterey Bay Area Governments (AMBAG) and Building Healthy Communities (BHC) were contacted to discuss the project. Both organization support active transportation principals. Letters of support for the



project have been received from the above mentioned organizations and are included in **Attachment J**.

**B. How: Describe how stakeholders were engaged (or will be for a plan). (4 points max)**

The City of Salinas hosted an open house informational meeting for the East Alvin/Linwood/Maryal project on Thursday, March 26, 2015 from 6 to 8 p.m. Coffee, tea, water and snacks were provided for attendees. The meeting was held at Natividad Elementary, which is located within the study area to provide convenient access to attendees. Public transit is provided, with a bus stop located about one block from the school. The room is ADA accessible. The open house allowed for participants meet one-on-one with subject matter experts to review boards displaying the proposed bicycle facilities, traffic calming features, pedestrian enhancements and roundabout improvement. Both English and Spanish speaking experts were available. Over half of the attendees took advantage of the Spanish speaking experts.

A formal presentation was given midway through the open house featuring PowerPoint and a short animation displaying traffic flow through the roundabout. A question and answer session was held following the presentation. A Spanish translator was used for the presentation and questions.

**C. What: Describe the feedback received during the stakeholder engagement process and describe how the public participation and planning process has improved the project's overall effectiveness at meeting the purpose and goals of the ATP. (5 points max)**

Fifteen people attended the informational meeting. All but one couple were in favor of all of the recommendations. The participants were particularly excited about slowing traffic speeds, introducing buffered bicycle lanes, and pedestrian crosswalk enhancements to shorten crossing distances. The couple that had concerns lived about a block off of East Alvin Drive and were opposed to any traffic calming measures. In response to comments received, the concept plan was refined to include trees or landscaping within the median of Linwood Drive, an additional new



marked crosswalk on Linwood Drive, and street lighting at the El Dorado Drive/East Alvin Drive intersection.

**D. Describe how stakeholders will continue to be engaged in the implementation of the project/program/plan. (1 points max)**

Stakeholders will continue to be engaged as the project is implemented. In response to traffic capacity concerns expressed at the open house, further information will be prepared and shared at future meetings to demonstrate that adequate traffic capacity can be provided while providing for improved bicycle and pedestrian mobility. To get more people attending the future open house/workshops for the project, the following additional notifications are proposed:

- Bi-lingual flyers sent home with students from the two elementary schools and North Salinas High.
- Bi-lingual mailers sent to residents along portions of Linwood Drive and East Alvin Drive where changes to travel lanes are suggested
- Newspaper notice of meeting



## **Part B: Narrative Questions**

### **Detailed Instructions for: Question #4**

#### **QUESTION #4**

#### **IMPROVED PUBLIC HEALTH (0-10 points)**

- **NOTE: Applicants applying for the disadvantaged community set aside must respond to the below questions with health data specific to the disadvantaged communities. Failure to do so will result in lost points.**

**A. Describe the health status of the targeted users of the project/program/plan. (3 points max)**

**B.**

As part of the County of Monterey Health Department, the Health in All Policies (HIAP) initiative was started to improve population health by incorporating health considerations into all sectors and policy areas. HIAP is the framework used in Monterey County to address health inequities. Carmen Gil, the HIAP Manager was consulted regarding the root causes of poor health. In Monterey County, health inequities have widened particularly in communities that have experienced socioeconomic disadvantages, inequities are further widened when neighborhoods lack key infrastructure as it can be difficult to adopt healthier behaviors when safe facilities are not available ([www.mtyhd.org](http://www.mtyhd.org)).

According to California Health Interview Survey (CHIS) data for zip code 93906 where the project is located, 10.2 % of children ages 0-17 and 27.3% of adults ages 18-64 are in fair or poor health, both of these are higher than the state averages (6.0% for ages 0-17 and 17.9% for ages 18-64). In addition, 31.0% of the adult population (18+) are obese, this is 6.2% higher than the state average (24.8%). As a whole, Monterey County is in the mid-range of quality of life for the state of California, and ranks 21 out of 57 for health behaviors according to the County Health Rankings analysis.



California law requires districts to administer physical fitness testing to all 5<sup>th</sup>, 7<sup>th</sup>, and 9<sup>th</sup> grade students annually. Physical fitness reports from the California Department of Education are shown below.

School	At Health Risk For	
	Aerobic Capacity	Body Composition
North Salinas High	2.5%	23.3%
Natividad Elementary	17.9%	34.7%
El Gabilan Elementary	9.1%	25.2%

Overweight children face a greater risk of developing many health problems as well as low self-esteem, poor body image, and symptoms of depression. Physical inactivity and nutrition-related diseases are the second-leading cause of preventable death.

Relevant data and references area attached in **Attachment I**.

**C. Describe how you expect your project/proposal/plan to enhance public health. (7 points max.)**

Regular physical activity is a significant component of a healthy lifestyle. According to *the 2008 Physical Activity Guidelines for Americans*, the Center for Disease Control recommends that adults engage in moderate-intensity physical activities for a total of 150 minutes a week (30 minutes, 5 days a week). The International Consensus Conference on Physical Activity Guidelines for Adolescents recommends that adolescents engage in three or more session per week of activities that require moderate levels of exertion. The American Heart Association recommends that all elementary school-aged children should have a least 60 minutes of moderate physical activity every day.



Walking and biking are excellent forms of exercise. They stimulate and maintain muscular strength and good joint function; involve a large percentage of the body; can be maintained at any age; and do not provoke hip, knee or weight bearing injuries. By helping to influence walking and biking, the City of Salinas can help improve the overall health of its residents.

By reducing the number of vehicle trips and increasing walking and bicycling trips, this project does two things: 1) increases the activity level of residents, especially children; and 2) reduces greenhouse gas emissions. Multiple health sources have documented that increased activity levels has been proven to reduce the risk of obesity, diabetes, high blood pressure, coronary heart disease, depression and other health issues. Children who get adequate exercise are more likely to maintain a healthy weight; build stronger muscles, bones, and joints; and decrease the risk of developing type 2 diabetes. The reduction in greenhouse gas emissions reduces air pollution and the impact on public health. Eight in ten Californians live in areas with unhealthy air according the American Lung Association's State of the Air 2014 report. Children, the elderly, low income individuals, communities of color and those with lung and heart illness face the highest risks when air quality is poor. Over 9,000 premature deaths are caused from air pollution annually and children living in polluted areas experience slowed lung development. A study commissioned by the American Lung Association determined that fewer premature deaths, heart attacks, and asthma attacks can be expected with the implementation of California's Clean Air Programs and the reduction of vehicle trips.

Relevant data and references area attached in **Attachment I**.



## **Part B: Narrative Questions**

### **Detailed Instructions for: Question #5**

#### **QUESTION #5**

##### **BENEFIT TO DISADVANTAGED COMMUNITIES (0-10 points)**

###### **A. Identification of disadvantaged communities: (0 points – SCREENING ONLY)**

To receive disadvantaged communities points, projects/programs/plans must be located within a disadvantaged community (as defined by one of the four options below) AND/OR provide a direct, meaningful, and assured benefit to individuals from a disadvantaged community.

1. The median household income of the census tract(s) is 80% of the statewide median household income
2. Census tract(s) is in the top 25% of overall scores from CalEnviroScreen 2.0
3. At least 75% of public school students in the project area are eligible for the Free or Reduced Priced Meals Program under the National School Lunch Program
4. Alternative criteria for identifying disadvantage communities (see below)

Provide a map showing the boundaries of the proposed project/program/plan and the geographic boundaries of the disadvantaged community that the project/program/plan is located within and/or benefiting.

Project and disadvantaged community boundaries are illustrated on the Disadvantaged Communities Map included in **Attachment I**.



**Option 1:** Median household income, by census tract for the community(ies) benefited by the project: \$\_\_\_\_\_

- Provide all census tract numbers
- Provide the median income for each census track listed
- Provide the population for each census track listed

Statewide median household income is \$61,094; 80% is equal to \$48,875

Census Tract Number	Median Income	Population
1.02	\$75,179	9,036
1.03	\$54,679	3,894
<b>2</b>	<b>48,659</b>	<b>6,877</b>
<b>4</b>	<b>\$38,987</b>	<b>6,952</b>

As shown above, two census tracts adjacent to the project (census tracts 2 and 4) are considered to be a disadvantaged community.

\*all values represent the 5-year estimate from the 2010 census survey

Census tract and geographic disadvantaged community boundaries that the project is located within are illustrated on the Disadvantaged Communities Map included in **Attachment I**.

**Option 2:** California Communities Environmental Health Screening Tool 2.0 (CalEnviroScreen) score for the community benefited by the project: \_\_\_\_\_

- Provide all census tract numbers
- Provide the CalEnviroScreen 2.0 score for each census track listed
- Provide the population for each census track listed

*This criteria was not used.*



**Option 3:** Percentage of students eligible for the Free or Reduced Price Meals Programs:

\_\_\_\_\_ %

- Provide percentage of students eligible for the Free or Reduced Meals Program for each and all schools included in the proposal

School	Percent Eligible for FRPM	Enrollment
North Salinas High	63.0%	1,807
<b>Natividad Elementary</b>	<b>91.0%</b>	<b>699</b>
<b>El Gabilan Elementary</b>	<b>85.8%</b>	<b>720</b>

As shown above, two schools in the project area has at least 75% of the students eligible for the FRPM program.

Schools with enrollment areas near the project that have at least 75% of the students eligible for the FRPM program are identified on the Disadvantaged Communities Map included in **Attachment I**.

**Option 4:** Alternative criteria for identifying disadvantaged communities:

- Provide median household income (option 1), the CalEnviroScreen 2.0 score (option 2), and if applicable, the percentage of students eligible for Free and Reduced Meal Programs (option 3)
- Provide ADDITIONAL data that demonstrates that the community benefiting from the project/program/plan is disadvantaged
- Provide an explanation for why this additional data demonstrates that the community is disadvantaged

*This criteria was not used.*

**B. For proposals located within disadvantage community: (5 points max)**

**What percent of the funds requested will be expended in the disadvantaged community? \_\_\_% Explain how this percent was calculated.**



The streets that would be modified with the proposed project are within or on the border of disadvantaged community tracts. East Alvin Drive is on the border of a disadvantaged community, but the improvements would serve the Natividad Elementary which has 91.0% of students eligible for the RFMP so the improvements along it were considered to be **100% applicable**.

Associated geographic disadvantaged community boundaries and Schools with enrollment areas near the project that have at least 75% of the students eligible for the FRPM program are identified on the Disadvantaged Communities Map included in **Attachment I**.

**C. Describe how the project/program/plan provides (for plans: will provide) a direct, meaningful, and assured benefit to members of the disadvantaged community. (5 points max)**

**Define what direct, meaningful, and assured benefit means for your proposed project/program/plan, how this benefit will be achieved, and who will receive this benefit.**

The improvements enhance pedestrian and bicycle facilities on key roadways that connect homes and attractions within a disadvantaged community. Specifically, the schools and major recreation areas would have enhanced bicycle facilities, pedestrian facilities, and enhanced crossings leading to and adjacent to them. Further, the project eliminates existing gaps in the bicycle network that connect the disadvantaged communities to other adjacent communities in the area. By making walking and cycling more attractive travel options, more people will travel using these modes of travel. This increase in active travel will result in health benefits to those participants.



## **Part B: Narrative Questions**

### **Detailed Instructions for: Question #6**

#### **QUESTION #6**

#### **COST EFFECTIVENESS (0-5 POINTS)**

- A. Describe the alternatives that were considered and how the ATP-related benefits vs. project-costs varied between them. Explain why the final proposed alternative is considered to have the highest Benefit to Cost Ratio (B/C) with respect to the ATP purpose of “increased use of active modes of transportation”.  
(3 points max.)**

The initial alternative considered was to do the road diet on East Alvin Drive to add bicycle lanes east of Kip Drive, installing a traffic signal at the intersection of East Alvin Drive and El Dorado Drive to provide a crossing for Natividad Elementary, and complete bicycle improvements on Linwood Drive. This alternative served the need of addressing recent collisions and improving routes directly in front of the schools. However, it still left gaps in the bicycle network and did not truly benefit pedestrians for El Gabilan Elementary or North Salinas High.

The project then transformed into focusing on complete street concepts by enhancing existing pedestrian and bicycle facilities to provide a more comfortable environment for all users, including adding a roundabout instead of a traffic signal at El Dorado Drive. The extension of the project to include Maryal Drive was then developed to connect the new improvements to existing improvements and major activity centers further south. The additional costs associated these additions was minimal compared to the benefits associated with improving comfort and safety and increasing connections for all forms of active transportation modes.



- B. Use the ATP Benefit/Cost Tool, provided by Caltrans Planning Division, to calculate the ratio of the benefits of the project relative to both the total project cost and ATP funds requested. The Tool is located on the CTC's website at: <http://www.dot.ca.gov/hq/tpp/offices/eab/atp.html>. After calculating the B/C ratios for the project, provide constructive feedback on the tool (2 points max.)

$$\left( \frac{\textit{Benefit}}{\textit{Total Project Cost}} \textit{ and } \frac{\textit{Benefit}}{\textit{Funds Requested}} \right).$$

The Benefit/Cost tool was completed for this project. The inputs and outputs are provided in **Attachment I**. Feedback was sent to Rose Agacer at Caltrans, the email is also provided in **Attachment I**.



## **Part B: Narrative Questions**

### **Detailed Instructions for: Question #7**

#### **QUESTION #7**

##### **LEVERAGING OF NON-ATP FUNDS (0-5 points)**

- A. The application funding plan will show all federal, state and local funding for the project:  
(5 points max.)**

There are no leveraged funds identified for this project.



## **Part B: Narrative Questions**

### **Detailed Instructions for: Question #8**

#### **QUESTION #8**

#### **USE OF CALIFORNIA CONSERVATION CORPS (CCC) OR A CERTIFIED COMMUNITY CONSERVATION CORPS (0 or -5 points)**

Step 1: Is this an application requesting funds for a Plan (Bike, Pedestrian, SRTS, or ATP Plan)?

- Yes (If this application is for a Plan, there is no need to submit information to the corps and there will be no penalty to applicant: 0 points)
- No (If this application is NOT for a Plan, proceed to Step #2)

Step 2: The applicant must submit the following information via email concurrently to **both** the CCC **AND** certified community conservation corps prior to application submittal to Caltrans. The CCC and certified community conservation corps will respond within five (5) business days from receipt of the information.

- Project Title
- Project Description
- Detailed Estimate
- Project Schedule
- Project Map
- Preliminary Plan



<u>California Conservation Corps representative:</u>	<u>Community Conservation Corps representative:</u>
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Name: Wei Hsieh  
 Email: [atp@ccc.ca.gov](mailto:atp@ccc.ca.gov)  
 Phone: (916) 341-3154

Name: Danielle Lynch  
 Email: [inquiry@atpcommunitycorps.org](mailto:inquiry@atpcommunitycorps.org)  
 Phone: (916) 426-9170

Step 3: The applicant has coordinated with Wei Hsieh with the CCC **AND** Danielle Lynch with the certified community conservation corps and determined the following (check appropriate box):

- Neither corps can participate in the project (0 points)
- Applicant intends to utilize the CCC or a certified community conservation corps on the following items listed below (0 points).

**Planting for the landscaping component of the scope of work (\$10,000)**

- Applicant has contacted the corps but intends not to use the corps on a project in which either corps has indicated it can participate (-5 points)
- Applicant has not coordinated with both corps (-5 points)

The CCC and certified community conservation corps will provide a list to Caltrans of all projects submitted to them and indicating which projects they are available to participate on. The applicant must also attach any email correspondence from the CCC and certified community conservation corps to the application verifying communication/participation.

Emails were sent to both the California Conservation Corps and the Community Conservation Corps representatives and are included in **Attachment I**.



## **Part B: Narrative Questions**

### **Detailed Instructions for: Question #9**

#### **QUESTION #9**

#### **APPLICANT'S PERFORMANCE ON PAST GRANTS AND DELIVERABILITY OF PROJECTS**

***( 0 to-10 points OR disqualification)***

- A. *Applicant:*** Provide short explanation of the Implementing Agency's project delivery history for all projects that include project funding through Caltrans Local Assistance administered programs (ATP, Safe Routes to School, BTA, HSIP, etc.) for the last five (5) years.

The City of Salinas has received two HSIP grants and one ATP grant in the last five years. These grants are in good standing with Caltrans. One of the HSIP projects is approved for construction and the other is approved for design. For the ATP Grant, the PA&ED phase has been completed and the City is waiting for CTC allocation to start the PS&E phase. None of these projects have experienced delivery failure.

Additionally, The City of Salinas has successfully implemented and completed federal and state grants in a satisfactory manner.

- B. *Caltrans response only:***

**Caltrans to recommend score for deliverability of scope, cost, and schedule based on the overall application.**



## **Part C: Application Attachments**

***Applicants must ensure all data in this part of the application is fully consistent with the other parts of the application. See the Application Instructions and Guidance document for more information and requirements related to Part C.***

### **List of Application Attachments**

The following attachment names and order must be maintained for all applications. Depending on the Project Type (I, NI or Plans) some attachments will be intentionally left blank. All non-blank attachments must be identified in hard-copy applications using "tabs" with appropriate letter designations

<b>Application Signature Page</b> Required for all applications	<b>Attachment A</b>
<b>ATP - PROJECT PROGRAMMING REQUEST (ATP-PPR)</b> Required for all applications	<b>Attachment B</b>
<b>Engineer's Checklist</b> Required for Infrastructure Projects	<b>Attachment C</b>
<b>Project Location Map</b> Required for all applications	<b>Attachment D</b>
<b>Project Map/Plans showing existing and proposed conditions</b> Required for Infrastructure Projects (optional for 'Non-Infrastructure' and 'Plan' Projects)	<b>Attachment E</b>
<b>Photos of Existing Conditions</b> Required for all applications	<b>Attachment F</b>
<b>Project Estimate</b> Required for Infrastructure Projects	<b>Attachment G</b>
<b>Non-Infrastructure Work Plan (Form 22-R)</b> Required for all projects with Non-Infrastructure Elements	<b>Attachment H</b> (NOT USED)
<b>Narrative Questions backup information</b> Required for all applications Label attachments separately with "H-#" based on the # of the Narrative Question	<b>Attachment I</b>
<b>Letters of Support</b> Required or Recommended for all projects (as designated in the instructions)	<b>Attachment J</b>
<b>Additional Attachments</b> Additional attachments may be included. They should be organized in a way that allows application reviews easy identification and review of the information.	<b>Attachment K</b>



## Part C: Attachments Attachment A: Signature Page

**IMPORTANT:** Applications will not be accepted without all required signatures.

**Implementing Agency: Chief Executive Officer, Public Works Director, or other officer authorized by the governing board**

The undersigned affirms that their agency will be the "Implementing Agency" for the project if funded with ATP funds and they are the Chief Executive Officer, Public Works Director or other officer **authorized by their governing board with the authority to commit the agency's resources and funds**. They are also affirming that the statements contained in this application package are true and complete to the best of their knowledge. For infrastructure projects, the undersigned affirms that they are the manager of the public right-of-way facilities (responsible for their maintenance and operation) or they have authority over this position.

Signature:	<u>[Handwritten Signature]</u>	Date:	<u>5/14/15</u>
Name:	<u>Gary Petersen</u>	Phone:	<u>831-758-7390</u>
Title:	<u>Public Works Director</u>	e-mail:	<u>garyp@ci.salinas.ca.us</u>

**For projects with a Partnering Agency: Chief Executive Officer or other officer authorized by the governing board**

*(For use only when appropriate)*

The undersigned affirms that their agency is committed to partner with the "Implementing Agency" and agrees to assume the responsibility for the ongoing operations and maintenance of the facility upon completion by the implementing agency and they intend to document such agreement per the CTC guidelines. The undersigned also affirms that they are the Chief Executive Officer or other officer authorized by their governing board with the authority to commit the agency's resources and funds. They are also affirming that the statements contained in this application package are true and complete to the best of their knowledge.

Signature:	_____	Date:	_____
Name:	_____	Phone:	_____
Title:	_____	e-mail:	_____

**For Safe Routes to School projects and/or projects presented as benefiting a school: School or School District Official**

*(For use only when appropriate)*

The undersigned affirms that the school(s) benefited by this application is not on a school closure list.

Signature:	<u>[Handwritten Signature]</u>	Date:	<u>May 21, 2015</u>
Name:	<u>Jerry Stratton</u>	Phone:	<u>831-753-5600</u>
Title:	<u>Assist. Superintendent</u>	e-mail:	<u>jstratton@salinascity.k12.ca.us</u>

**For projects with encroachments on the State right-of-way: Caltrans District Traffic Operations Office Approval\***

*(For use only when appropriate)*

If the application's project proposes improvements within a freeway or state highway right-of-way, whether it affects the safety or operations of the facility or not, it is required that the proposed improvements be reviewed by the district traffic operations office and either a letter of support/acknowledgement from the traffic operations office be attached or the signature of the traffic manager be secured in the application. The Caltrans letter and/or signature does not imply approval of the project, but instead is only an acknowledgement that Caltrans District staff is aware of the proposed project; and upon initial review, the project appears to be reasonable and acceptable.

Is a letter of support/acknowledgement attached?  If yes, no signature is required. If no, the following signature is required.

Signature:	_____	Date:	_____
Name:	_____	Phone:	_____
Title:	_____	e-mail:	_____

\* Contact the District Local Assistance Engineer (DLAE) for the project to get Caltrans Traffic Ops contact information. DLAE contact information can be found at <http://www.dot.ca.gov/hq/LocalPrograms/dlae.htm>.

ATP PROJECT PROGRAMMING REQUEST

Date: 5/28/2015

Project Information:					
<b>Project Title:</b>	The project improves & adds bicycle and pedestrian facilities along Alvin Drive, Linwood Drive, Chaparral Drive, and Maryal Drive with the implementation of road diets, buffered bike lanes and sharrows, and pedestrian crossing and ramp enhancements.				
<b>District</b>	<b>County</b>	<b>Route</b>	<b>EA</b>	<b>Project ID</b>	<b>PPNO</b>
05	Monterey County	Var			

**Funding Information:**  
DO NOT FILL IN ANY SHADED AREAS

Proposed Total Project Cost (\$1,000s)									Notes:
Component	Prior	14/15	15/16	16/17	17/18	18/19	19/20+	Total	
E&P (PA&ED)				50				50	
PS&E				472				472	
R/W					42			42	
CON						2,395		2,395	
<b>TOTAL</b>				<b>522</b>	<b>42</b>	<b>2,395</b>		<b>2,959</b>	

ATP Funds		Infrastructure Cycle 2							Program Code
Proposed Funding Allocation (\$1,000s)									
Component	Prior	14/15	15/16	16/17	17/18	18/19	19/20+	Total	Funding Agency
E&P (PA&ED)				50				50	
PS&E				472				472	Notes:
R/W					42			42	
CON						2,395		2,395	
<b>TOTAL</b>				<b>522</b>	<b>42</b>	<b>2,395</b>		<b>2,959</b>	

ATP Funds		Non-infrastructure Cycle 2							Program Code
Proposed Funding Allocation (\$1,000s)									
Component	Prior	14/15	15/16	16/17	17/18	18/19	19/20+	Total	Funding Agency
E&P (PA&ED)									
PS&E									Notes:
R/W									
CON									
<b>TOTAL</b>									

ATP Funds		Plan Cycle 2							Program Code
Proposed Funding Allocation (\$1,000s)									
Component	Prior	14/15	15/16	16/17	17/18	18/19	19/20+	Total	Funding Agency
E&P (PA&ED)									
PS&E									Notes:
R/W									
CON									
<b>TOTAL</b>									

ATP Funds		Previous Cycle							Program Code
Proposed Funding Allocation (\$1,000s)									
Component	Prior	14/15	15/16	16/17	17/18	18/19	19/20+	Total	Funding Agency
E&P (PA&ED)									
PS&E									Notes:
R/W									
CON									
<b>TOTAL</b>									

ATP Funds		Future Cycles							Program Code
Proposed Funding Allocation (\$1,000s)									
Component	Prior	14/15	15/16	16/17	17/18	18/19	19/20+	Total	Funding Agency
E&P (PA&ED)									
PS&E									Notes:
R/W									
CON									
<b>TOTAL</b>									

Fund No. 2:		Future Source for Matching							Program Code
Proposed Funding Allocation (\$1,000s)									
Component	Prior	14/15	15/16	16/17	17/18	18/19	19/20+	Total	Funding Agency
E&P (PA&ED)									
PS&E									Notes:
R/W									
CON									
<b>TOTAL</b>									

**ATP PROJECT PROGRAMMING REQUEST**

Date: 5/28/2015

Project Information:					
<b>Project Title:</b>	The project improves & adds bicycle and pedestrian facilities along Alvin Drive, Linwood Drive, Chaparral Drive, and Maryal Drive with the implementation of road diets, buffered bike lanes and sharrows, and pedestrian crossing and ramp enhancements.				
<b>District</b>	<b>County</b>	<b>Route</b>	<b>EA</b>	<b>Project ID</b>	<b>PPNO</b>
05	Monterey County	Var			

**Funding Information:**  
DO NOT FILL IN ANY SHADED AREAS

Fund No. 3:	Proposed Funding Allocation (\$1,000s)								Program Code
Component	Prior	14/15	15/16	16/17	17/18	18/19	19/20+	Total	Funding Agency
E&P (PA&ED)									Notes:
PS&E									
R/W									
CON									
<b>TOTAL</b>									

Fund No. 4:	Proposed Funding Allocation (\$1,000s)								Program Code
Component	Prior	14/15	15/16	16/17	17/18	18/19	19/20+	Total	Funding Agency
E&P (PA&ED)									Notes:
PS&E									
R/W									
CON									
<b>TOTAL</b>									

Fund No. 5:	Proposed Funding Allocation (\$1,000s)								Program Code
Component	Prior	14/15	15/16	16/17	17/18	18/19	19/20+	Total	Funding Agency
E&P (PA&ED)									Notes:
PS&E									
R/W									
CON									
<b>TOTAL</b>									

Fund No. 6:	Proposed Funding Allocation (\$1,000s)								Program Code
Component	Prior	14/15	15/16	16/17	17/18	18/19	19/20+	Total	Funding Agency
E&P (PA&ED)									Notes:
PS&E									
R/W									
CON									
<b>TOTAL</b>									

Fund No. 7:	Proposed Funding Allocation (\$1,000s)								Program Code
Component	Prior	14/15	15/16	16/17	17/18	18/19	19/20+	Total	Funding Agency
E&P (PA&ED)									Notes:
PS&E									
R/W									
CON									
<b>TOTAL</b>									

05-Salinas-2

## ATP Engineer's Checklist for Infrastructure Projects

### Required for "Infrastructure" applications ONLY

This application checklist is to be used by the engineer in "responsible charge" of the preparation of this ATP application to ensure all of the primary elements of the application are included as necessary to meet the CTC's requirements for a PSR-Equivalent document (per CTC's ATP Guidelines and CTC's Adoption of PSR Guidelines - Resolution G-99-33) and to ensure the application is free of critical errors and omissions; allowing the application to be accurately ranked in the statewide ATP selection process.

#### Special Considerations for Engineers before they Sign and Stamp this document attesting to the accuracy of the application:

*Chapter 7; Article 3; Section 6735 of the Professional Engineer's Act of the State of California requires engineering calculation(s) or report(s) be either prepared by or under the responsible charge of a licensed civil engineer. Since the corresponding ATP Infrastructure-application defines the scope of work of a future civil construction project and requires complex engineering principles and calculations which are based on the best data available at the time of the application, the application must be signed and stamped by a licensed civil engineer.*

*By signing and stamping this document, the engineer is attesting to this application's technical information and engineering data upon which local agency's recommendations, conclusions, and decisions are made. This action is governed by the Professional Engineer's Act and the corresponding Code of Professional Conduct, under Sections 6775 and 6735.*

The following checklist is to be completed by the engineer in "responsible charge" of defining the projects Scope, Cost and Schedule per the expectations of the CTC's PSR Equivalent. The checklist is expected to be used during the preparation of the documents, but not initialed and stamped until the final application and application attachments are complete and ready for submission to Caltrans.

1. **Vicinity map /Location map** Engineer's Initials: vae
  - a. The project limits must be clearly depicted in relationship to the overall agency boundary
  
2. **Project layout-plan/map** showing existing and proposed conditions must: Engineer's Initials: vae
  - a. Be to a scale which allows the visual verification of the overall project "construction" limits and limits of each primary element of the project
  - b. Show the full scope of the proposed project, including any non-participating construction items
  - c. Show all changes to existing motorized/non-motorized lane and shoulder widths. Label the proposed widths
  - d. Show agency's right of way (ROW) lines when permanent or temporary ROW impacts are possible. (As appropriate, also show Caltrans', Railroad, and all other government agencies ROW lines)
  
3. **Typical cross-section(s)** showing existing and proposed conditions. Engineer's Initials: vae  
*(Include cross-section for each controlling configuration that varies significantly from the typical)*
  - a. Show and dimension: changes in lane widths, ROW lines, side slopes, etc.
  
4. **Detailed Engineer's Estimate** Engineer's Initials: vae
  - a. Estimate is reasonable and complete.
  - b. Each of the main project elements are broken out into separate construction items. The costs for each item are based on calculated quantities and appropriate corresponding unit costs
  - c. All non-participating costs in relation to the ATP funding are clearly identified and accounted for separately from the eligible costs.
  - d. All project elements the applicant intends to utilize the CCC (or a certified community conservation corps) on need to be clearly identified and accounted for
  - e. All project development costs to be funded by the ATP need to be accounted for in the total project cost

05-Salinas-2

5. **Crash/Safety Data, Collision maps and Countermeasures:**

Engineer's Initials: RR

- a. Confirmation that crash data shown occurred within influence area of proposed improvements.

6. **Project Schedule and Requested programming of ATP funding**

Engineer's Initials: RR

- a. All applicants must anticipate receiving federal ATP funding for the project and therefore the project schedules and programming included in the application must account for all applicable requirements and timeframes.
- b. "Completed Dates" for project Milestone Dates shown in the application have been reviewed and verified
- c. "Expected Dates" for project Milestone Dates shown in the application account for all reasonable project timetables, including: Interagency MOUs, Caltrans agreements, CTC allocations, FHWA authorizations, federal environmental studies and approvals, federal right-of-way acquisitions, federal consultant selections, project permits, etc.
- d. The fiscal year and funding amounts shown in the PPR must be consistent with the values shown in the project cost estimate(s), expected project milestone dates and expected matching funds.

7. **Warrant studies/guidance (Check if not applicable)**

Engineer's Initials: RR

- N/A a. For new Signals - Warrant 4, 5 or 7 must be met (CA MUTCD): Signal warrants must be documented as having been met based on the CA MUTCD

8. **Additional narration and documentation:**

Engineer's Initials: RR

- a. The text in the "Narrative Questions" in the application is consistent with and supports the engineering logic and calculations used in the development of the plans/maps and estimate
- b. When needed to clarify non-standard ATP project elements (i.e. vehicular roadway widening necessary for the construction of the primary ATP elements); appropriate documentation is attached to the application to document the engineering decisions and calculations requiring the inclusion of these non-standard elements.

**Licensed Engineer:**

Name (Last, First):

Title:

Engineer License Number

Signature: Robert Russell

Date:

Email:

Phone:

**Engineer's Stamp:**





**Project Improvements**

- 1 Alvin Drive from Main Street to Kip Drive Roadway Safety Improvements**

  - Road Diet (one lane in the westbound direction and two lanes in the eastbound direction)
  - Buffered bike lanes
- 2 Alvin Drive at McKinnon Street Crosswalk Enhancement**

  - High visibility ped. school crossings
- 3 Alvin Drive from Kip Drive to Natividad Road Gap Closure**

  - Road Diet (one lane in each direction with center turn lane)
  - Buffered bike lanes
- 4 Alvin Drive at Linwood Drive Crosswalk Enhancements**

  - Curb bulb-outs on both sides of the crossing
  - High visibility ped. school crossing
- 5 Alvin Drive at Lasson Avenue Crosswalk Enhancements**

  - Curb bulb-outs on both sides of the crossing
  - High visibility ped. school crossing
  - Street lighting
- 6 Alvin Drive at El Dorado Drive Intersection Safety Improvements**

  - Roundabout (or Traffic Signal)
  - Curb bulb-outs
- 7 Alvin Drive at Modoc Avenue Crosswalk Enhancements**

  - Curb bulb-outs on both sides of the crossing
  - Median ped. refuge island
  - High visibility ped. school crossing
  - Street lighting
- 8 Linwood Drive from Alvin Drive to Rainier Drive Gap Closure**

  - Bike lanes
  - Bike lane signage
- 9 Linwood Drive at Rainier Drive Crosswalk Enhancement**

  - High visibility ped. school crossings on the north and south sides of the intersection
- 10 Linwood Drive from Rainier Drive to Laurel Drive Gap Closure**

  - Buffered bike lanes

- 11 Linwood Drive at Sequoia Street Crosswalk Enhancements**

  - Installation of ADA ramps at missing locations
  - Ramp updates at non-compliant locations
- 12 Chaparral Street from Maryal Drive to Linwood Drive Bicycle Connection Enhancements**

  - Sharrows
  - Bike route signage
- 13 Maryal Drive from Chaparral Street to Laurel Drive Gap Closure**

  - Sharrows
  - Bike route signage
- 14 Maryal Drive from Laurel Drive to Bernal Drive Gap Closure**

  - Buffered Bike Lanes
  - Sidewalk, curb, and gutter on the west side of the roadway

**LEGEND**

**Bicycle Facilities (per City of Salinas Bicycle Plan)**

	<b>Existing</b>		<b>Proposed</b>	Class I Bike Path (Physically separate from automobile traffic)
	<b>Existing</b>		<b>Proposed</b>	Class II Bike Lane (Painted lane on street marked by signs)
	<b>Existing</b>		<b>Proposed</b>	Class III Bike Route (On street, marked by signs)

**Public Transportation**

-  Existing Transit Stop

**Bicycle Facilities Proposed (as part of grant project)**

-  Class II Bike Lane with buffer
-  Class II Bike Lane
-  Class III Bike Route with sharrows

**Points of Interest**

-  School
-  Parks & Other Points of Interest

**Pedestrian Facilities (as part of grant project)**

-  Existing Crosswalk Location to be Enhanced (7)
-  ADA Ramp Installation Locations (19)
-  Existing Non-Compliant ADA Ramp Locations to be Updated (3)

\*Existing and proposed typical cross-sections including lane and right-of-way widths are included in Attachment K.





Photos of Existing Conditions

Attachment F

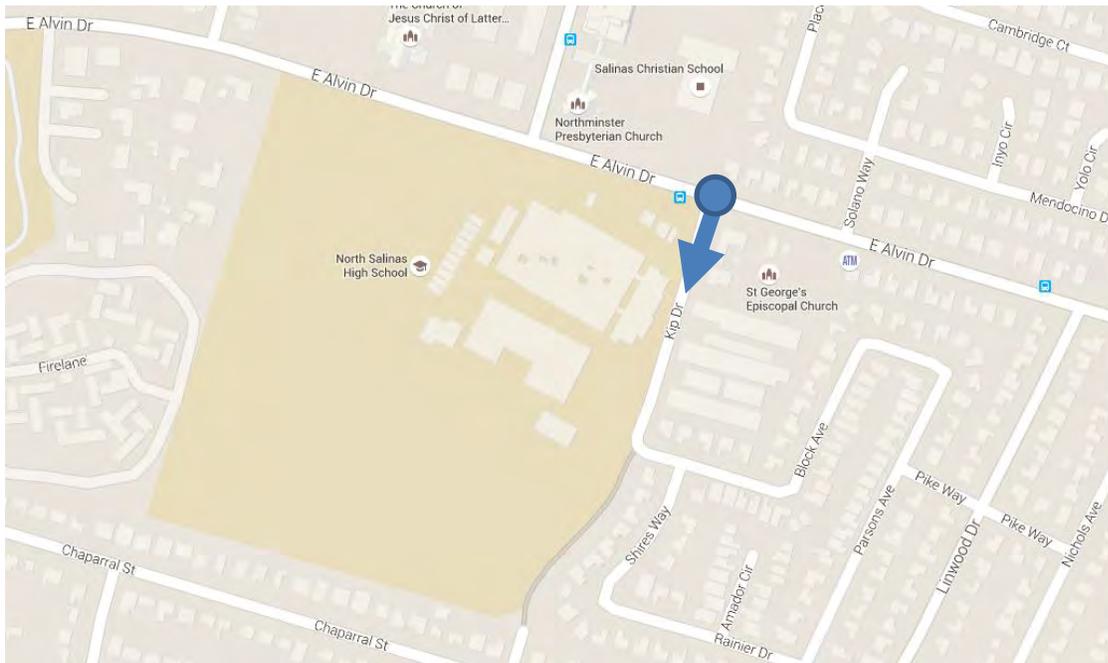


Photo 1 Kip Dr, looking south. North Salinas High School to the right.

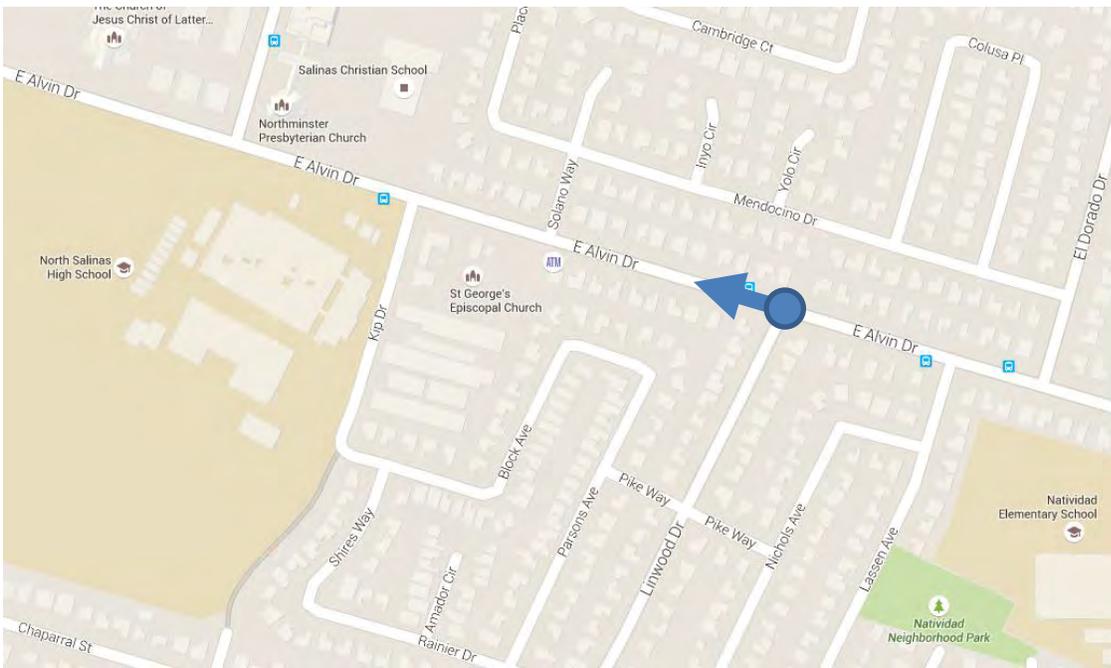


Photo 2 Alvin Dr at Linwood Dr, looking west.

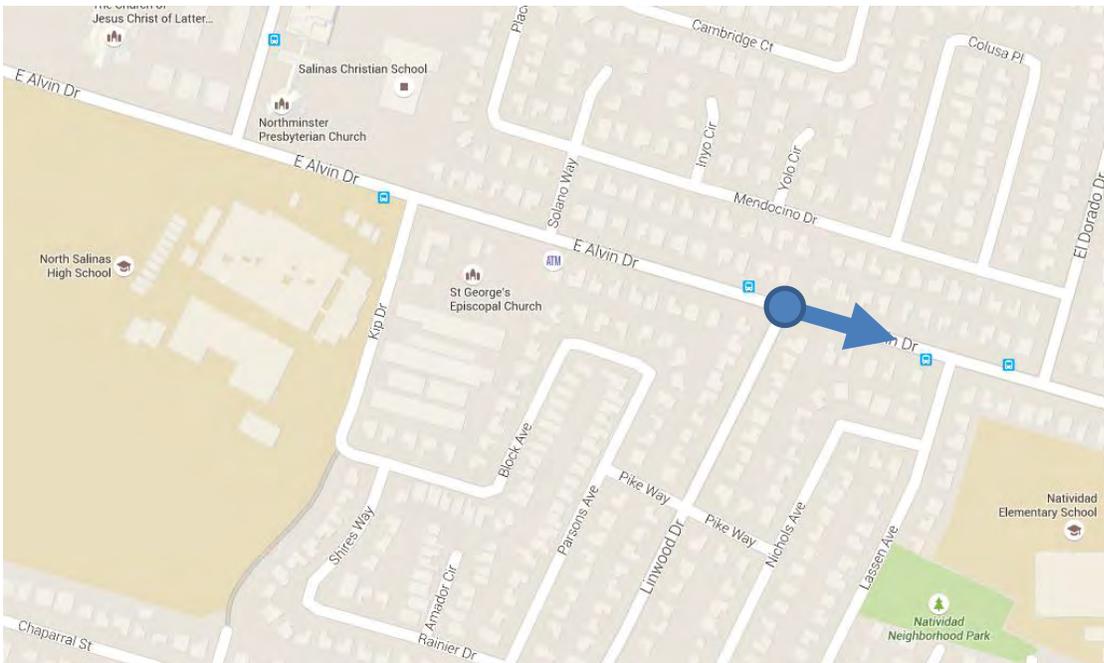


Photo 3 Alvin Dr at Linwood Dr, looking east.

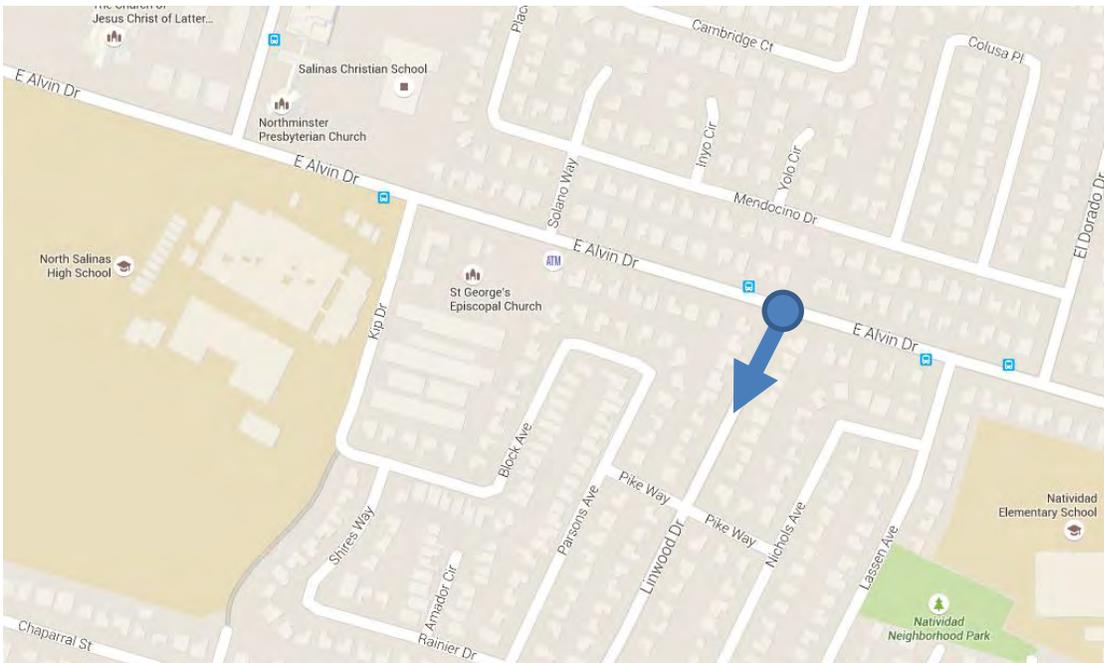


Photo 4 Linwood Dr at Alvin Dr, looking south.

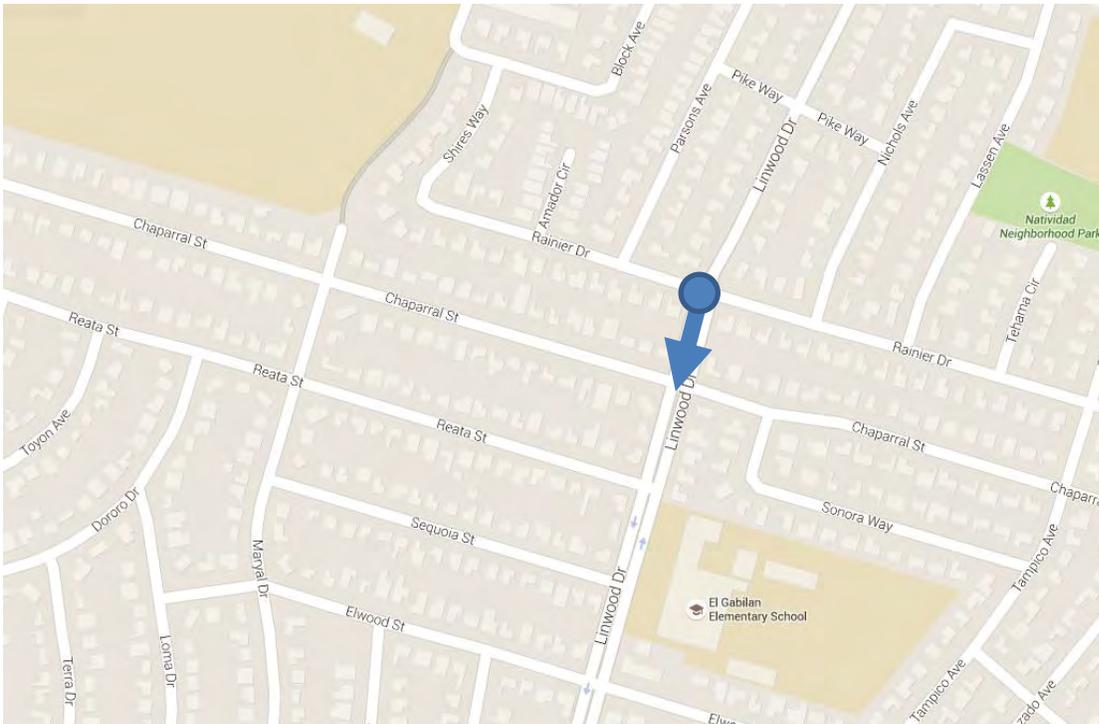


Photo 5 Linwood Dr at Rainier Dr, looking south.

Detailed Engineer's Estimate and Total Project Cost															
<b>Important: Read the Instructions in the other sheet (tab) before entering data. Do not enter in shaded fields (with formulas).</b>															
Project Information:															
Agency:	Salinas														
Application ID:	05-Salinas-2			Prepared by:	Kimley-Horn				Date:	5/22/2015					
Project Description:	The project improves & adds bicycle and pedestrian facilities along Alvin Drive, Linwood Drive, Chaparral Drive, and Maryal Drive with the implementation of road diets, buffered bike lanes and sharrows, and pedestrian crossing and ramp enhancements.														
Project Location:	The project is located within Salinas city limits along Alvin Drive, Linwood Drive, Chaparral Drive, and Maryal Drive, fronting North Salinas High, Natividad Elementary, El Gabilan Elementary, and Madonna del Sasso Schools.														
Engineer's Estimate and Cost Breakdown:															
Engineer's Estimate (for Construction Items Only)						Cost Breakdown									
						<b>Note: Cost can apply to more than one category. Therefore may be over 100%.</b>									
						ATP Eligible Items		Landscaping		Non-Participating Items		To be Constructed by Corps/CCC			
Item No.	Item	Quantity	Units	Unit Cost	Total Item Cost	%	\$	%	\$	%	\$	%	\$		
1	Mobilization/Demobilization		1 LS	\$ 100,000.00	\$100,000	100%	\$100,000								
2	Traffic Control		1 LS	\$ 90,000.00	\$90,000	100%	\$90,000								
3	Water Pollution Control		1 LS	\$ 40,000.00	\$40,000	100%	\$40,000								
4	Clearing and Grubbing		1 LS	\$ 35,000.00	\$35,000	100%	\$35,000								
5	Excavation / Grading		1 LS	\$ 65,000.00	\$65,000	100%	\$65,000								
6	Surveying/Construction Staking		1 LS	\$ 60,000.00	\$60,000	100%	\$60,000								
7	Concrete Sidewalk	7,500	SF	\$ 7.50	\$56,250	100%	\$56,250								
8	Demolish and Install Concrete Pedestrian Curb Ramp	17	EA	\$ 10,000.00	\$170,000	100%	\$170,000								
9	Type A Concrete Median Passageway	3	EA	\$ 4,000.00	\$12,000	100%	\$12,000								
10	Modify Concrete Pedestrian Curb Ramp	3	EA	\$ 10,000.00	\$30,000	100%	\$30,000								
11	Driveway Apron	120	SF	\$ 15.00	\$1,800	100%	\$1,800								
12	Concrete Curb for Medians	320	LF	\$ 40.00	\$12,800	100%	\$12,800								
13	Concrete Curb and Gutter	2,700	LF	\$ 50.00	\$135,000	100%	\$135,000								
14	Concrete Pavers	250	SF	\$ 40.00	\$10,000	100%	\$10,000								
15	Asphalt Concrete Pavement	450	TON	\$ 125.00	\$56,250	100%	\$56,250								
16	Crushed Aggregate Base	900	TON	\$ 45.00	\$40,500	100%	\$40,500								
17	Vehicular Concrete for Truck Apron	1,200	SF	\$ 15.00	\$18,000	100%	\$18,000								
18	Landscaping	1	LS	\$ 10,000.00	\$10,000	100%	\$10,000	100%	\$10,000			100%	\$10,000		
19	Signing and Striping	1	LS	\$ 90,000.00	\$90,000	100%	\$90,000								
20	Sandblasting	6800	LF	\$ 2.50	\$17,000	100%	\$17,000								
21	Lighting	1	LS	\$ 100,000.00	\$100,000	100%	\$100,000								
22	Relocate existing luminaire	2	EA	\$ 2,500.00	\$5,000	100%	\$5,000								
23	Retaining Wall	1000	SF	\$ 50.00	\$50,000	100%	\$50,000								
24	Private Improvement Restoration	1	LS	\$ 15,000.00	\$15,000	100%	\$15,000								
25	Material Testing	1	LS	\$ 20,000.00	\$20,000	100%	\$20,000								
26	Hydromodification/ Stormwater	1	LS	\$ 250,000.00	\$250,000	100%	\$250,000								
27	Demolition	1	LS	\$ 60,000.00	\$60,000	100%	\$60,000								
28	Type II Slurry Seal	97000	SY	\$ 1.60	\$155,200	100%	\$155,200								
29	Public Relations	1	LS	\$ 35,000.00	\$35,000	100%	\$35,000								
<b>Subtotal of Construction Items:</b>						<b>\$1,739,800</b>		<b>\$1,739,800</b>		<b>\$10,000</b>			<b>\$10,000</b>		
<b>Construction Item Contingencies (% of Construction Items):</b>				<b>20.00%</b>	<b>\$347,960</b>										
<b>Enter in the cell to the right</b>															
<b>Total (Construction Items &amp; Contingencies) cost:</b>						<b>\$2,087,760</b>									
Project Cost Estimate:															
Type of Project Delivery Cost										Cost \$					
<b>Preliminary Engineering (PE)</b>															
Environmental Studies and Permits(PA&ED):										\$	50,000				
Plans, Specifications and Estimates (PS&E):										\$	471,940				
<b>Total PE:</b>										<b>\$</b>	<b>521,940</b>	<b>25.00%</b>	25% Max		
<b>Right of Way (RW)</b>															
Right of Way Engineering:										\$	2,000				
Acquisitions and Utilities:										\$	40,000				
<b>Total RW:</b>										<b>\$</b>	<b>42,000</b>				
<b>Construction (CON)</b>															
Construction Engineering (CE):										\$	307,000			<b>12.82%</b>	15% Max
Total Construction Items & Contingencies:										\$2,087,760					
<b>Total CON:</b>										<b>\$</b>	<b>2,394,760</b>				
<b>Total Project Cost Estimate:</b>										<b>\$</b>	<b>2,958,700</b>				

**ATTACHMENT H**  
**(NOT USED)**

Prepared by NDS/ATD

Volumes for: Wednesday, February 25, 2015 City: Salinas Project #: 15-7156-001 Bicycles

Location: Alvin Drive between Kip Drive & Linwood Drive

Start Time	Eastbound		Hour Totals		Westbound		Hour Totals		Combined Totals	
	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon
12:00	0	0			0	0				
12:15	0	1			0	1				
12:30	0	0			0	1				
12:45	0	0	0	1	0	0	0	2	0	3
1:00	0	0			0	0				
1:15	0	0			0	0				
1:30	0	0			0	1				
1:45	0	0	0	0	0	0	0	1	0	1
2:00	0	0			0	0				
2:15	0	0			0	2				
2:30	0	0			0	2				
2:45	0	0	0	0	0	1	0	5	0	5
3:00	0	2			0	1				
3:15	0	0			0	0				
3:30	0	3			0	1				
3:45	0	0	0	5	0	0	0	2	0	7
4:00	0	0			0	0				
4:15	0	1			0	1				
4:30	0	0			0	0				
4:45	0	1	0	2	0	0	0	1	0	3
5:00	0	0			0	0				
5:15	0	1			0	0				
5:30	0	0			0	0				
5:45	0	0	0	1	0	0	0	0	0	1
6:00	0	1			0	0				
6:15	0	0			0	2				
6:30	0	0			1	1				
6:45	0	1	0	2	0	0	1	3	1	5
7:00	2	2			0	0				
7:15	0	1			0	0				
7:30	0	0			0	0				
7:45	0	0	2	3	0	0	0	0	2	3
8:00	0	0			0	0				
8:15	1	1			0	0				
8:30	0	0			2	0				
8:45	0	0	1	1	0	0	2	0	3	1
9:00	0	1			0	0				
9:15	0	0			1	0				
9:30	0	1			0	0				
9:45	0	0	0	2	0	0	1	0	1	2
10:00	0	0			0	0				
10:15	0	0			0	0				
10:30	0	0			0	0				
10:45	0	0	0	0	1	1	1	1	1	1
11:00	0	0			0	0				
11:15	0	0			1	0				
11:30	0	0			0	0				
11:45	0	0	0	0	0	1	1	1	1	1
<b>Total</b>	<b>3</b>	<b>17</b>	<b>3</b>	<b>17</b>	<b>6</b>	<b>16</b>	<b>6</b>	<b>16</b>	<b>9</b>	<b>33</b>
<b>Combined Total</b>	<b>20</b>		<b>20</b>		<b>22</b>		<b>22</b>		<b>42</b>	
AM Peak	6:15 AM				8:30 AM					
Vol.	2				3					
P.H.F.	0.250				0.375					
PM Peak	2:45 PM				2:15 PM					
Vol.	5				6					
P.H.F.	0.417				0.750					
Percentage	15.0%	85.0%			27.3%	72.7%				

Volumes for: Wednesday, February 25, 2015 City: Salinas Project #: 15-7156-001 Pedestrian

Location: Alvin Drive between Kip Drive & Linwood Drive

Start Time	Eastbound		Hour Totals		Westbound		Hour Totals		Combined Totals	
	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon
12:00	0	0			0	6				
12:15	0	2			0	1				
12:30	0	2			0	0				
12:45	0	0	0	4	0	0	0	7	0	11
1:00	0	0			0	0				
1:15	0	2			0	1				
1:30	0	3			0	2				
1:45	0	1	0	6	0	0	0	3	0	9
2:00	0	5			0	0				
2:15	0	1			0	0				
2:30	0	0			0	9				
2:45	0	2	0	8	0	1	0	10	0	18
3:00	0	60			0	2				
3:15	0	9			0	0				
3:30	0	17			0	0				
3:45	0	11	0	97	0	1	0	3	0	100
4:00	0	2			0	3				
4:15	0	2			0	1				
4:30	0	6			0	2				
4:45	0	3	0	13	0	2	0	8	0	21
5:00	0	1			0	0				
5:15	0	2			0	1				
5:30	0	3			0	5				
5:45	0	4	0	10	0	1	0	7	0	17
6:00	0	1			0	2				
6:15	0	3			0	1				
6:30	0	1			1	0				
6:45	0	1	0	6	1	0	2	3	2	9
7:00	6	1			1	0				
7:15	1	0			3	0				
7:30	0	0			5	0				
7:45	5	0	12	1	4	0	13	0	25	1
8:00	3	0			4	0				
8:15	4	0			6	0				
8:30	1	1			5	0				
8:45	1	0	9	1	35	0	50	0	59	1
9:00	2	0			16	1				
9:15	2	0			8	0				
9:30	1	0			12	0				
9:45	2	0	7	0	5	0	41	1	48	1
10:00	1	0			2	0				
10:15	2	0			1	0				
10:30	2	0			0	0				
10:45	2	0	7	0	2	0	5	0	12	0
11:00	0	0			2	0				
11:15	1	0			0	0				
11:30	0	0			2	0				
11:45	0	0	1	0	4	0	8	0	9	0
<b>Total</b>	<b>36</b>	<b>146</b>	<b>36</b>	<b>146</b>	<b>119</b>	<b>42</b>	<b>119</b>	<b>42</b>	<b>155</b>	<b>188</b>
<b>Combined Total</b>	<b>182</b>		<b>182</b>		<b>161</b>		<b>161</b>		<b>343</b>	
AM Peak	7:45 AM				8:45 AM					
Vol.	13				71					
P.H.F.	0.650				0.507					
PM Peak	3:00 PM				2:15 PM					
Vol.	97				12					
P.H.F.	0.404				0.333					
Percentage	19.8%	80.2%			73.9%	26.1%				

Prepared by NDS/ATD

Volumes for: Wednesday, February 25, 2015 City: Salinas Project #: 15-7156-001 Vehicles

Location: Alvin Drive between Kip Drive & Linwood Drive

Start Time	Eastbound		Hour Totals		Westbound		Hour Totals		Combined Totals	
	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon
12:00	6	80			14	123				
12:15	9	96			7	99				
12:30	7	109			8	97				
12:45	11	115	33	400	10	108	39	427	72	827
1:00	5	99			1	101				
1:15	5	94			3	89				
1:30	1	110			3	76				
1:45	7	106	18	409	3	95	10	361	28	770
2:00	5	91			5	100				
2:15	6	108			3	114				
2:30	2	102			2	108				
2:45	5	88	18	389	4	130	14	452	32	841
3:00	7	214			5	145				
3:15	5	136			1	141				
3:30	1	186			3	148				
3:45	1	128	14	664	5	110	14	544	28	1208
4:00	4	125			6	124				
4:15	5	122			8	119				
4:30	4	105			8	131				
4:45	9	115	22	467	11	142	33	516	55	983
5:00	9	120			11	148				
5:15	9	133			16	130				
5:30	15	168			14	143				
5:45	14	133	47	554	16	173	57	594	104	1148
6:00	23	127			29	120				
6:15	21	133			37	133				
6:30	34	122			48	125				
6:45	44	107	122	489	52	122	166	500	288	989
7:00	41	119			39	104				
7:15	79	95			67	71				
7:30	127	86			112	76				
7:45	153	112	400	412	111	77	329	328	729	740
8:00	91	91			99	87				
8:15	89	78			122	80				
8:30	108	72			102	65				
8:45	129	79	417	320	160	48	483	280	900	600
9:00	128	82			144	47				
9:15	80	61			120	38				
9:30	126	39			119	33				
9:45	93	42	427	224	81	30	464	148	891	372
10:00	68	36			78	37				
10:15	74	34			83	22				
10:30	58	30			58	18				
10:45	75	18	275	118	88	18	307	95	582	213
11:00	56	21			88	17				
11:15	85	16			91	10				
11:30	68	19			96	10				
11:45	88	18	297	74	107	5	382	42	679	116
<b>Total</b>	<b>2090</b>	<b>4520</b>	<b>2090</b>	<b>4520</b>	<b>2298</b>	<b>4287</b>	<b>2298</b>	<b>4287</b>	<b>4388</b>	<b>8807</b>
<b>Combined Total</b>	<b>6610</b>		<b>6610</b>		<b>6585</b>		<b>6585</b>		<b>13195</b>	
AM Peak	8:45 AM				8:45 AM					
Vol.	463				543					
P.H.F.	0.897				0.848					
PM Peak	3:00 PM				5:00 PM					
Vol.	664				594					
P.H.F.	0.776				0.858					
Percentage	31.6%	68.4%			34.9%	65.1%				

Volumes for: Wednesday, February 25, 2015 City: Salinas Project #: 15-7156-002 Bikes  
 Location: Linwood Drive north of Laurel Drive

Start Time	Northbound		Hour Totals		Southbound		Hour Totals		Combined Totals	
	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon
12:00	0	1			0	0				
12:15	0	0			0	2				
12:30	0	0			0	0				
12:45	0	0	0	1	0	2	0	4	0	5
1:00	0	0			0	0				
1:15	0	0			0	0				
1:30	0	1			0	0				
1:45	0	0	0	1	0	0	0	0	0	1
2:00	0	0			0	0				
2:15	0	0			0	0				
2:30	0	0			0	0				
2:45	0	0	0	0	0	0	0	0	0	0
3:00	0	1			0	1				
3:15	0	0			0	0				
3:30	0	0			0	1				
3:45	0	0	0	1	0	0	0	2	0	3
4:00	0	0			0	0				
4:15	0	0			0	0				
4:30	0	0			0	1				
4:45	0	0	0	0	0	0	0	1	0	1
5:00	0	0			0	0				
5:15	0	0			0	0				
5:30	0	0			0	0				
5:45	0	0	0	0	0	0	0	0	0	0
6:00	0	0			0	0				
6:15	0	0			0	1				
6:30	0	0			0	0				
6:45	0	0	0	0	0	0	0	1	0	1
7:00	0	0			0	0				
7:15	0	0			0	0				
7:30	0	0			0	0				
7:45	0	0	0	0	0	0	0	0	0	0
8:00	0	0			0	0				
8:15	0	0			0	0				
8:30	0	0			0	0				
8:45	0	0	0	0	0	0	0	0	0	0
9:00	0	0			0	0				
9:15	0	0			0	0				
9:30	0	0			0	0	0			
9:45	0	0	0	0	0	0	0	0	0	0
10:00	0	1			0	1				
10:15	0	0			0	0				
10:30	0	0			0	0				
10:45	0	0	0	1	0	0	0	1	0	2
11:00	0	0			0	0				
11:15	0	0			0	0				
11:30	0	0			0	0				
11:45	0	0	0	0	1	0	1	0	1	0
<b>Total</b>	<b>0</b>	<b>4</b>	<b>0</b>	<b>4</b>	<b>1</b>	<b>9</b>	<b>1</b>	<b>9</b>	<b>1</b>	<b>13</b>
<b>Combined Total</b>	<b>4</b>		<b>4</b>		<b>10</b>		<b>10</b>		<b>14</b>	
AM Peak	11:15 AM				11:30 AM					
Vol.	1				3					
P.H.F.	0.250				0.375					
PM Peak		12:00 PM				12:00 PM				
Vol.		1				4				
P.H.F.		0.250				0.500				
Percentage	0.0%	100.0%			10.0%	90.0%				

Volumes for: Wednesday, February 25, 2015 City: Salinas Project #: 15-7156-002 Pedestrian  
 Location: Linwood Drive north of Laurel Drive

Start Time	Northbound		Hour Totals		Southbound		Hour Totals		Combined Totals	
	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon
12:00	0	2			0	2				
12:15	1	1			0	6				
12:30	0	0			0	3				
12:45	0	0	1	3	0	2	0	13	1	16
1:00	0	0			0	0				
1:15	0	0			0	0				
1:30	0	2			0	0				
1:45	0	6	0	8	0	0	0	0	0	8
2:00	0	5			0	0				
2:15	0	3			0	27				
2:30	0	1			0	10				
2:45	0	1	0	10	0	0	0	37	0	47
3:00	0	1			0	1				
3:15	0	0			0	3				
3:30	0	2			0	5				
3:45	0	1	0	4	0	2	0	11	0	15
4:00	0	1			0	0				
4:15	0	0			0	0				
4:30	0	0			0	0				
4:45	0	0	0	1	0	0	0	0	0	1
5:00	0	0			0	4				
5:15	0	0			0	0				
5:30	0	0			0	0				
5:45	0	0	0	0	0	0	0	4	0	4
6:00	0	2			0	0				
6:15	0	0			0	2				
6:30	0	0			0	0				
6:45	0	0	0	2	1	0	1	2	1	4
7:00	0	0			0	0				
7:15	4	0			0	0				
7:30	13	0			3	0				
7:45	12	0	29	0	5	0	8	0	37	0
8:00	2	0			6	0				
8:15	0	0			3	0				
8:30	2	0			1	0				
8:45	6	0	10	0	4	0	14	0	24	0
9:00	0	0			0	0				
9:15	1	0			1	0				
9:30	4	0			3	0	0			
9:45	1	0	6	0	1	0	5	0	11	0
10:00	1	0			1	0				
10:15	0	0			0	0				
10:30	0	0			0	0				
10:45	3	0	4	0	1	1	2	1	6	1
11:00	3	0			3	0				
11:15	0	0			1	0				
11:30	1	0			1	0				
11:45	1	0	5	0	0	1	5	1	10	1
<b>Total</b>	<b>55</b>	<b>28</b>	<b>55</b>	<b>28</b>	<b>35</b>	<b>69</b>	<b>35</b>	<b>69</b>	<b>90</b>	<b>97</b>
<b>Combined Total</b>	<b>83</b>		<b>83</b>		<b>104</b>		<b>104</b>		<b>187</b>	
AM Peak	7:15 AM				7:30 AM					
Vol.	31				17					
P.H.F.	0.596				0.708					
PM Peak	1:30 PM				2:15 PM					
Vol.	16				38					
P.H.F.	0.750				0.352					
Percentage	66.3%	33.7%			33.7%	66.3%				

Volumes for: Wednesday, February 25, 2015 City: Salinas Project #: 15-7156-002 Vehicles  
 Location: Linwood Drive north of Laurel Drive

Start Time	Northbound		Hour Totals		Southbound		Hour Totals		Combined Totals	
	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon	Morning	Afternoon
12:00	5	51			3	47				
12:15	3	36			2	49				
12:30	7	36			4	49				
12:45	1	39	16	162	3	54	12	199	28	361
1:00	3	43			2	51				
1:15	8	48			1	46				
1:30	1	51			4	31				
1:45	6	55	18	197	1	41	8	169	26	366
2:00	1	73			3	45				
2:15	1	59			1	87				
2:30	2	47			1	46				
2:45	1	52	5	231	0	47	5	225	10	456
3:00	1	78			2	92				
3:15	3	79			3	80				
3:30	3	56			13	60				
3:45	1	58	8	271	5	61	23	293	31	564
4:00	1	69			2	61				
4:15	0	75			10	58				
4:30	4	66			8	61				
4:45	2	90	7	300	17	64	37	244	44	544
5:00	2	115			15	49				
5:15	8	86			14	54				
5:30	7	98			22	65				
5:45	1	75	18	374	18	71	69	239	87	613
6:00	11	77			17	58				
6:15	10	66			32	42				
6:30	13	71			44	53				
6:45	15	55	49	269	33	56	126	209	175	478
7:00	22	57			37	43				
7:15	29	40			47	30				
7:30	68	39			69	35				
7:45	82	42	201	178	88	35	241	143	442	321
8:00	37	40			101	41				
8:15	42	36			60	27				
8:30	38	41			59	18				
8:45	39	28	156	145	66	14	286	100	442	245
9:00	33	29			71	21				
9:15	25	27			39	16				
9:30	35	26			37	22	0			
9:45	24	18	117	100	47	12	194	71	311	171
10:00	28	14			47	12				
10:15	24	32			33	12				
10:30	24	9			31	8				
10:45	32	12	108	67	45	6	156	38	264	105
11:00	18	16			45	4				
11:15	28	6			35	5				
11:30	41	16			39	5				
11:45	55	6	142	44	53	4	172	18	314	62
<b>Total</b>	<b>845</b>	<b>2338</b>	<b>845</b>	<b>2338</b>	<b>1329</b>	<b>1948</b>	<b>1329</b>	<b>1948</b>	<b>2174</b>	<b>4286</b>
<b>Combined Total</b>	<b>3183</b>		<b>3183</b>		<b>3277</b>		<b>3277</b>		<b>6460</b>	
AM Peak	7:30 AM				7:30 AM					
Vol.	229				318					
P.H.F.	0.698				0.787					
PM Peak	4:45 PM				3:00 PM					
Vol.	389				293					
P.H.F.	0.820				0.796					
Percentage	26.5%	73.5%			40.6%	59.4%				



Weekly

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## Barriers to Children Walking to or from School --- United States, 2004

Walking for transportation is part of an active lifestyle that is associated with decreased risks for heart disease, diabetes, hypertension, and colon cancer and an increased sense of well being (1). However, the percentage of trips made by walking has declined over time among both children (2) and adults (3). One of the objectives of *Healthy People 2010* (no. 22-14b) is to increase among children and adolescents the proportion of trips to school made by walking from 31% to 50% (4). In 1969, approximately half of all schoolchildren walked or bicycled to or from school, and 87% of those living within 1 mile of school walked or bicycled (5). Today, fewer than 15% of children and adolescents use active modes of transportation (2). This report examines data from the 2004 ConsumerStyles Survey and a follow-up recontact survey to describe what parents report as barriers to their children aged 5--18 years walking to or from school. Distance to school was the most commonly reported barrier, followed by traffic-related danger. Comprehensive initiatives that include behavioral, environmental, and policy strategies are needed to address these barriers to increase the percentage of children who walk to school.

The ConsumerStyles and recontact surveys are conducted annually by a market-research firm with technical assistance from CDC. For the ConsumerStyles survey, stratified random sampling (by region, household income, population density, age, and household size) was used to identify 10,000 potential respondents from a larger consumer-mail panel of approximately 600,000 adults aged  $\geq 18$  years. A low income/minority supplement and a households-with-children supplement were used to ensure adequate numbers of respondents from those groups. Of the 10,000 identified, 6,207 responded to the initial survey (62% response rate). The recontact survey was mailed to all respondents within 4--6 months of the initial survey and had a 68% response rate (N = 4,213). For that survey, parents of children aged 5--18 years were asked how many times their youngest child walks to or from school during a usual week and whether one or more of six barriers (too dangerous because of traffic, too dangerous because of crime, live too far away, no protection from the weather, the school does not allow it, and other reasons) prevents that child from walking to school. Results were weighted to reflect the age, race/ethnicity, sex, income, and household size of the U.S. adult population, as determined by the 2000 U.S. Census.

Of the 1,705 adults who reported having a child aged 5--18 years, 1,588 (93%) answered the walk-to-school questions for their youngest child. Approximately 17% reported that their child walked to or from school at least once per week during a usual week. Among students who walked to school, the average number of trips per week to or from school was 7.1 (range: 1--10). The percentage of students who walked to or from school was higher among those aged 5--11 years than among those aged 12--18 years (18.7% versus 15.3%); this difference was not significant ( $p = 0.08$ ).

The most commonly reported barrier was distance to school (61.5%), followed by traffic-related danger (30.4%), then weather (18.6%). Fifteen percent of parents cited an "other" barrier, 11.7% reported crime as a barrier, and 6.0% reported school policy as a barrier; 15.9% (95% CI = 14.1%--18.0%) of parents selected the response, "It is not difficult for my child to walk to school." The frequency with which barriers were reported by parents varied slightly by age (5--11 years versus 12--18 years), although the relative ranking of the barriers did not differ by age ([Table](#)). Barriers also varied by walking status (walker versus nonwalker), with the largest difference observed for distance (72.9% [CI = 70.1%--75.5%] versus 6.8% [CI = 4.5%--10.4%]) ([Figure](#)).

**Reported by:** *S Martin, S Carlson, Div of Nutrition and Physical Activity, National Center for Chronic Disease Prevention and Health Promotion, CDC.*

### Editorial Note:

In this study, distance to school was the most commonly cited barrier to walking to and from school. A similar study conducted in 1999 ([6](#)) also found distance to be the most commonly cited barrier (55%). This finding might be attributable, in part, to an increase of 2 million students from 1969 to 2001 with a corresponding decrease in the number of schools, from 70,879 in 1969 to 69,697 in 2001 ([7](#)). As a result, a greater percentage of students might live farther than 1 mile from their schools.

Study results also indicated that students aged 5--11 years were more likely to walk to school than were those aged 12--18 years; however, this difference was not significant. One possible reason for this difference is that elementary schools are likely to be closer to children's homes because they outnumber junior and senior high schools in the United States (more than 70,000 elementary schools compared with approximately 28,000 junior and senior high schools) ([7](#)). This hypothesis is supported by the finding that parents of older children more frequently cited distance as a barrier, whereas parents of younger children more frequently cited other barriers.

The findings in this report are subject to at least three limitations. First, the data are subject to sampling biases because data could be collected only from parents who chose to respond to the survey. Second, because the age of each respondent's youngest child was derived from the ConsumerStyles survey, which was mailed 4--6 months earlier, some of the children's ages might have been misclassified. Finally, the survey did not ask parents how far the child lived from school, about whether the child attended a public or private school, or about the presence of sidewalks.

Efforts to overcome barriers to walking to school include the nationwide Safe Routes to School (SR2S) initiative, which has received federal and state funding. SR2S programs are designed to increase the percentage of students who walk or bicycle to school by addressing barriers through the "four Es" (engineering, enforcement, education, and encouragement). For example, to address the distance barrier, schools can arrange for children to meet within a mile of school and proceed to school in "walking school buses," in which an adult "driver" and an adult "caboose" escort several children walking together. This strategy might also alleviate fear of crime. To address the traffic barrier, programs might use engineering and enforcement approaches, such as crossing signals (engineering) and better enforcement of speed limits (enforcement). To further allay parental fears of traffic danger, programs might teach children pedestrian skills in the classroom (education). For example, one comprehensive SR2S program in Marin County, California, that uses all of the "four Es" experienced a 64% increase in walking and a 114% increase in bicycling by the second year of their program ([8](#)). The SR2S program in Tempe, Arizona, has made engineering improvements to enhance pedestrian safety and has promoted walking through an annual Walk to School Day, in which more than 8,000 students from 20 elementary schools participate. The program has contributed to a decrease in automobile traffic near elementary schools during morning and afternoon rush hours ([9](#)). Implementing SR2S programs and removing or alleviating barriers that prevent children from walking to school might foster progress toward achieving the national health objective. Information about programs and resources related to SR2S is available at <http://www.cdc.gov/nccdphp/dnpha/kidswalk/index.htm>, <http://www.walktoschool-usa.org>, <http://www.walkingschoolbus.org>, and <http://www.nhtsa.dot.gov/people/injury/pedbimot/bike/safe-routes-2004>.

### References

1. US Department of Health and Human Services. Physical activity and health: a report of the Surgeon General. Atlanta, GA: US Department of Health and Human Services, CDC; 1996.
2. US Environmental Protection Agency. Travel and environmental implications of school siting. Washington, DC: US Environmental Protection Agency; 2003. Available at [http://www.epa.gov/smartgrowth/pdf/school\\_travel.pdf](http://www.epa.gov/smartgrowth/pdf/school_travel.pdf).
3. US Department of Transportation, Federal Highway Administration. Summary of travel trends: 2001 National Household Transportation Survey. Washington, DC: US Department of Transportation; 2004. Available at <http://nhts.ornl.gov/2001/pub/STT.pdf>.
4. US Department of Health and Human Services. Healthy people 2010: understanding and improving health. 2nd ed. Washington, DC: US Department of Health and Human Services; 2000. Available at <http://www.health.gov/healthypeople>.
5. US Department of Transportation, Federal Highway Administration. 1969 National Personal Transportation Survey: travel to school. Washington, DC: US Department of Transportation; 1972. Available at <http://www.fhwa.dot.gov/ohim/1969/q.pdf>.
6. CDC. Barriers to children walking and biking to school---United States, 1999. *MMWR* 2002;51:701--4.
7. US Department of Education, National Center for Education Statistics. Digest of education statistics, 2003. Washington, DC: US Department of Education; 2004. Available at <http://nces.ed.gov/programs/digest/d03/index.asp>.
8. Staunton CE, Hubsmith D, Kallins W. Promoting safe walking and biking to school: the Marin County success story. *Am J Public Health* 2003;93:1431--4.
9. IWALK Steering Committee. Tempe transit/pedestrian program. Chapel Hill, NC: Pedestrian and Bicycle Information Center, University of North Carolina. Available at [http://www.iwalktoschool.org/award\\_app\\_template.cfm?ID=121](http://www.iwalktoschool.org/award_app_template.cfm?ID=121).

## Table

TABLE. Percentage of parents reporting barriers to their youngest child walking to or from school, by barrier and age of child — United States, 2004

Barrier	5–11 years*		12–18 years <sup>§</sup>		Total <sup>¶</sup>	
	%	(95% CI <sup>†</sup> )	%	(95% CI)	%	(95% CI)
Too dangerous because of traffic	37.0	(33.5–40.7)	20.7	(17.8–23.9)	30.4	(27.9–33.0)
Too dangerous because of crime	14.2	(11.5–17.4)	8.1	(6.3–10.3)	11.7	(9.9–13.8)
Live too far away	58.3	(54.6–61.9)	66.1	(62.3–69.6)	61.5	(58.8–64.1)
No protection from the weather	20.4	(17.5–23.6)	16.0	(13.4–18.9)	18.6	(16.5–20.8)
The school does not allow it	7.3	(5.5–9.5)	4.3	(3.0–6.1)	6.0	(4.9–7.5)
Other reasons	17.0	(14.2–20.1)	12.4	(10.1–15.2)	15.1	(13.2–17.3)

\* n = 894.

<sup>†</sup> Confidence interval.

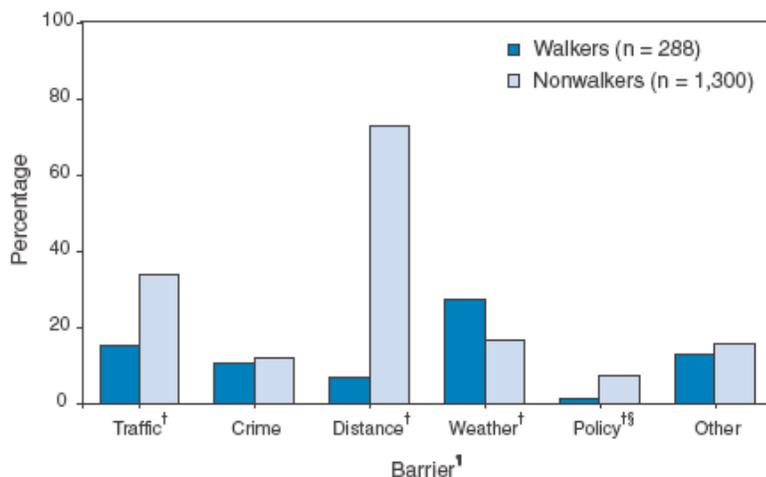
<sup>§</sup> n = 694.

<sup>¶</sup> N = 1,588.

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Figure

**FIGURE. Percentage of parents (N = 1,588) reporting barriers to their youngest child walking to or from school, by walkers versus nonwalkers\* — United States, 2004**



\* Walkers were defined as students who walked to or from school at least once per week. Nonwalkers were those who walked to school zero times per week.

<sup>†</sup> Significant difference between walkers and nonwalkers ( $p < 0.05$ ).

<sup>§</sup> Coefficient of variation is  $> 0.30$  for the walker estimate.

<sup>¶</sup> Traffic = too dangerous because of traffic; Crime = too dangerous because of crime; Distance = student lives too far from school; Weather = no protection from the weather; Policy = school does not allow students to walk to or from school.

### [Return to top.](#)

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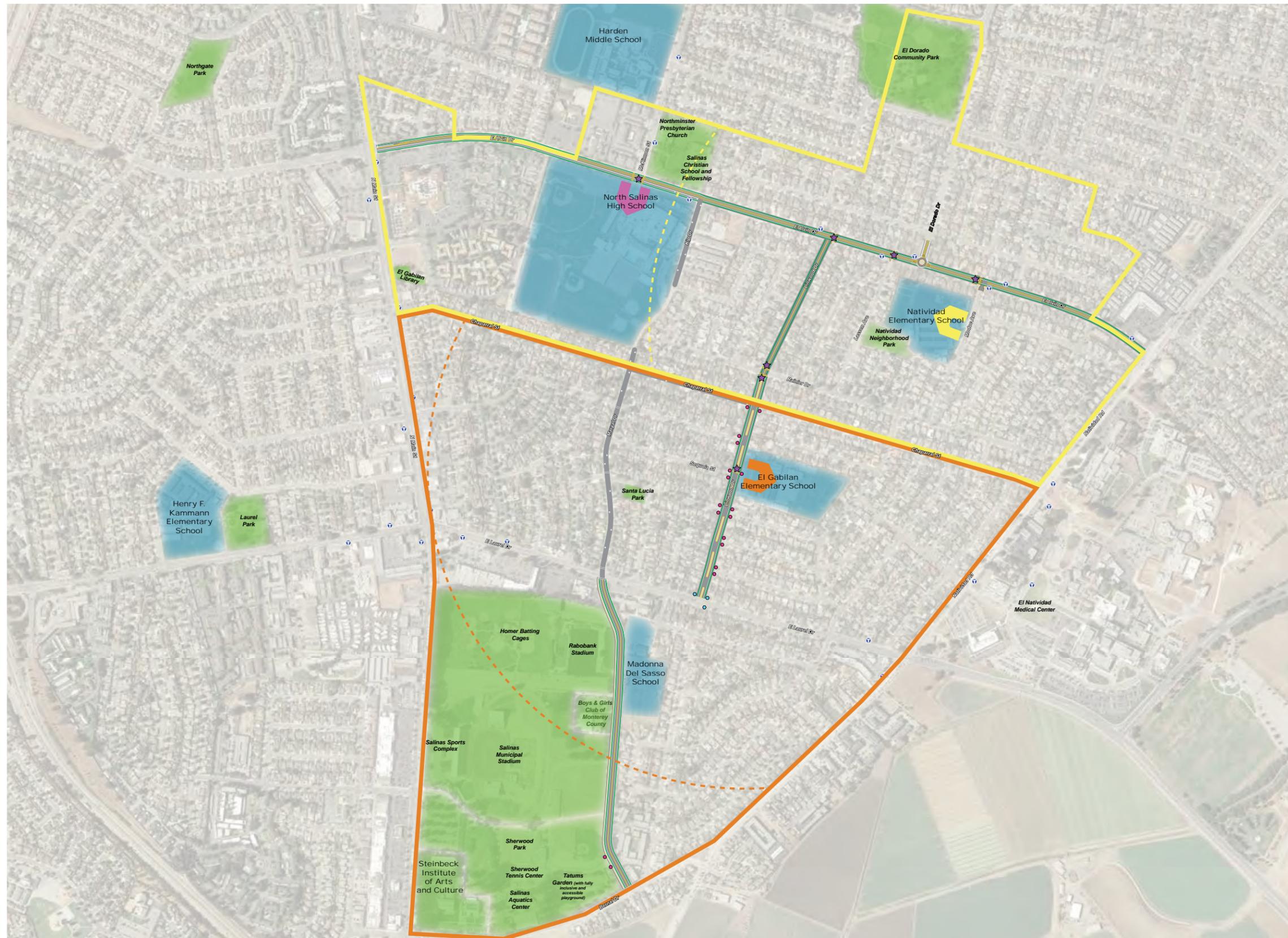
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Date last reviewed: 9/29/2005

Salinas ATP Grants



**LEGEND**

**Public Transportation**

- Existing Transit Stop

**Bicycle Facilities Proposed (as part of grant project)**

- Class II Bike Lane with buffer
- Class II Bike Lane
- Class III Bike Route with sharrows

**Points of Interest**

- School
- Parks & Other Points of Interest

**Pedestrian Facilities (as part of grant project)**

- Existing Crosswalk Location to be Enhanced
- Proposed New Crosswalk Location
- ADA Ramp Installation Locations
- Existing Non-Compliant ADA Ramp Locations to be Updated

**School Enrollment Boundaries**

- El Gabilan Elementary School Enrollment Area
- Natividad Elementary School Enrollment Area

**Active Transportation Project Service Areas**

- El Gabilan Elementary School Estimated Walking Radius (0.5 mi)
- Natividad Elementary School Estimated Walking Radius (0.5 mi)

\*Estimated Biking Radius (3 mi) for Both Schools Exceeds Enrollment Area

Not to Scale

Complete document can be found at:  
<http://www.ci.salinas.ca.us/documents.cfm>

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*City of*  
**Salinas**



**General Plan**

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- Small parks should be distributed throughout the neighborhood;
- Schools should lie within the neighborhood and be easily accessible and within walking distance;
- When not adjacent to agricultural operations, which may require a variety of buffering techniques, the neighborhood edge should be bordered by either a natural corridor or the edge of an adjacent neighborhood across a pedestrian-friendly boulevard; and
- Front yard setbacks should decrease from neighborhood edge to neighborhood center.

**Policy CD-3.2:** Establish and maintain the Central City (i.e., downtown area) as the business, government, dining, lodging, cultural, and entertainment center of Salinas.

**Policy CD-3.3:** Maintain a compact Central City core that minimizes distances between most residential units, offices, stores and restaurants.

**Policy CD-3.4:** Actively encourage mixed-use development in order to provide a greater spectrum of housing near businesses, alternative modes of transportation and other activity areas.

**Policy CD-3.5:** Promote high-density residential development and mixed-use (commercial, office, and residential together) in the Central City to the extent consistent with the area's architectural and historical character.

**Policy CD-3.6:** Provide and maintain a pedestrian-friendly atmosphere by encouraging "pedestrian zones" with increased land-scaping, use of traffic-calming techniques on local streets, adequate separation from automobile traffic and the inclusion of amenities such as lighted crosswalks and increased lighting along sidewalks.

Community Design Element

**Policy CD-3.7:** Provide sufficient, conveniently located public parking in the Central City to support a pedestrian business district.

**Policy CD-3.8:** Promote the use of alternative modes of transportation, including bus, rail, bicycling and walking.

**Policy CD-3.9:** Group neighborhood shopping centers, schools, civic and recreational uses, parks, and public transit opportunities together in new neighborhoods to create an activity center focal point for the neighborhoods they serve.

*Related Goals and Policies*

The goals and policies described in the Community Design Element are related to and support subjects included within other General Plan elements. In turn, many goals and policies from other elements directly or indirectly support the goals and policies of the Community Design Element. The primary supporting policies are identified in Table CD-1, although this list is not exhaustive of all related policies.

**Table CD-1  
Related Goals and Policies by Element**

General Plan Element	Community Design Element Issue Areas		
	Image and Identity	Community Preservation and Enhancement	Community Livability
Land Use	2.1, 2.3, 2.4	1.4, 2.6, 3.7	1.1, 1.3, 1.4, 2.4, 2.5, 11.1, 11.2, 11.3, 11.4, 11.5
Housing		1.6, 2.1, 2.2, 2.3, 2.4, 2.5, 2.6, 2.7, 2.8, 2.9	1.1, 1.2, 1.3, 1.4, 1.5, 1.8, 1.9, 1.10, 3.3, 3.4
Conservation/Open Space	3.1, 3.2, 3.3, 3.4	4.1, 4.2, 4.3, 4.4	3.1, 5.1, 6.3, 6.4, 7.1, 7.2, 7.11, 7.12, 8.5, 8.6
Circulation		1.1, 1.8, 3.2, 5.1	1.1, 1.9, 2.5, 2.6, 2.7, 3.2, 3.4, 4.1, 4.2, 4.3, 4.4, 4.5, 4.6, 4.7, 5.1, 5.2, 5.4
Safety		1.2, 2.1, 2.2, 2.3	1.2, 1.3, 1.4, 2.1, 2.2, 2.3
Noise		1.1, 1.2, 1.4, 2.1, 2.2, 3.1	

### Transportation System and Demand Management

The efficiency of the circulation system will be maximized with transportation control measures (TCM), including transportation system management (TSM) and transportation demand management (TDM) strategies. TSM involves physical improvements to the circulation infrastructure to expand capacity and increase traffic flow while TDM involves reducing the demand for vehicular transportation. AMBAG's Commute Alternatives program and Monterey-Salinas transit are both examples of TDM. In addition to enhancing the operation of the circulation system, TSM and TDM strategies provide relief from increasing demands for more improvements to transportation facilities.

Traffic signal coordination and intersection capacity improvements will be implemented as needed to improve traffic flow.

Traffic fees for traffic impacts of new development will be collected by the City according to a revised fee schedule. The City will support the implementation of the TCM provisions of the Monterey Bay Unified Air Pollution Control District Air Quality Management Plan and participate in regional efforts to implement TCM requirements. Programs to increase transit ridership and use of non-vehicular transportation, such as walking and bicycling, will be actively pursued.

### Transportation Financing

Implementing circulation improvements to accommodate planned growth will require financing. Funding for transportation improvements is available from local, state, and federal sources. The City will identify available funding sources and establish a financing plan to guide construction and funding of transportation system improvements.

Circulation improvements to accommodate new development projects will be constructed and/or funded in whole or in part by project proponents. Fees will be collected for traffic impacts of new development in accordance of a revised fee program.

### Public Transportation Needs

One of the key components of the Circulation Plan is to promote the use of alternative modes of transportation such as transit, bicycling, and walking. Increasing the use of alternative transportation modes will produce a number of community benefits including reduced traffic, less

*Bicycle Access*

A comprehensive bicycle system is an important factor in creating a pedestrian friendly community, as discussed in the Community Design Element. The existing bicycle network in Salinas consists of over 55 miles of Class I, II, or III bikeways, which cover significant portions of North, South, and East Salinas. Once future improvements are completed in accordance with the Bikeways Plan, there will be a total of approximately 85 miles of bikeways. Figure C-8 depicts existing and planned bikeways in Salinas. Once completed, the bikeway network will connect every neighborhood to the downtown, as well as to employment, shopping, cultural, educational, and recreational facilities. The City will work to identify additional funding to implement the Bikeway Plan.

*Pedestrian Access*

Sidewalks will be located throughout the City to provide pedestrian access. The City will continue to require new development and redevelopment/revitalization projects to provide pedestrian facilities within the project, such as sidewalks. Pedestrian walkway connections will be required to provide access to major destinations within the project, as well as to other locations within the community, such as recreational and community facilities. The City will also continue to identify those areas within the existing community that would benefit from improved pedestrian facilities, as well as identifying funding to provide needed facilities.

## Circulation Implementation Program

*Responsible Agency/Department:* Community Development, Public Works, MST  
*Funding Source:* General Fund, state and federal funds, development fees  
*Time Frame:* Ongoing  
*Related Policies:* 3.1, 3.2, 3.3, 3.4

**C-11**  
**Intermodal Transportation Center**  
 Continue to compete for additional federal and state funding to provide more amenities at the Intermodal Transportation Center and encourage use of public transit.

*Responsible Agency/Department:* Community Development, Public Works, Redevelopment Agency, MST  
*Funding Source:* General Fund, state and federal funds,  
*Time Frame:* Ongoing  
*Related Policies:* 2.7, 2.8

**Bicycle Access**

**C-12**  
**Salinas Bikeways Plan**  
 Continue to implement the Salinas Bikeways Plan by applying for additional funding and requiring developers to assist in the provision of the needed facilities.

*Responsible Agency/Department:* Public Works  
*Funding Source:* General Fund, state and federal funds, AB 2766 grant program, project proponent  
*Time Frame:* Ongoing  
*Related Policies:* 4.1, 4.2, 4.3, 4.4, 4.5, 4.6, 4.7

**Pedestrian Access**

**C-13**  
**Pedestrian Facilities**  
 Require new development and redevelopment to provide pedestrian facilities within the project and pedestrian connections with major destinations. Identify areas within the existing community that would benefit from improved pedestrian facilities. Explore additional funding sources to provide additional pedestrian facilities.

**Policy C-1.8:** Whenever possible, in reuse/revitalization projects, reduce the number of existing driveways on arterial streets to improve traffic flow.

**Policy C-1.9:** Use traffic calming methods within residential areas where necessary to create a pedestrian-friendly circulation system.

**Policy C-1.10:** Encourage car-pooling, at government offices, business, schools, and other facilities, to reduce the number of vehicles using the roadway system.

**Policy C-1.11:** Continue to enforce traffic laws, including those addressing bicycle and pedestrian traffic, to ensure a circulation system that is safe for motorized, bicycle, and pedestrian traffic.

*Regional  
Transportation*

Traffic congestion in Salinas is directly influenced by an overall transportation network for the region, as traffic generated outside the City passes through the community on Highway 101 and other major roads and highways. In addition, a healthy economy depends on the ability of businesses to move their goods from one location to another. To support the continued success of local businesses, the circulation system must provide adequate local and regional access. Planning for the needs of the community includes recognition of related transportation needs and planning efforts of the neighboring cities, the county, region, and state. With this recognition is the need for the City to actively work with other public agencies responsible for transportation and development in surrounding areas. The following goal and policies address this need to coordinate with other agencies to create a regional circulation system.

**Goal C-2:** **Work with other local and regional agencies to develop regional transit and transportation systems.**

**Policy C-2.1:** Urge a countywide approach to Transportation Demand Management (TDM) and Transportation Systems Management (TSM) as the best way to reduce peak-hour vehicle trips and congestion at major employment centers.

- Policy C-3.1:** Support Monterey-Salinas Transit initiatives to provide adequate and improved (i.e. more frequent availability and use of Intelligent Transportation System measures where appropriate) public transportation service.
- Policy C-3.2:** Design development and reuse/revitalization projects to be transit-oriented to promote the use of alternative modes of transit and support higher levels of transit service.
- Policy C-3.3:** Support the extension of commuter rail to Salinas to allow for alternatives to automobile use.
- Policy C-3.4:** Support public transportation that is “bike” friendly, such as buses with bicycle racks and reduced fares for bicycle riders and provision of bicycle racks at public transportation stations.

#### Bicycle Access

Non-motorized modes of transportation, including bicycling, offer alternatives to driving, providing recreational and commute alternatives for the community. Encouraging bicycling as a means of transportation also helps those who choose to drive automobiles, as every person who chooses to ride a bicycle rather than drive causes fewer motorized vehicles on the road. To promote bicycling, a safe bicycle system should be developed and maintained that connects to key activity centers within the community, and to the regional bicycle route and path system. The following goal and policies are designed to provide a bicycle system to serve all of Salinas.

**Goal C-4:** Provide an extensive, safe public bicycle network that provides on-street as well as off-street facilities.

**Policy C-4.1:** Continue to develop a network of on- and off-street bicycle routes to encourage and facilitate the use of bicycles for commute, recreational, and other trips. Eliminate gaps and provide connections between existing bicycle routes.

- Policy C-4.2:** Increase availability of facilities, such as bike racks and well-maintained and well-lit bike lanes, that promote bicycling.
- Policy C-4.3:** Encourage existing businesses and require new construction to provide on-premise facilities to aid bicycle commuters, such as on-site safe bicycle parking.
- Policy C-4.4:** Improve the biking environment by providing safe and attractive cut-throughs, bike lanes, and bike paths for both recreational and commuting purposes.
- Policy C-4.5:** Where possible, ensure that roadway improvements (i.e., widening and re-striping), as well as new overpasses and underpasses, allow for safe on-street bike lanes or adequate right-lane space for bicycles.
- Policy C-4.6:** Ensure that all pedestrian and bicycle route improvements meet the Americans with Disabilities Act (ADA) standards for accessibility, and Caltrans standards for design.
- Policy C-4.7:** Encourage parking lot designs that provide for safe and secure bicycle parking.

#### Pedestrian Access

Pedestrian transport offers a short-distance alternative means of transportation to automobiles, as well as providing a healthy form of exercise. To promote walking, a safe pedestrian transportation system should be developed and maintained, including safe sidewalks and other pedestrian-oriented facilities.

**Goal C-5:** Provide safe routes to school, work, shopping, and recreation for pedestrians.

**Policy C-5.1:** Increase availability of safe and well-maintained sidewalks in all areas of the City.

**Policy C-5.2:** Encourage all new bus stops and changes in existing bus stops to take pedestrian access into consideration.

**Policy C-5.3:** Ensure that all pedestrian route improvements meet with ADA standards for accessibility.

**Policy C-5.4:** Encourage parking lot designs that promote pedestrian access and safety.

**Policy C-5.5:** Improve the walking environment by providing safe and attractive sidewalks, cut-throughs, and walkways, for both recreational and commuting purposes.

*Related Goals and Policies*

The goals and policies described in the Circulation Element area related to and support subjects included within other General Plan elements. In turn, many goals and policies from the other elements directly or indirectly support the goals and policies of the Circulation Element. The primary supporting goals and policies are identified in Table C-1, although this list is not exhaustive of all related goals and policies.

**Table C-1  
Related Goals and Policies by Element**

General Plan Element	Circulation Element Issue Areas				
	Roadway System Circulation	Regional Transportation	Public Transportation Needs	Bicycle Access	Pedestrian Access
Land Use	1.4, 2.2, 2.5	3.4 , 12.1, 12.2, 12.3, 12.4, 12.5, 12.6	1.4, 9.4, 11.5		
Community Design	1.3, 3.6	3.8	3.8	3.8	3.1, 3.6, 3.7
Housing	1.2		1.10	1.10	1.10
Conservation/Open Space		6.1, 6.3, 6.4	6.4	6.4, 7.12	6.4, 7.12
Safety	2.2, 3.7, 5.2	3.1, 3.7, 3.8, 3.9, 3.10			
Noise	2.1	1.3, 2.2, 2.3			



# City of Salinas



# 2004



# Pedestrian Plan

## INTRODUCTION

On September 17, 2002, the Salinas City Council adopted a new General Plan that set goals and policies for the management of Salinas' future growth. The new General Plan looks to principles of New Urbanism as part of the solution for the projected transportation and land use needs of the City. The Salinas General Plan contains policies that encourage the development of livable communities where walking and bicycling are viable modes of travel.

It is in support of these principles and policies that the 2004 Salinas Pedestrian Plan was developed. Salinas has already completed the third update of the Salinas Bikeways Plan that provides the framework for achieving a 5% increase in bicycle commute trips by 2010. This first iteration of the Salinas Pedestrian Plan sets out to determine goals and strategies that will increase walking in the City and identify actions that need to be taken to achieve a livable community.

### MISSION STATEMENT:

*MAKE WALKING A PREFERRED CHOICE OF TRAVEL BY CREATING A SAFE, CONVENIENT AND PEDESTRIAN-FRIENDLY ENVIRONMENT*

## WHY SHOULD SALINAS PROMOTE WALKING?



Walking is a low cost activity that is available to the vast majority of Salinas' residents, and requires few special skills or equipment. Providing a sidewalk and pathway system throughout the City that connects residential areas with recreational, employment, business and service uses gives a wider range of people, including those without access to a car, the

opportunity to choose walking as a viable way of travel in Salinas. These trips include those to work, to school, or to enjoy the outdoors and escape the pressures of modern living.

### HEALTH BENEFITS

The health benefits of regular physical activity, including walking, are well documented. Regular and moderate exercise has been proven to reduce the risk of developing coronary heart disease, stroke, colon cancer, hypertension, diabetes, osteoporosis, obesity, and depression. Seven million Americans suffer from Coronary Heart Disease (CHD), caused by narrowing the coronary arteries that feed the heart. CHD is the number one killer of both men and women in the United States. Each year more than 500,000 Americans die of heart attacks caused by CHD. Many of these deaths could be prevented because CHD is related to certain aspects of the lifestyle, including high blood pressure, high blood cholesterol, smoking, obesity, and physical inactivity. Walking is an excellent form of exercise. It stimulates and maintains muscular strength and good joint function; involves a large percentage of the body; can be maintained throughout life; and does not provoke hip, knee or other weight bearing injuries.<sup>1</sup>

Given the high rates of chronic disease in Latinos, the Monterey County Health Department (MCHD) conducted a risk factor survey of 1,000 Latinos in 1990 in Monterey County where one of the largest Latino populations in California resides. A second follow-up survey was completed in 2000 with 817 Latino women in and from a community sample and 188 men from a farm labor camp sample. Results showed that the majority of respondents were Mexican

American, young, impoverished, low educated, and medically uninsured; many reported poor health behaviors. Over 60% of respondents from both samples were overweight including over 20% who were obese. Approximately one-third reported no leisure-time physical activity in the past month.<sup>2</sup>

The Surface Transportation Policy Project released a report, "Measuring the Health Effects of Sprawl; a National Analysis of Physical Activity, Obesity and Chronic Disease" in September 2003. The study found that 65% of the American adult population is overweight and almost one in three is obese. Nationally, childhood obesity has reached epidemic proportions; 4.7 million youths, age 6-17, are now considered overweight or obese. Twenty-two percent of American children are now considered obese and that number is doubling every 10 years, while the portion of overweight teens has tripled in the past 25 years.



California law requires school districts to administer physical fitness testing to all 5<sup>th</sup>, 7<sup>th</sup>, and 9<sup>th</sup> grade students annually. In 1990, 80% of the students tested failed to meet the minimum standards to be considered physically fit.<sup>3</sup> The California Center for Public Health Advocacy (CCPHA), analyzed the 2001 California Physical Fitness Test administered to students in the 28<sup>th</sup> Assembly District in California, which includes Salinas and found that 35% of children are overweight; this is among the highest percentages in the state. Overweight children face a greater risk of developing many health problems as well as low self-esteem, poor body image, and symptoms of depression. Physical inactivity and nutrition-related diseases are the second-leading cause of preventable death. These diseases account for 28% of preventable deaths each year, more than AIDS, violence, car crashes, alcohol and drugs combined.<sup>4</sup>



Preliminary studies indicate that the transition from compact neighborhoods to more spread out automobile-dependent communities has meant a decline in everyday physical activity. A

### TRANSPORTATION BENEFITS

Some streets and highways now carry more traffic than they were designed to handle, resulting in congestion, wasted time and energy, increased pollution, and driver frustration. Walking requires less space per traveler than automobiles and the vast majority of Salinas streets include sidewalks or pedestrian facilities to accommodate walking trips. Roadway improvements to accommodate pedestrians and bicycles can also enhance safety for motorists. For example, adding paved shoulders on two-lane roads has been shown to reduce the frequency of run-off-road, head-on, and sideswipe motor vehicle crashes.<sup>8</sup>



Nearly half of all trips people make within their communities can be made easily on foot. The U.S. Department of Transportation, in its 1995 National Bicycling and Walking Study, (NBWS) final report revealed that nearly 50 percent of all personal travel trips are less than 4.8 kilometers (3 miles) long, and personal business trips (doctor visits, household errands, and visits to friends) account for 41.5 percent of all trips.<sup>9</sup> Such personal, short distance trips are well suited to travel by walking. In fact, 55 percent of Americans want to walk more. The Surface Transportation Policy Project conducted a poll in 2003 and found that more Americans would prefer to walk more, rather than drive, to get to specific places or for exercise. The challenge is having the facilities and making the time to actually make the trip by walking.

### QUALITY OF LIFE/SOCIAL BENEFITS

The increase in the level of walking and bicycling due to the creation of these facilities leads to a cleaner environment and a healthier population. Trails and other pathways are also an expression of community pride and character, and in many cases a means of preserving the natural and historical resources of a region.<sup>10</sup> Walking gives better opportunities for social interaction. The recreational



# WALKING IN SALINAS THE PRESENT

## WHO IS WALKING IN SALINAS?

*Everyone.* Everyone is a pedestrian at some time. Even habitual motorists turn into pedestrians when they park their cars.

- The 2002 Census reports that for Salinas, only 2% of all work commute trips made by people 16 years and older were made by foot. This translates to approximately 1,200 people walking to work.



- People who do not own cars depend heavily on walking. In Salinas, for instance 2,863 or 7% of the 38,298 households in 2000 did not have a car.

- Children under sixteen years of age cannot drive, and many Salinas high school students over 16 do not drive or do not have regular access to a car.

- People with disabilities, including many elderly people, rely on walking for mobility because they are not able to drive. The Central Coast Center for Independent Living, a non-profit organization whose purpose is to advance independent living opportunities of all people with disabilities, estimates that 250 of its Salinas clients, who use wheelchairs or can walk, do not have transportation and therefore rely on the pedestrian system.



- Transit users make up another group of pedestrians. The 2002 Census estimates that 1,264 people use the bus system in Salinas on a daily basis to get to work. A

## GOALS AND STRATEGIES

The objective of the first Salinas Pedestrian Plan is to set the goals that will increase walking activity in the City and identify actions that need to be taken to achieve these goals. The plan will be updated periodically (approximately every 5 years) to refine these goals as more information and evaluation of City Pedestrian facilities are available. Future updates will identify pedestrian facilities projects and programs that are needed. The updates are also expected to set or recommend standards for enhancements in pedestrian facilities.

The Goals for the Salinas Pedestrian Plan are:

1. Promote the development and design of pedestrian facilities that are convenient, safe, attractive, comfortable, interesting, and interconnected to provide continuity of travel
2. Reduce the number of pedestrian-related accidents in Salinas
3. Condition New Development to install appropriate streets, sidewalks, pedestrian access ramps, traffic calming measures, lighting and related facilities to encourage walking
4. Develop a Traffic Calming Policy to address vehicular speeds in residential areas
5. Develop a Suggested Routes to School Program for all elementary schools in Salinas
6. Educate the general public to increase the number of overall walking trips within Salinas
7. Identify needs of walking districts or areas to increase walking trips

**GOAL 1: PROMOTE THE DEVELOPMENT AND DESIGN OF PEDESTRIAN FACILITIES THAT ARE DIRECT, SAFE, ATTRACTIVE, COMFORTABLE, INTERESTING, AND INTERCONNECTED TO PROVIDE CONTINUITY OF TRAVEL**

**Strategy 1: Provide direct pedestrian connections by developing a completely integrated sidewalk and shared-use trail system.**

- Identify the locations and interfaces between the sidewalk network, regional/linear parks and other shared-use trails. Promote linkages between these systems.
- Promote retrofitting existing streets to add sidewalks and pedestrian access ramps at curb returns, and seek funding for their construction.
- Promote the concept of interconnecting pathways and walkways as a way to improve neighborhood safety and encourage longer walking trips.
- Promote the concept of using transit to bridge or connect walking districts.

**Strategy 2: Promote pedestrian friendly land use planning and development.**

- Create development standards and Zoning Code requirements that promote pedestrian, bicycle and transit use.
- Develop a uniform set of standards for the design and construction of pedestrian facilities (Zoning Code and Salinas Design Standard updates).
- Provide direct, safe pedestrian access from neighborhoods to adjoining shopping centers, retail areas, park facilities, and schools.
- Monitor other uses of the sidewalk area, such as landscaping and cafes, to ensure they support rather than obstruct a continuous pedestrian network.
- Locate signal poles, signs, utility appurtenances and related facilities so they do not conflict with safe pedestrian circulation and access for the mobility impaired.
- Design and support traffic calming measures on local streets to reduce vehicular speeds and potential conflicts with alternative modes of transportation.

**Strategy 3: Construct all pedestrian facilities in compliance with American with Disabilities Act (ADA) standards, AASHTO guidelines, and City policies/requirements.**

- Construct new pedestrian facilities conforming to City Standards and Title24/ADA requirements.

## THE SALINAS CITY CODE

Adopted City policies to promote walkability in Salinas include the following:

Salinas Design Standards and Standard Specification (1985), sets the standard for public improvements within the City of Salinas. Part II Design Standards Improvement Policy for Subdivisions and Unimproved Streets section B states:

*Concrete sidewalks shall be constructed in all residential, industrial and commercial developments, unless designated otherwise by separate agreement. Sidewalks in commercial areas shall extend from the curb to a line not more than one foot from the property line. Residential sidewalks shall be minimum four feet in width and shall be located one foot from the property line, except where permitted per Standard Plan No.2 and when the property line is under nine feet, in which case, the sidewalks shall be increased to 5.5 feet wide, and located adjacent to the curb. Sidewalks fronting schools, churches and similar locations within residential areas with high pedestrian traffic may be constructed to either residential or commercial standards. Unless otherwise approved by the City Engineer, 5.5 foot sidewalks adjacent to the curb shall be installed in industrial areas. Handicapped access ramps shall be constructed within sidewalk areas at curb return and other locations per City requirements.*



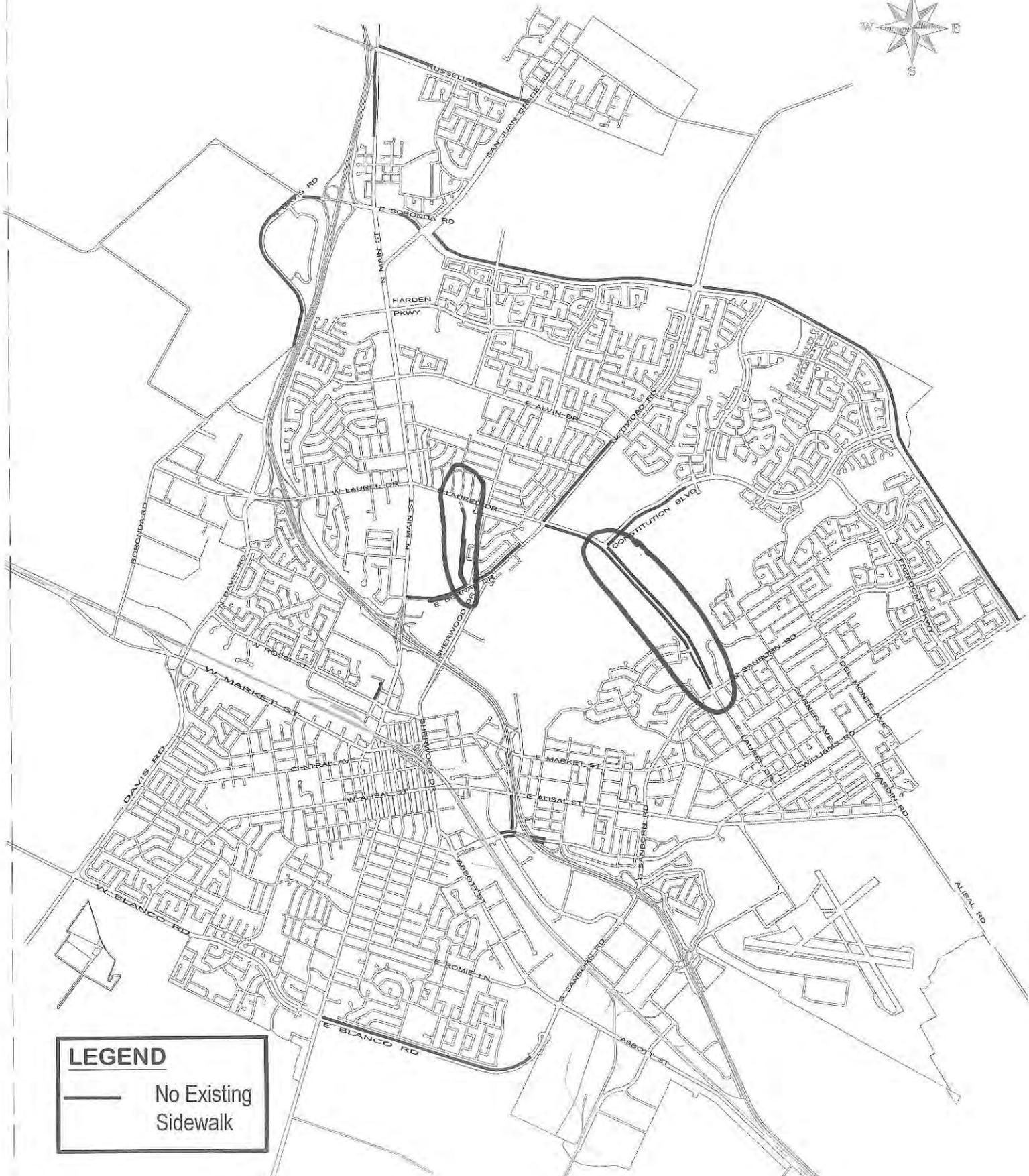
The City Design Standards and Standard Specifications are being updated to conform to most recent City design guidelines and Title 24/ADA requirements. Council approval is expected in 2004.

# CITY OF SALINAS

## Areas With No Sidewalks 2004

I-1C.02

05-Salinas-2



**LEGEND**

— No Existing Sidewalk

# ***SALINAS BIKEWAYS PLAN***

***2002***



***CITY OF SALINAS***

City Police enforcement efforts to uphold bicycle-related traffic laws is another activity that supports safe bicycling practices; and these efforts have been limited due to other Departmental and community priorities. A goal for the upcoming two years is to increase enforcement efforts within the City: especially helmet use.

## H. CITIZEN AND COMMUNITY INVOLVEMENT

The Salinas Bikeways Plan was prepared in close coordination with the Salinas Bicycle and Pedestrian Advisory Committee (SBPAC), who reviewed and made recommendations on each draft of the Plan. The Plan was then subject to public hearings before the Salinas Traffic and Transportation Commission and the Salinas Planning Commission before it was considered by the Salinas City Council.



The SBPAC has been intrinsically involved in the development of this plan and has recommended approval of the plan to the Transportation Agency of Monterey County (TAMC). The SBPAC will also help build widespread community awareness, understanding, and support for the bicycle and pedestrian transportation planning process, and will continually seek to encourage citizens' participation in that process. The SBPAC will also have the continuing task of recommending ways to implement this bikeways plan as well as the RTP's (Regional Transportation Plan) goals and objectives.

## I. CONSISTENCY WITH CITY AND REGIONAL PLANS

The Bikeways Plan implements the following policies and goals of the 2002 Salinas General Plan:

- Promote the use of alternative modes of transportation, including bus, rail, bicycling and walking (*Policy CD-3.8*).
- Support alternative modes of transportation, such as walking, biking and public transit, and develop bike- and pedestrian-friendly neighborhoods to reduce emissions associated with automobile use (*Policy COS-6.4*).
- Provide an extensive, safe public bicycle network that provides on-street as well as off-street parking (*Goal C-4*).

The Salinas Bikeways Plan supports these goals from the General Bikeways Plan for Monterey County:

- Make bicycling on all streets and roads in Monterey County safer and more convenient and pleasurable for everyday transportation to work, to school, on errands, and to transit and rail facilities; as well as for pleasure, recreation, and health.

## PURPOSE OF THE SALINAS BIKEWAYS PLAN



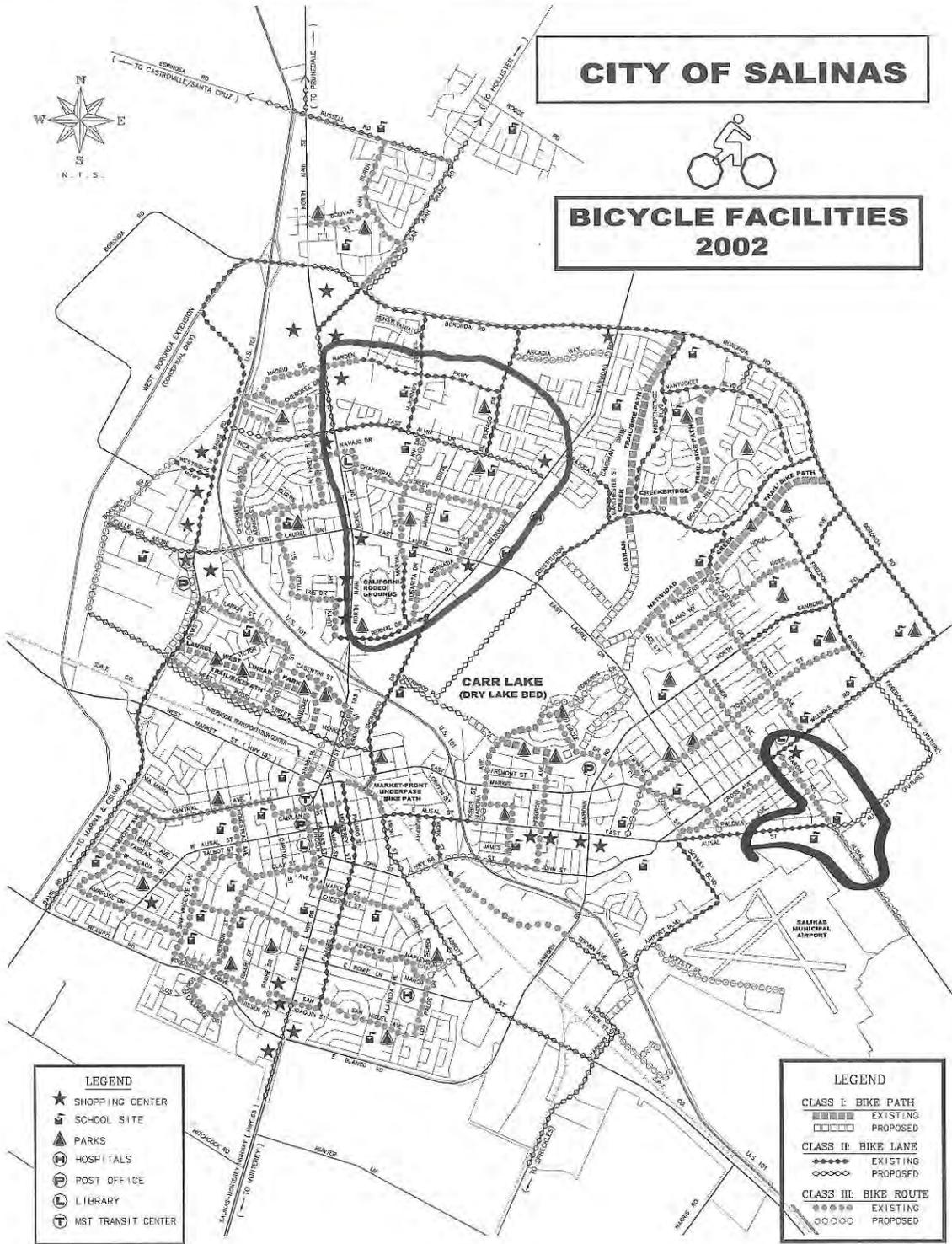
Bicycling has become an important part of Salinas' overall transportation system. In an effort to further improve bicycling opportunities, the City of Salinas developed a comprehensive Salinas Bikeways Plan. The original Bikeways plan was adopted in 1991, and was updated in 1996 and 1998. This Bikeways Plan, which is an update of the 1998 document, was prepared by the Development and Transportation Section of the Salinas Public Works Department under the guidance of the Salinas Bicycle and Pedestrian Advisory Committee (SBPAC). As with the 1998 Plan, both the General Bikeways Plan for Monterey County, and California Department of Transportation (Caltrans) Bikeway Planning and Design guidelines contained in the Highway Design Manual (Chapter 1000) were consulted in preparing this document. This 2002 Bikeways Plan presents revised goals and actions along with maps for identifying the city's existing and proposed bikeways, bike parking facilities, bike support facilities, routes for buses with bike racks, and the design requirements for those facilities. This plan satisfies the General Bikeways Plan requirements set forth by the California Department of Transportation (Section 891.2 of Streets and Highways Code).

With the growing increase of travel in the state and country, emphasis is now being placed on development of facilities and programs to reduce the number of trips being made by single occupant vehicles (SOVs). In an effort to reduce SOV trips, ride sharing and alternative transportation modes are being promoted. Bicycling is one of the cleanest, least expensive, and most efficient means of transportation. It is also a recreational and health opportunity for those who choose this mode of transportation. Bicycling is an especially effective transportation mode for trips of 5 miles or less. In order for bicycling to be effective, however, well designed, convenient, and safe facilities must be made available for bicyclists and integrated into an overall bike network. This plan was prepared to identify and address those needs.

### MISSION STATEMENT

***Make bicycling opportunities in the City of Salinas more available to the bicycling community; provide safe, convenient, connected and enjoyable bikeways for citizens to use; improve bike parking facilities throughout the community to further enhance opportunities; promote safety and education programs; and develop and provide information for all citizens within Salinas to encourage bicycle use.***

# City of Salinas Bikeways Map



## GOALS

- ✱ • Make bicycling in Salinas safe, convenient and pleasurable for daily trips to work, school, errands and other transportation modes as well as for pleasure and recreational trips. Build a network which accommodates bicyclists of all ages and riding levels.
- ✱ • Promote cycling as a safe, healthful, inexpensive, and environmentally benign alternative to auto travel for short trips.
- ✱ • Integrate bikeways, bike facilities, and programs into all planning activities.
  - Encourage development of bicycle safety education and enforcement programs to improve bicycle skills, achieve better compliance with bicycle/traffic laws, and promote safety for all cyclists.
- ✱ • Develop and upgrade bikeways and related facilities to provide improved cycling opportunities, and improve paved surfaces for bicycle use.
  - Provide secure and visible bicycle parking facilities that meet the needs of all bicyclists.
  - Provide improved bicycle facilities connecting north, south and east Salinas.
  - Work with the Monterey County Water Resource Agency to develop bicycle and pedestrian paths along Reclamation Ditch No. 1665 within the City limits.
  - Work with Monterey County Public Works to develop a bicycle facility extending from South Salinas to Spreckles via Harkins Road.
  - Work with the Transportation Agency for Monterey County's Bicycle and Pedestrian Committee to develop a bicycle facility from southwest Salinas to the Monterey Peninsula.
- ✱ • Uniformly apply Caltrans and City design standards and policies that promote safe, convenient and pleasurable bicycle facilities to encourage bicycle travel.
- ✱ • Pursue all available bicycle facility funding opportunities.
  - Remove and/or reduce safety hazards that can be addressed.
  - Increase the bicycle trip rate to 5% of all trips by the year 2010.
  - Pursue a city-wide bicycle and pedestrian safety education program to reach the majority of Salinas elementary school students

## BICYCLING BENEFITS

Bicycling is a mode of travel which has the following benefits:

- It is one of two least environmentally taxing ways to travel.
- Bicycling is the most cost-effective mode of travel next to walking.
- Travel by bicycle is highly energy efficient.
- Bicycling has significant health advantages for the commuter.
- Cycling is a convenient and practical mode for trips of 5 miles or less.
- Bicycling is an enjoyable recreational activity for families.
- The cost of providing bikeways is a fraction of the cost of constructing streets (Bikeways cost 10-25% as much as roadways).

### CLEANER AIR

Over 60% of pollutants (nitrogen oxides, carbon monoxides, hydrocarbons) emitted in a five mile trip occur during the cold start period in the first four minutes of the vehicle's operation.

Shorter car trips are more polluting on a per-mile basis than longer trips. A short, four-mile round trip by bicycle once a week, keeps about 15 pounds/rider/year of pollutants out of the air we breathe (WorldWatch Institute). According to The Green Commuter, a publication of the Clean Air Council, motor vehicle emissions represent 31% of the total carbon dioxide, 81% of carbon monoxide, and 49% of nitrogen oxides released in the U.S. Each year, the average vehicle commuter in Monterey County creates 141 pounds of pollution by commuting an annual average of 3,528 miles. Locally, motor vehicle emissions accounted for 47% of the ozone precursors in the Monterey Bay region by 1997.

The 1990 census found that 42% of all resident Salinas commuters drove less than 15 minutes to work. In addition, nearly 70% of all employed Salinas residents work in Salinas, which means that they would generally have commutes of 5 miles or less (*AMBAG: 1990 Census Transportation Planning Package, State Element*).

If 5% of all Salinas commuters bicycled to work, those riders would avoid emitting 176 tons of emissions into the air each year (*City of Salinas staff estimate*). If the percentage of all trips made within the city by bicycle rose from its current estimated level of 2% to 6%, a 5% reduction in the city's contribution to regional carbon monoxide emissions levels would result.

## **LESS NOISE**

Most of the noise pollution in Salinas is caused by motor vehicles. A bike ride that replaces a car trip effectively removes a car from the road. A reduction in car trips will help to maintain existing noise levels that is sure to rise with increasing auto use. Reduced noise levels would contribute to the community's general health by reducing stress caused by automobile-generated noise and improving the quality of life.

## **REDUCES DEPENDENCE ON NON-RENEWABLE RESOURCES**

Motor vehicle travel consumes three-fourths of all oil and one-half of all energy used in California. These ratios will increase as congestion levels rise and commute distances increase. The average Monterey County commuter uses 182 gallons of fuel each year. Statewide statistics show that each motorist wastes about 43 gallons of motor fuel every year due to traffic congestion or about 25% of all fuel used in commuting. Wasted fuel costs the average motorist \$60 per year. Californians lose 200,000 hours and our state economy loses \$3 million in productivity each year due to traffic congestion.

According to the U.S. Department of Transportation, the increase in the use of bicycles during the 1980's reduced the country's dependence on oil between 16 and 24 million barrels a year. Based on this ratio, Salinas bicycle commuters saved over 2,000 barrels of oil that they would have used in 1997 (*staff estimate*).

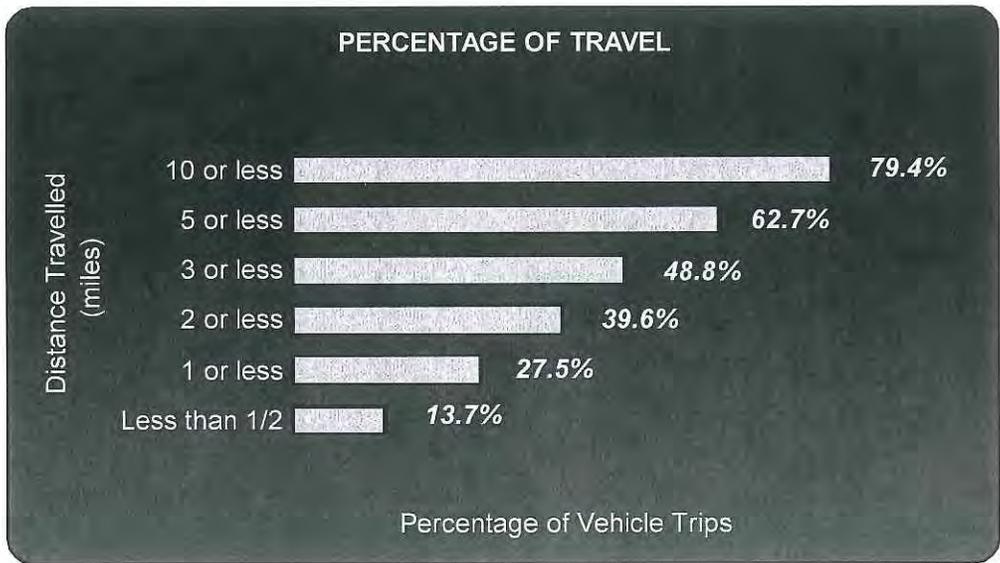
## **PROMOTES GOOD HEALTH**

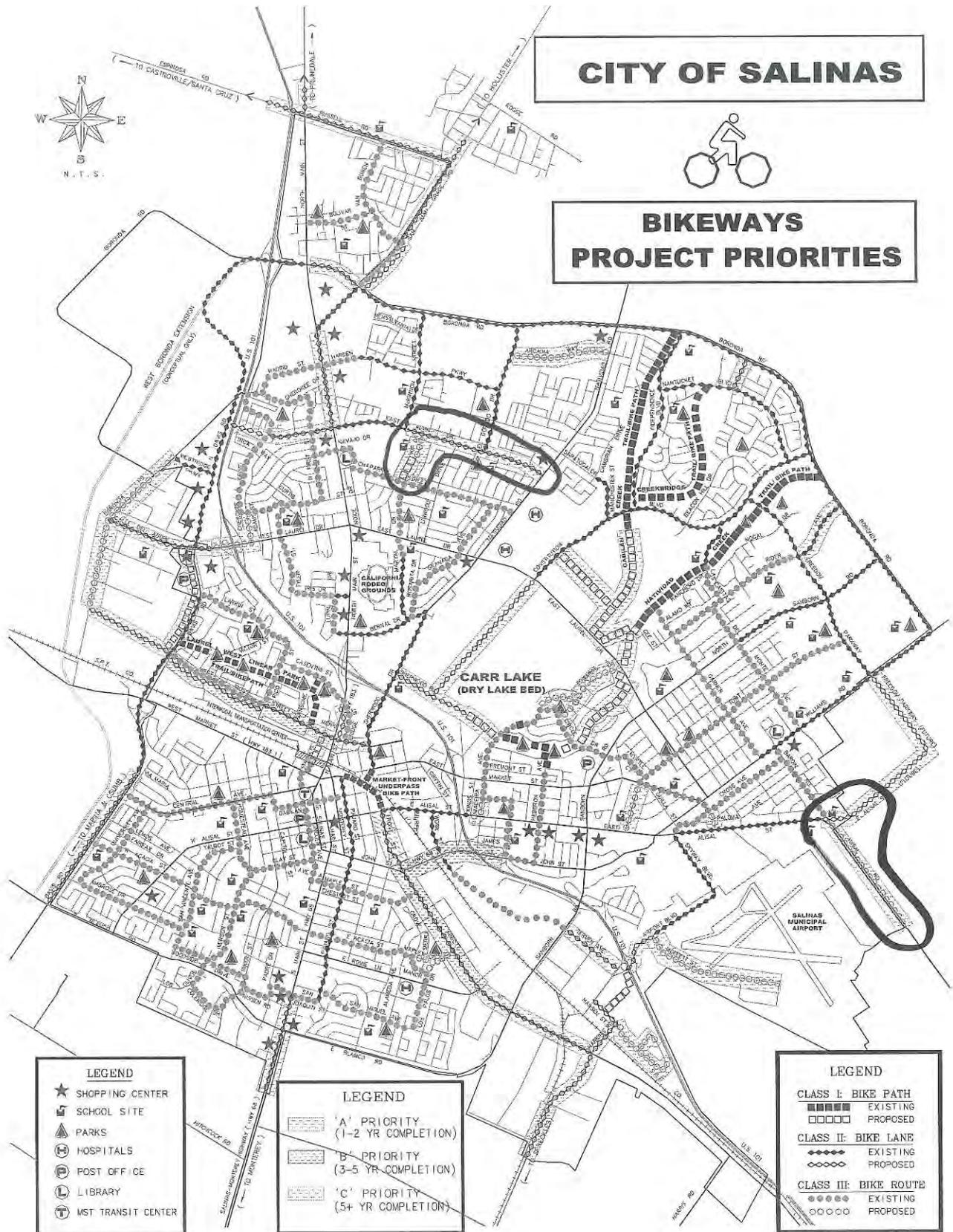
Bicycling has many health benefits including enhancing cardiovascular fitness, lessening body fat, and reducing stress level. Cycling for transport can provide a large proportion of the moderate exercise needed for optimum protection against cardiovascular disease and diabetes, and can be integrated into lifestyles so that little extra time is required. Cycling for transport provides a valuable alternative physical activity to sport. Studies show that bike commuters arrive at work in a better frame of mind, are more productive, and miss work less often (*Facts newsletter*). Cycling at a moderate (9-mph) pace burns 352 calories per hour (*SELF magazine*)



Research conducted in 1999 by the Centers for Disease Control found that "obesity and overweight are linked to the nation's number one killer--heart disease--as well as diabetes and other chronic conditions." The report also states that one reason for Americans' sedentary lifestyle is that "walking and cycling have been replaced by automobile travel for all but the shortest distances." (JAMA Newsletter)

According to the British Medical Journal, the excessive use of motor vehicles severs communities and makes active modes of transport such as walking and cycling more difficult. Yet about 63% of all trips made by car are less than five miles long and are suitable for cycling or walking.





## Alvin Dr Collision Data 2009-2013

Primary Road	Secondary Road	Collision Type	Distance	Direction	Intersection	Pedestrian Involved (Y/N)	Bicycle Involved (Y/N)	Number of Fatalities	Number of Injuries
Collision Data for Year 2009									
E Alvin Dr	Kip Dr	Broadside	0		Y	N	Y	0	1
E Alvin Dr	Marin Ave	Broadside	0		Y	N	N	0	1
N Main St	Alvin Dr	Rear End	0		Y	N	N	0	1
N Main St	E Alvin Dr	Sideswipe	0		Y	N	N	0	1
E Laurel Dr	Linwood Dr	Head-on	0		Y	N	N	0	2
N Main St	E Alvin Dr	Rear End	0		Y	N	N	0	1
N Main St	E Alvin Dr	Rear End	44	S	N	N	N	0	1
Linwood Dr	Elwood St	Broadside	0		Y	N	N	0	1
E Laurel Dr	Linwood Dr	Broadside	500	E	N	N	N	0	1
McKinnon St	Alvin Dr	Head-on	0		Y	N	N	0	1
E Alvin Dr	Kip Dr	Head-on	0		Y	N	N	0	1
E Alvin Dr	Wheeler	Rear End	0		Y	N	N	0	2
E Alvin Dr	McKinnon St	Broadside	0		Y	Y	N	0	2
E Alvin Dr	Christensen Ave	Hit Object	50	W	N	N	N	0	1
E Alvin Dr	Lassen Ave	Vehicle/Pedestrian	0		Y	Y	N	0	1
E Alvin Dr	Linwood Dr	Vehicle/Pedestrian	0		Y	N	Y	0	1
E Alvin Dr	McKinnon St	Vehicle/Pedestrian	0		Y	Y	N	0	1
E Alvin Dr	McKinnon St	Broadside	0		Y	N	N	0	1
N Main St	Alvin Dr	Broadside	0		Y	N	N	0	1
Collision Data for Year 2010									
E Alvin Dr	Kip Dr	Broadside	0		Y	N	N	0	4
E Alvin Dr	Christensen Ave	Hit Object	100	W	N	N	N	0	1
E Alvin Dr	McKinnon St	Rear End	250	W	N	Y	N	0	1
E Alvin Dr	McKinnon St	Broadside	375	W	N	N	N	0	2
E Alvin Dr	N Main St	Broadside	0		Y	N	N	0	2
Alvin Dr	Modoc Ave	Vehicle/Pedestrian	0		Y	Y	N	0	1
E Alvin Dr	N Main St	Rear End	100	E	N	N	N	0	1
Wheeler Dr	Alvin	Broadside	0		Y	N	N	0	1
E Alvin Dr	N Main St	Broadside	0		Y	N	N	0	3
Alvin Dr	Trinity Way	Hit Object	300	E	N	N	N	0	1
Natividad Rd	Alvin Dr	Broadside	300	S	N	N	Y	0	1
Linwood Dr	Rainier Dr	Broadside	0		Y	N	N	0	1
E Alvin Dr	Marin Dr	Broadside	0		Y	N	N	0	1
E Alvin Dr	Linwood Dr	Vehicle/Pedestrian	0		Y	Y	N	0	1
E Alvin Dr	Wheeler Dr	Rear End	50	W	N	N	N	0	1
Harden Pkwy	McKinnon St	Broadside	0		Y	N	N	0	1
Collision Data for Year 2011									
Alvin Dr	N Main St	Vehicle/Pedestrian	0		Y	Y	N	0	1
E Laurel Dr	Linwood Dr	Broadside	0		Y	N	N	0	1
E Laurel Dr	Linwood Dr	Head-on	0		Y	N	N	0	1
Alvin Dr	Linwood Dr	Rear End	0		Y	N	N	0	2
E Alvin Dr	Solano Way	Rear End	170	E	N	N	N	0	1
N Main St	E Alvin Dr	Vehicle/Pedestrian	0		Y	N	Y	0	1
N Main St	Alvin Dr	Head-on	0		Y	N	N	0	2
N Main St	W Alvin Dr	Rear End	15	S	N	N	N	0	1
N Main St	N Alvin Dr	Head-on	486	N	N	N	N	0	1

## Alvin Dr Collision Data 2009-2013

Primary Road	Secondary Road	Collision Type	Distance	Direction	Intersection	Pedestrian Involved (Y/N)	Bicycle Involved (Y/N)	Number of Fatalities	Number of Injuries
Collision Data for Year 2012									
N Main St	E Alvin Dr	Broadside	0		Y	N	Y	0	1
N Main St	Alvin Dr	Vehicle/Pedestrian	86	N	N	Y	N	0	1
El Dorado Dr	Harden Pkwy	Other	80	S	N	N	Y	0	1
E Alvin Dr	Linwood Dr	Broadside	0		Y	N	N	0	2
E Alvin Dr	McKinnon St	Vehicle/Pedestrian	0		Y	Y	N	0	1
El Dorado Dr	Calaveras	Rear End	0		Y	N	N	0	2
E Alvin Dr	Kip Dr	Head-on	20	W	N	N	Y	0	1
E Laurel Dr	Linwood Dr	Head-on	0		Y	N	N	0	3
E Alvin Dr	N Main St	Broadside	0		Y	N	N	0	1
E Alvin Dr	N Main St	Broadside	0		Y	N	N	0	3
N Main St	E Alvin Dr	Head-on	215	N	N	N	N	0	1
E Alvin Dr	Linwood Dr	Broadside	50	E	N	N	Y	0	1
E Alvin Dr	Wheeler Dr	Broadside	0		Y	N	N	0	2
Collision Data for Year 2013									
Main St	Alvin Dr	Rear End	50	S	N	N	N	0	1
E Alvin Dr	Kip Dr	Vehicle/Pedestrian	171	W	N	N	Y	0	1
E Alvin Dr	Linwood Dr	Broadside	0		Y	N	N	0	1
Harden Pkwy	Alvin Dr	Rear End	600	N	N	N	Y	0	1
N Main St	E Alvin Dr	Broadside	0		Y	N	Y	0	1
E Alvin Dr	Linwood Dr	Broadside	0		Y	N	Y	0	1
E Alvin Dr	Wheeler	Broadside	0		Y	N	Y	0	1
Natividad Rd	Alvin Dr	Broadside	0		Y	N	Y	0	1
McKinnon St	E Alvin Dr	Broadside	0		Y	N	N	0	1
N Main St	N Alvin Dr	Broadside	0		Y	N	N	0	1
E Laurel Dr	Linwood Dr	Sideswipe	600	E	N	N	N	0	1

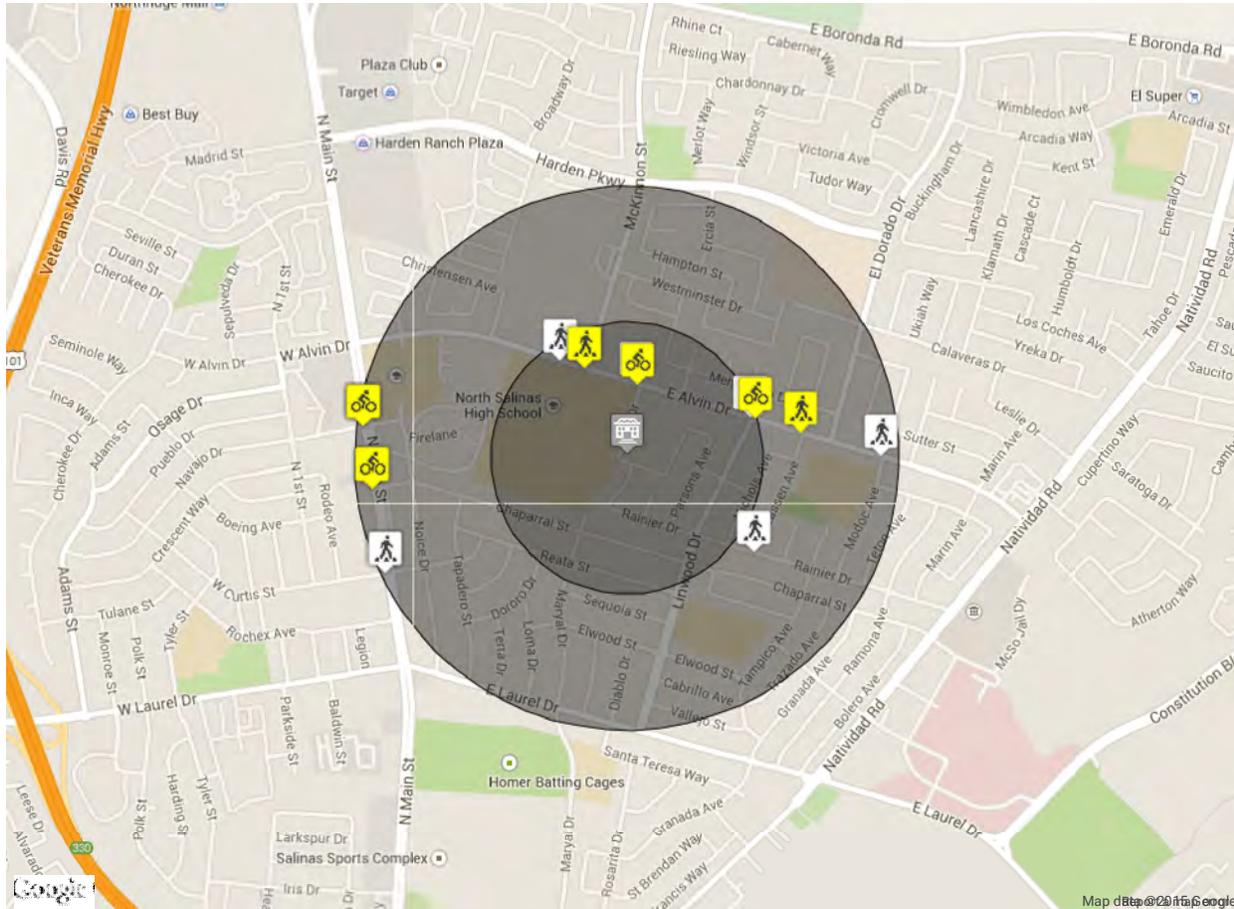
### SAFE ROUTES TO SCHOOL COLLISION MAP VIEWER

Interactive map and data summaries of bicycle and/or pedestrian collisions around school.

#### North Salinas High

55 Kip Dr. | Salinas | Monterey County | CDS: 27661592733178

Types of Collisions:	Bicycle	Pedestrian		
Collision Severity:	Fatal	Severe Injury	Other Visible Injury	Complaint of Pain
Years :	2009 - 2012			



Summary Statistics							
Radius	Fatal	Severe Injury	Visible Injury	Complaint of Pain	Pedestrian	Bicycle	Total
< ¼ mi.	0	0	4	5	5	4	9
¼ - ½ mi.	0	0	3	7	6	4	10
<b>Total</b>	0	0	7	12	11	8	19

Collision List								
Case ID	Date	Time	Primary	Secondary	Distance	Direction	Bike	Ped
<a href="#">4100827</a>	2009-01-30	10:17	EAST ALVIN DR	KIP DR	0	-	Yes	No
<a href="#">4410049</a>	2009-08-04	21:25	EAST ALVIN DR	MCKINNON ST	0	-	No	Yes
<a href="#">4569765</a>	2009-11-10	17:33	EAST ALVIN DR	LASSEN AV	0	-	No	Yes
<a href="#">4569958</a>	2009-09-08	8:36	NORTH MAIN ST	CHAPARRAL ST	0	-	Yes	No
<a href="#">4570008</a>	2009-10-23	18:00	EAST ALVIN DR	LINWOOD DR	0	-	Yes	No
<a href="#">4570048</a>	2009-09-14	8:06	EAST ALVIN DR	MCKINNON ST	0	-	No	Yes
<a href="#">4573885</a>	2009-09-03	20:34	RAINIER	LASSEN AV	0	-	No	Yes
<a href="#">4630807</a>	2010-01-29	15:14	EAST ALVIN DR	MCKINNON ST	250	W	No	Yes
<a href="#">4757111</a>	2011-04-23	20:53	NAVAJO DR	NORTH MAIN ST	0	-	No	Yes
<a href="#">4896834</a>	2010-10-07	13:38	ALVIN DR	MODOC AV	0	-	No	Yes
<a href="#">5015640</a>	2010-12-29	18:04	EAST ALVIN DR	LINWOOD DR	0	-	No	Yes
<a href="#">5048333</a>	2010-12-14	13:32	NORTH MAIN ST	CURTIS ST	0	-	Yes	No
<a href="#">5127245</a>	2011-03-09	19:36	NORTH MAIN ST	CURTIS ST	0	-	No	Yes
<a href="#">5877968</a>	2012-10-09	8:57	EAST ALVIN DR	MCKINNEN	0	-	No	Yes
<a href="#">5869554</a>	2012-10-31	16:21	NORTH MAIN ST	NAVAJO DR	0	-	Yes	No
<a href="#">5848156</a>	2012-09-30	16:54	EAST ALVIN DR	KIP DR	20	W	Yes	No
<a href="#">5720159</a>	2012-06-26	15:17	CHAPARRAL ST	NORTH MAIN ST	0	-	No	Yes
<a href="#">5610799</a>	2012-04-11	15:32	NORTH MAIN ST	NAVAJO DR	0	-	Yes	No
<a href="#">5548503</a>	2012-03-20	17:51	EAST ALVIN DR	LINWOOD DR	50	E	Yes	No

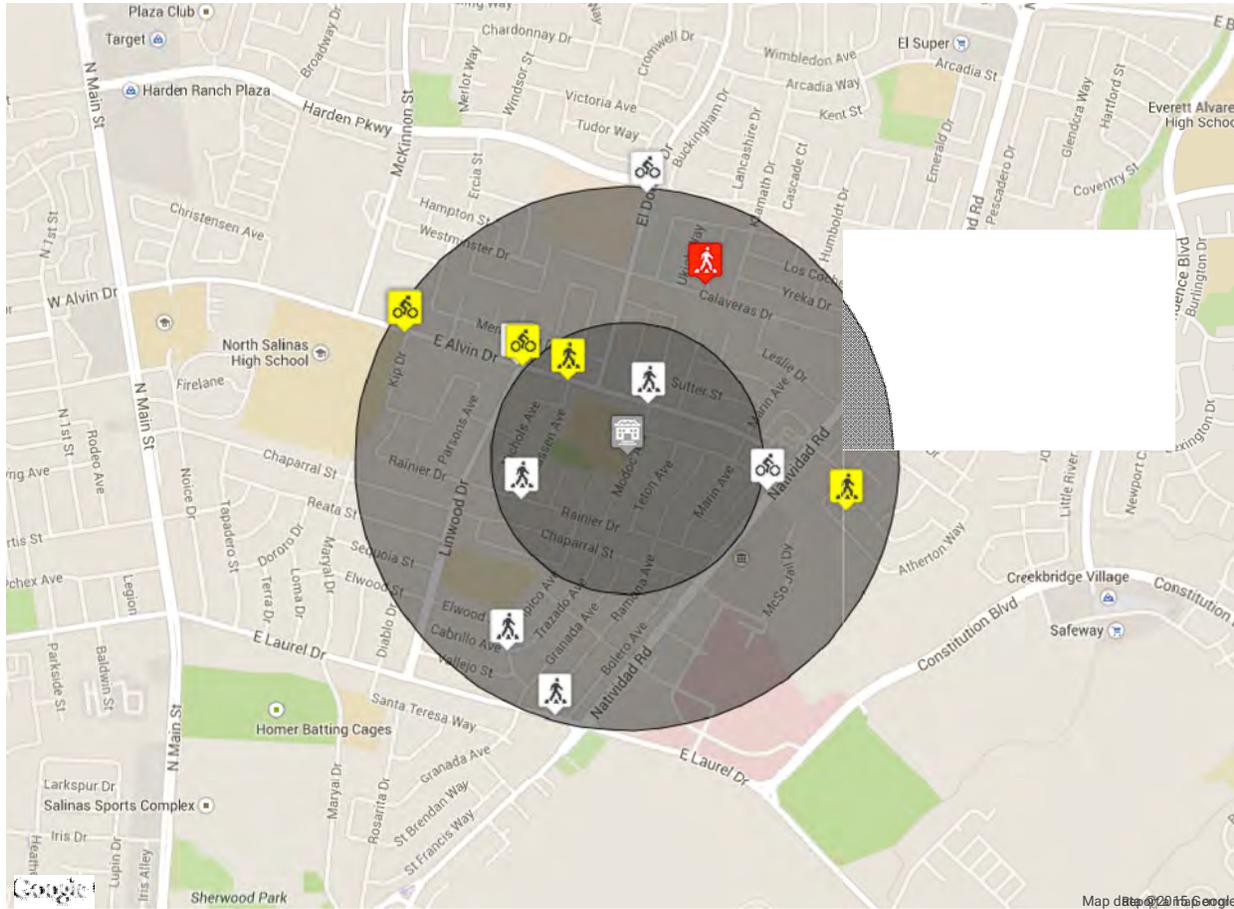
### SAFE ROUTES TO SCHOOL COLLISION MAP VIEWER

Interactive map and data summaries of bicycle and/or pedestrian collisions around school.

#### Natividad Elementary

1465 Modoc Ave. | Salinas | Monterey County | CDS: 27661426026595

Types of Collisions:	Bicycle	Pedestrian		
Collision Severity:	Fatal	Severe Injury	Other Visible Injury	Complaint of Pain
Years :	2009 - 2012			



Summary Statistics							
Radius	Fatal	Severe Injury	Visible Injury	Complaint of Pain	Pedestrian	Bicycle	Total
< ¼ mi.	0	0	1	2	3	0	3
¼ - ½ mi.	1	0	3	7	5	6	11
<b>Total</b>	<b>1</b>	<b>0</b>	<b>4</b>	<b>9</b>	<b>8</b>	<b>6</b>	<b>14</b>

Collision List								
Case ID	Date	Time	Primary	Secondary	Distance	Direction	Bike	Ped
<a href="#">4100827</a>	2009-01-30	10:17	EAST ALVIN DR	KIP DR	0	-	Yes	No
<a href="#">4409939</a>	2009-08-26	15:48	EAST LAUREL DR	BOLERO AV	100	W	No	Yes
<a href="#">4569765</a>	2009-11-10	17:33	EAST ALVIN DR	LASSEN AV	0	-	No	Yes
<a href="#">4570008</a>	2009-10-23	18:00	EAST ALVIN DR	LINWOOD DR	0	-	Yes	No
<a href="#">4573885</a>	2009-09-03	20:34	RAINIER	LASSEN AV	0	-	No	Yes
<a href="#">4896834</a>	2010-10-07	13:38	ALVIN DR	MODOC AV	0	-	No	Yes
<a href="#">4931561</a>	2010-05-05	13:54	NATIVIDAD RD	ALVIN DR	300	S	Yes	No
<a href="#">5015640</a>	2010-12-29	18:04	EAST ALVIN DR	LINWOOD DR	0	-	No	Yes
<a href="#">5085088</a>	2011-02-08	7:56	CABRILLO AV	TAMPICO AV	0	-	No	Yes
<a href="#">5478387</a>	2011-12-19	19:20	LOS ALTOS WY	ATHERTON WY	150	W	No	Yes
<a href="#">5947820</a>	2012-12-17	14:14	EL DORADO DR	HARDEN PKWY	80	S	Yes	No
<a href="#">5848156</a>	2012-09-30	16:54	EAST ALVIN DR	KIP DR	20	W	Yes	No
<a href="#">5548503</a>	2012-03-20	17:51	EAST ALVIN DR	LINWOOD DR	50	E	Yes	No
<a href="#">5542722</a>	2012-04-16	16:25	CHICO WY	CALAVERAS DR	100	N	No	Yes

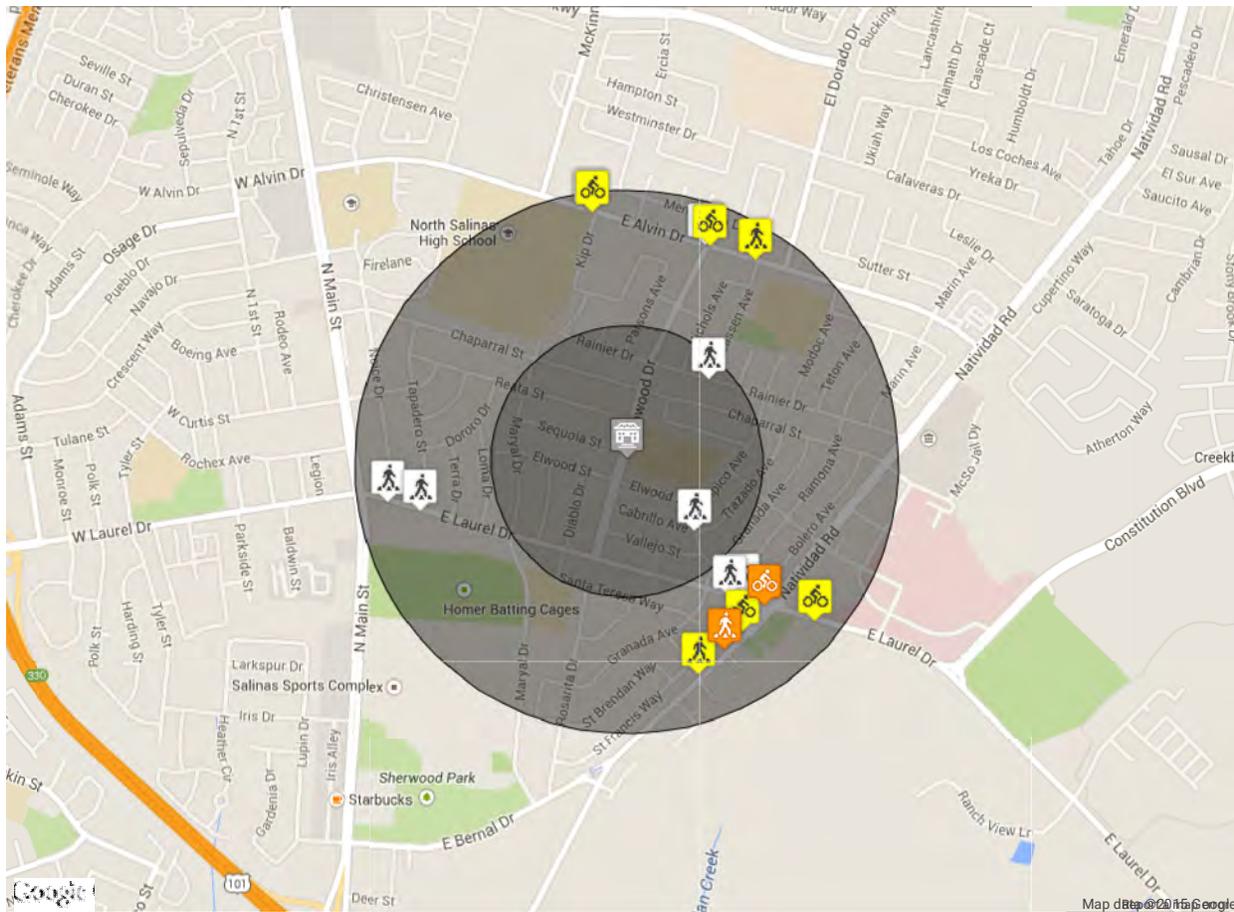
### SAFE ROUTES TO SCHOOL COLLISION MAP VIEWER

Interactive map and data summaries of bicycle and/or pedestrian collisions around school.

#### El Gabilan Elementary

1256 Linwood Dr. | Salinas | Monterey County | CDS: 27661426026520

Types of Collisions:	Bicycle	Pedestrian		
Collision Severity:	Fatal	Severe Injury	Other Visible Injury	Complaint of Pain
Years :	2009 - 2012			



Summary Statistics							
Radius	Fatal	Severe Injury	Visible Injury	Complaint of Pain	Pedestrian	Bicycle	Total
< ¼ mi.	0	0	0	2	2	0	2
¼ - ½ mi.	0	2	6	7	8	7	15
<b>Total</b>	0	2	6	9	10	7	17

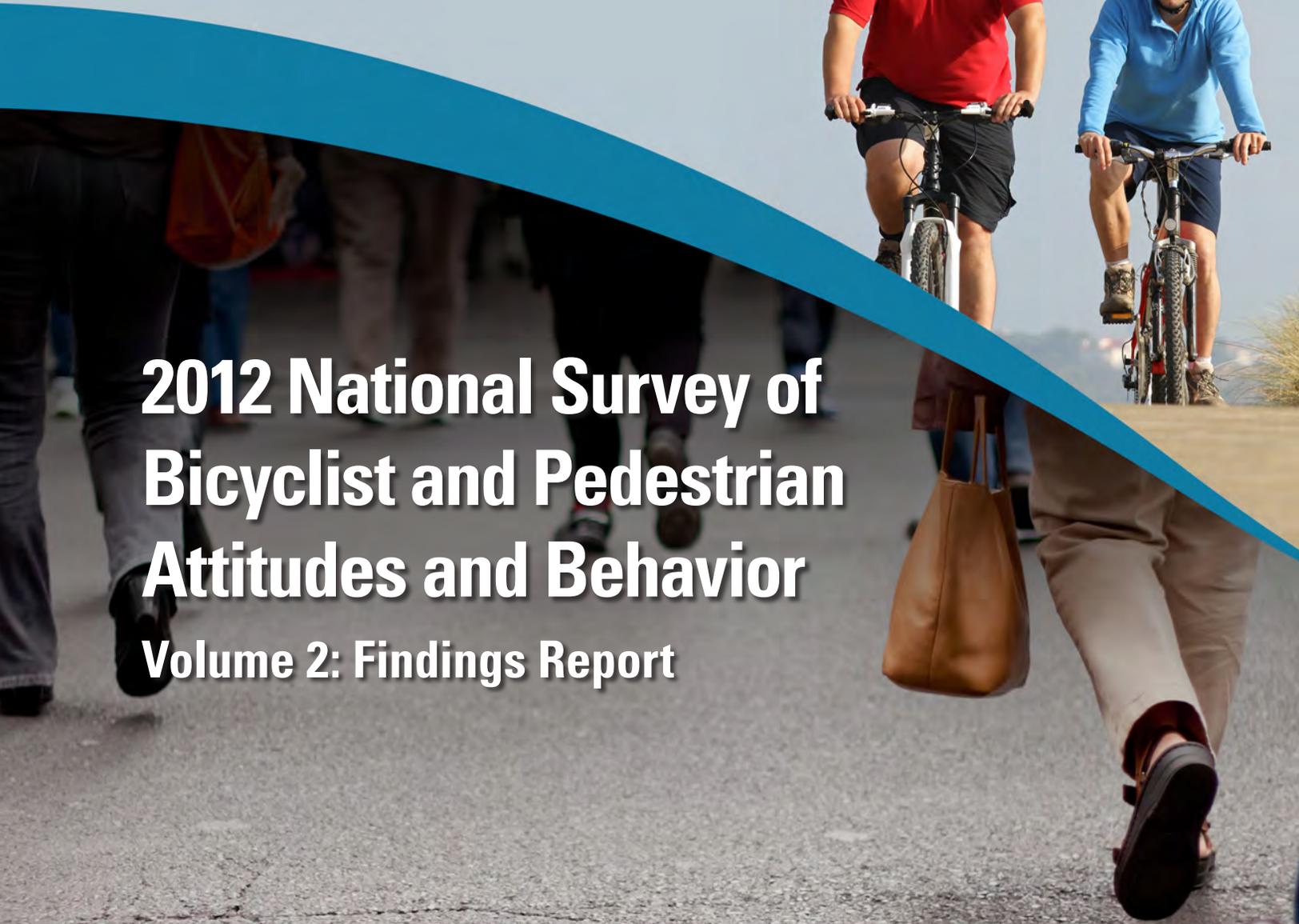
Collision List								
Case ID	Date	Time	Primary	Secondary	Distance	Direction	Bike	Ped
4100827	2009-01-30	10:17	EAST ALVIN DR	KIP DR	0	-	Yes	No
4409939	2009-08-26	15:48	EAST LAUREL DR	BOLERO AV	100	W	No	Yes
4569765	2009-11-10	17:33	EAST ALVIN DR	LASSEN AV	0	-	No	Yes
4570008	2009-10-23	18:00	EAST ALVIN DR	LINWOOD DR	0	-	Yes	No
4573885	2009-09-03	20:34	RAINIER	LASSEN AV	0	-	No	Yes
4877940	2010-03-28	15:41	NATIVIDAD RD	SORRENTINI DR	3	S	No	Yes
4940828	2010-10-16	13:54	EAST LAUREL DR	RAMONA AV	0	-	No	Yes
5015640	2010-12-29	18:04	EAST ALVIN DR	LINWOOD DR	0	-	No	Yes
5085088	2011-02-08	7:56	CABRILLO AV	TAMPICO AV	0	-	No	Yes
5380904	2011-07-27	11:41	EAST LAUREL DR	NATIVIDAD RD	524	E	Yes	No
5468911	2011-11-17	18:57	EAST LAUREL DR	NOICE DR	0	-	No	Yes
5478405	2011-12-20	13:12	NATIVIDAD RD	EAST LAUREL DR	325	S	Yes	No
5955629	2012-12-27	19:00	NATIVIDAD	SORRENTINI DR	336	N	No	Yes
5848156	2012-09-30	16:54	EAST ALVIN DR	KIP DR	20	W	Yes	No
5836553	2012-09-25	6:15	NATIVIDAD	LAUREL	0	-	Yes	No
5831141	2012-09-20	11:15	EAST LAUREL DR	TAPADERO ST	0	-	No	Yes
5548503	2012-03-20	17:51	EAST ALVIN DR	LINWOOD DR	50	E	Yes	No

Complete document can be found at:  
<http://www.nhtsa.gov/nti/811841>



# 2012 National Survey of Bicyclist and Pedestrian Attitudes and Behavior

## Volume 2: Findings Report

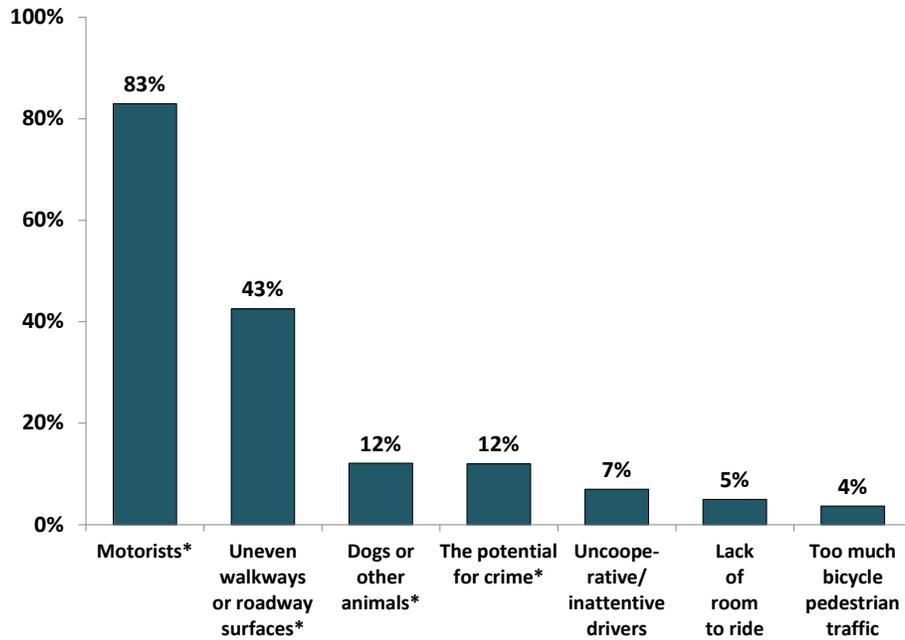


U.S. Department of Transportation  
**National Highway Traffic Safety  
Administration**



Those who felt threatened for their personal safety during their most recent bicycle ride were asked what made them feel in danger. Four potential causes were read to respondents. The respondents could reply “Yes” to any or all of the causes. The respondents were then given an opportunity to volunteer other causes for their feeling threatened. Motorists were most often cited as the source of concerns, followed by uneven walkways or roadway surfaces.

**Figure 2.7**  
**Reasons Felt Threatened for Personal Safety**



Q18. Did you feel threatened for your personal safety because of any of the following?

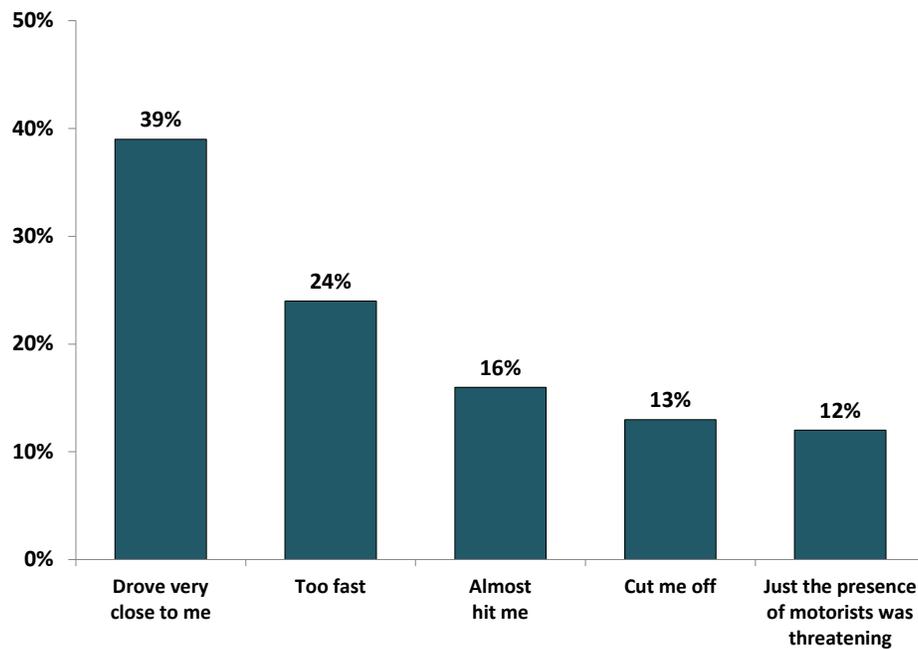
Base: Felt threatened for personal safety while riding a bike

Unweighted N=187

\* Categories read to respondents

The respondents who felt threatened by motorists were asked which specific actions made them fear for their personal safety. The plurality of respondents said that motorists drove too close to them and one in four mentioned that motorists drove too fast.

**Figure 2.8**  
**Five Most Frequently Reported Actions Motorists Did that Were Threatening**



Q19. What did motorists do to make you feel threatened?

Base: Felt threatened for personal safety while riding a bike due to motorists

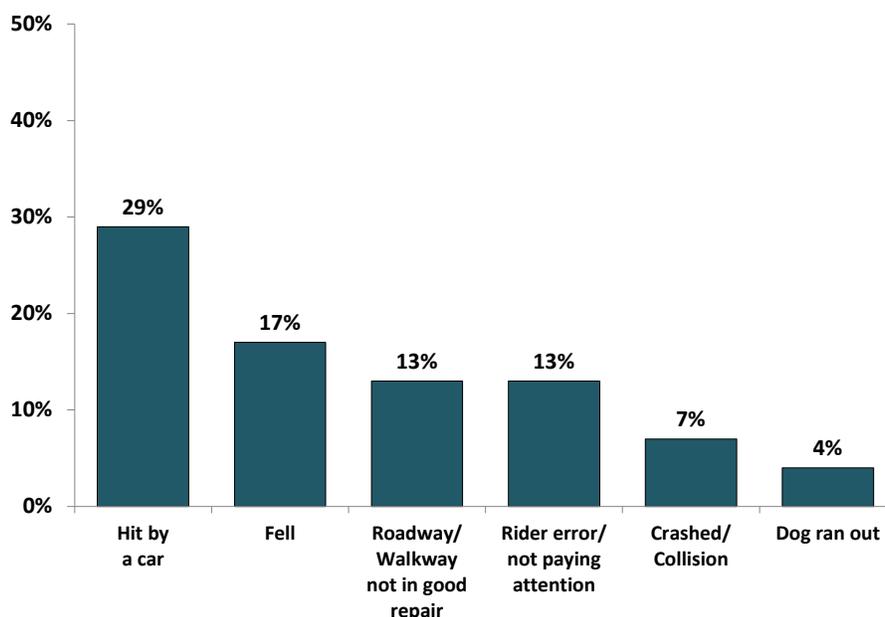
Unweighted N=160

<b>Table 3.3 Injured While Bicycling By Demographic Characteristics</b>		
	<b>Unweighted N<sup>1</sup></b>	<b>Injured while Bicycling</b>
Total Respondents	3,401	3%
<b>Gender</b>		
Male	1,836	4%
Female	1,565	3%
<b>Age</b>		
16-24	552	6%
25-34	611	4%
35-44	643	3%
45-54	715	1%
55-64	542	1%
65+	324	1%
<b>Race (Multiple Response<sup>2</sup>)</b>		
Black or African American	306	5%
White	2,687	3%
Asian	107	5%
American Indian or Alaska Native	121	9%
Native Hawaiian/Pacific Islander	32	13%
<b>Ethnicity</b>		
Hispanic	361	4%
Non-Hispanic	3,002	3%
<p>Q38. In the past two years, were you ever injured while you were riding a bike? Only count injuries that required attention by a medical professional. Base: Rode a bicycle within the past two years</p> <p><sup>1</sup> Some Ns may not add to 3,401 due to Don't Know or Refused responses <sup>2</sup> For Multiple Response questions, respondents were allowed to select more than one category; (see page 4) <sup>3</sup> For descriptions of each cluster and more information on how the clusters were calculated, see page 3 <sup>4</sup> Respondents voluntarily reported being disabled when asked about employment. The type of disability was not recorded.</p>		

<b>Table 3.3 Injured While Bicycling By Demographic Characteristics (Continued)</b>		
	<b>Unweighted N<sup>1</sup></b>	<b>Injured while Bicycling</b>
<b>Education</b>		
Did not Graduate High School	264	7%
High School Diploma/GED	667	2%
Some College	539	3%
Associates Degree	387	4%
Bachelors Degree	924	3%
Graduate Degree	597	3%
<b>Household Income</b>		
Less than \$15,000	336	8%
\$15,000 - \$29,999	395	4%
\$30,000 - \$49,999	470	2%
\$50,000 - \$74,999	562	3%
\$75,000 - \$99,999	473	2%
\$100,000 or more	817	2%
<b>Urbanicity<sup>3</sup></b>		
Cluster 1	1,349	4%
Cluster 2	249	3%
Cluster 3	741	3%
Cluster 4	478	5%
Cluster 5	584	2%
<b>Children Under 16 in Household</b>		
Yes	1,410	3%
No	1,937	4%
<b>Employment Status (Multiple Response<sup>2</sup>)</b>		
Employed full-time	1,839	2%
Employed part-time	432	3%
Unemployed and looking for work	229	5%
Retired	403	1%
Going to school	329	7%
Homemaker	183	5%
Disabled <sup>4</sup>	58	10%
<p>Q38. In the past two years, were you ever injured while you were riding a bike? Only count injuries that required attention by a medical professional. Base: Rode a bicycle within the past two years</p> <p><sup>1</sup> Some Ns may not add to 3,401 due to Don't Know or Refused responses <sup>2</sup> For Multiple Response questions, respondents were allowed to select more than one category; (see page 4) <sup>3</sup> For descriptions of each cluster and more information on how the clusters were calculated, see page 3 <sup>4</sup> Respondents voluntarily reported being disabled when asked about employment. The type of disability was not recorded.</p>		

Three-in-ten respondents that experienced a bicycling injury reported that their injury was the result of being hit by a car. For the other respondents who had been injured while bicycling, 17 percent reported a fall as the source of their injury. Thirteen percent had been injured because of walkway/roadway not being in good repair, and the same percentage reported that they made an error while bicycling or neglected to pay attention.

**Figure 3.13**  
**Six Most Frequent Sources of Injury**



Rebased Q39 and Q40

Q39. Was this injury of result of being hit by a car?

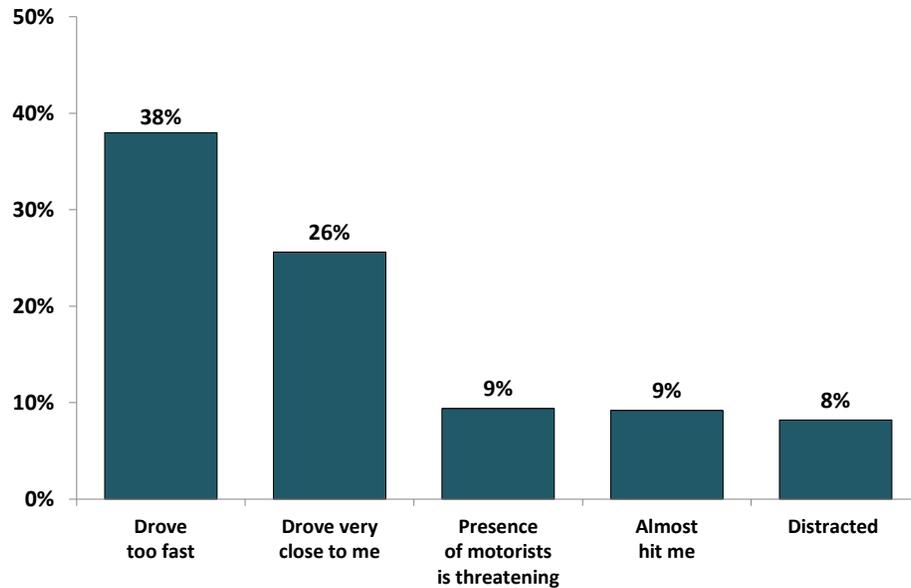
Q40. How did you injure yourself while riding your bike?

Base: Have been injured while riding a bicycle in past two years

Unweighted N=101

Respondents who reported feeling threatened by motorists were asked what the motorist did that caused them to feel threatened. The most frequently cited threatening actions were the speed of the motorist and how close the motorist drove by the respondent.

**Figure 8.8**  
**Five Most Frequently Reported Actions Motorists Did that Were Threatening**



Q67. What did motorists do to make you feel threatened?

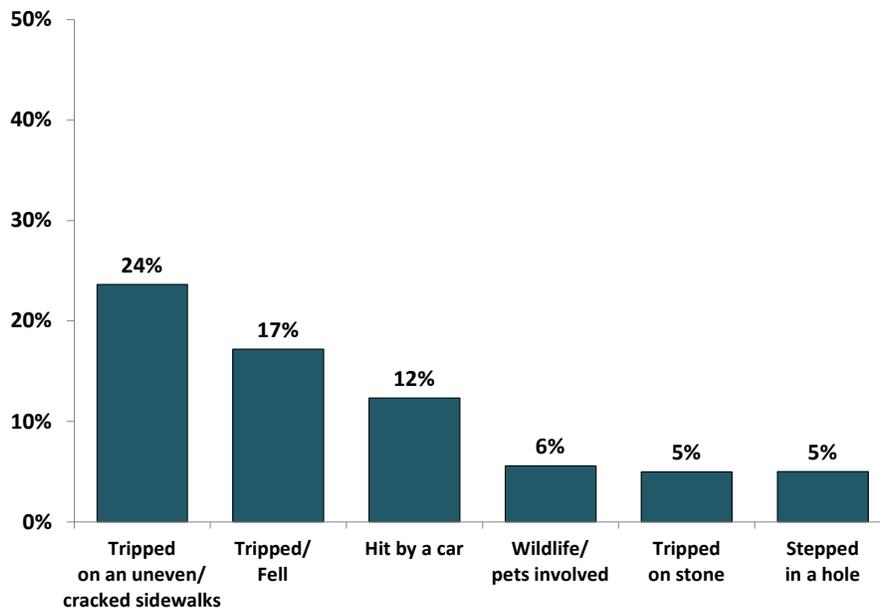
Base: Indicated personal safety was threatened by motorists

Unweighted N=279

<b>Table 9.2 Injured While Walking By Demographic Characteristics</b>		
	<b>Unweighted N<sup>1</sup></b>	<b>Injured while Walking</b>
<b>Total Respondents</b>	6,771	3%
<b>Gender</b>		
Male	3,035	2%
Female	3,736	3%
<b>Age</b>		
16-24	776	2%
25-34	989	2%
35-44	1,087	2%
45-54	1,301	3%
55-64	1,267	3%
65+	1,316	3%
<b>Race (Multiple Response<sup>2</sup>)</b>		
Black or African American	738	4%
White	5,197	2%
Asian	212	1%
American Indian or Alaska Native	241	6%
Native Hawaiian/Pacific Islander	50	7%
<b>Ethnicity</b>		
Hispanic	724	3%
Non-Hispanic	5,969	2%
<p>Q78. In the past two years, were you ever injured while you were walking? Only count injuries that required attention by a medical professional. Base: Walked within the past two years</p> <p><sup>1</sup> Some Ns may not add to 6,771 due to Don't Know or Refused responses <sup>2</sup> For Multiple Response questions, respondents were allowed to select more than one category; (see page 4) <sup>3</sup> For descriptions of each cluster and more information on how the clusters were calculated, see page 3 <sup>4</sup> Respondents voluntarily reported being disabled when asked about employment. The type of disability was not recorded.</p>		

One-eighth of respondents that experienced a walking injury reported that their injury was the result of being hit by a car. For the other pedestrians who had been injured while walking, 24 percent reported they got hurt as a result of having tripped on an uneven sidewalk.

**Figure 9.11**  
**Sources of Injury**



Q79. Was this injury a result of being hit by a motor vehicle?

Q80. How did you injure yourself while you were walking?

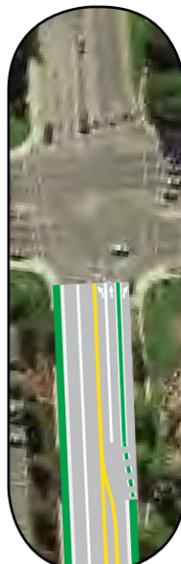
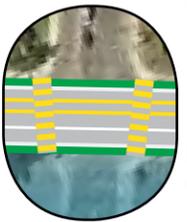
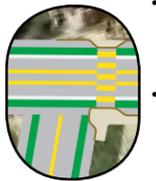
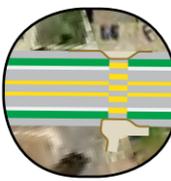
Base: Have been injured while walking in past two years

Unweighted N=164

Salinas ATP Grants

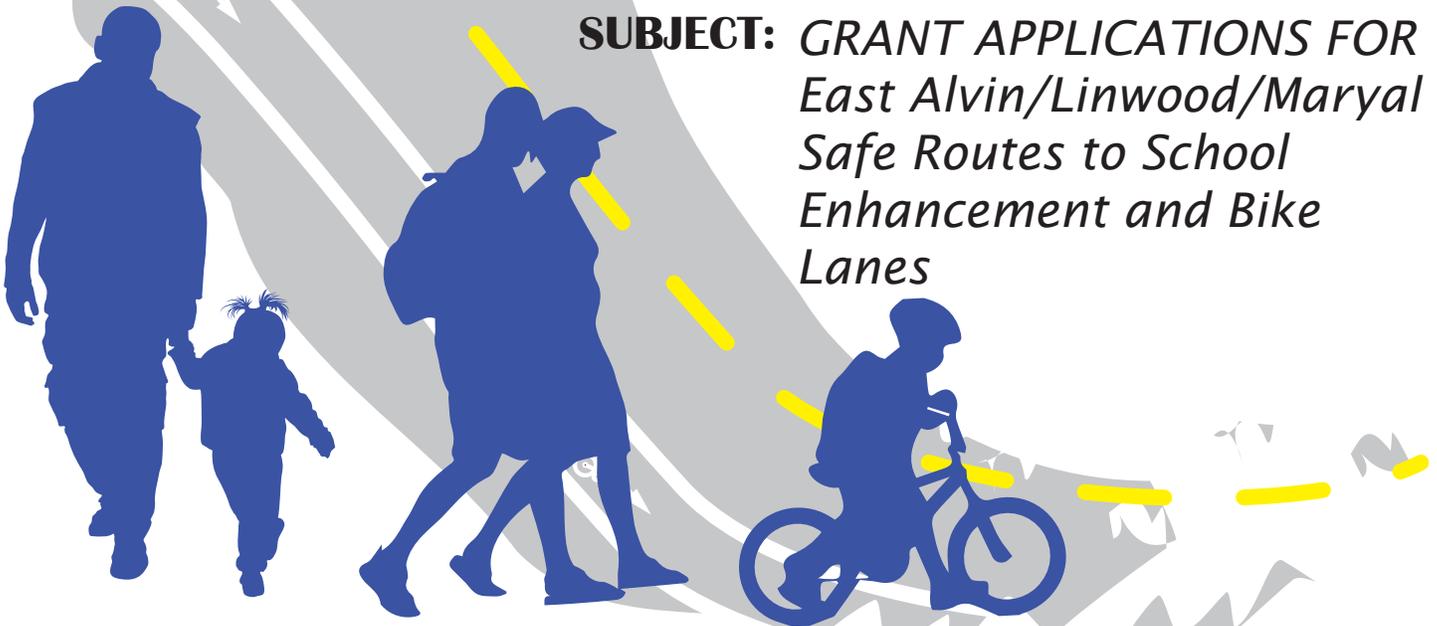


Major Hazards and Counter Measures

- |  |   |  |   |   |  |  |
|--|---|--|---|---|--|--|
| <p><b>1 Alvin Drive at Main Street</b></p> <ul style="list-style-type: none"> <li>• 2 Pedestrian Involved Collisions</li> <li>• 5 Bicycle Involved Collisions</li> </ul> <p><u>Major Hazards</u></p> <ul style="list-style-type: none"> <li>• Long pedestrian crossings</li> <li>• No bicycle facility at westbound approach</li> <li>• No buffers for bicycle facilities</li> </ul> <p><u>Counter Measures</u></p> <p>Buffered Bike Lanes</p> <ul style="list-style-type: none"> <li>• Provides further bicycle and vehicular separation</li> <li>• Improves the sight and visibility of bicyclists by giving them a designated area at the westbound approach</li> <li>• Reduces behaviors that lead to collisions by placing westbound bicyclists inside the vehicular right-turn lane to avoid right hook collisions</li> </ul>  | <p><b>2 250 feet west of Alvin Drive at McKinnon Street</b></p> <ul style="list-style-type: none"> <li>• 1 Pedestrian Involved Collision</li> </ul> <p><u>Major Hazards</u></p> <ul style="list-style-type: none"> <li>• High vehicular speeds</li> <li>• Wide vehicular facilities</li> </ul> <p><u>Counter Measures</u></p> <p>Road Diet</p> <ul style="list-style-type: none"> <li>• Reduces vehicular travel speeds</li> <li>• Narrows the width of roadway allotted to vehicles</li> </ul> | <p><b>3 Alvin Drive at McKinnon Street</b></p> <ul style="list-style-type: none"> <li>• 3 Pedestrian Involved Collisions</li> </ul> <p><u>Major Hazards</u></p> <ul style="list-style-type: none"> <li>• High vehicular travel speeds</li> <li>• Long pedestrian crossings</li> <li>• Low visibility of crosswalk markings</li> </ul> <p><u>Counter Measures</u></p> <p>Road Diet</p> <ul style="list-style-type: none"> <li>• Reduces vehicular travel speeds</li> <li>• Narrows the width of roadway allotted to vehicles</li> </ul> <p>High Visibility Pedestrian School Crossing</p> <ul style="list-style-type: none"> <li>• Improves visibility for pedestrians and motorists</li> <li>• Provides pedestrians a designated place to cross</li> </ul>  | <p><b>4 Alvin Drive at Kip Drive</b></p> <ul style="list-style-type: none"> <li>• 3 Bicycle Involved Collisions</li> </ul> <p><u>Major Hazards</u></p> <ul style="list-style-type: none"> <li>• High vehicular travel speeds</li> <li>• Bicycle facility ends</li> </ul> <p><u>Counter Measures</u></p> <p>Road Diet</p> <ul style="list-style-type: none"> <li>• Reduces vehicular travel speeds</li> <li>• Narrows the width of roadway allotted to vehicles</li> </ul> <p>Buffered Bike Lanes</p> <ul style="list-style-type: none"> <li>• Provides a continuous bicycle facility from Main Street to Natividad Road</li> <li>• Provides bicycle and vehicular separation</li> <li>• Improves the sight and visibility of bicyclists by giving them a designated area</li> <li>• Reduces behaviors that lead to collisions by placing bicyclists in designated facilities</li> </ul> | <p><b>5 Alvin Drive at Linwood Drive</b></p> <ul style="list-style-type: none"> <li>• 1 Pedestrian Involved Collision</li> <li>• 3 Bicycle Involved Collisions</li> </ul> <p><u>Major Hazards</u></p> <ul style="list-style-type: none"> <li>• High vehicular travel speeds</li> <li>• No bicycle facilities</li> <li>• Long pedestrian crossings</li> </ul> <p><u>Counter Measures</u></p> <p>Road Diet</p> <ul style="list-style-type: none"> <li>• Reduces vehicular travel speeds</li> <li>• Narrows the width of roadway allotted to vehicles</li> </ul> <p>Buffered Bike Lanes</p> <ul style="list-style-type: none"> <li>• Provides bicycle and vehicular separation</li> <li>• Improves the sight and visibility of bicyclists by giving them a designated area</li> </ul> <p>Curb bulb-out</p> <ul style="list-style-type: none"> <li>• Further reduces vehicular travel speeds by acting as a traffic calming device</li> <li>• Improves sight distance and visibility for pedestrians and motorists</li> <li>• Shortens crossing distance</li> </ul> <p>High Visibility Pedestrian School Crossing</p> <ul style="list-style-type: none"> <li>• Improves visibility for pedestrians and motorists</li> <li>• Provides pedestrians a designated place to cross</li> </ul>  | <p><b>6 Alvin Drive at Lassen Avenue</b></p> <ul style="list-style-type: none"> <li>• 1 Pedestrian Involved Collision</li> </ul> <p><u>Major Hazards</u></p> <ul style="list-style-type: none"> <li>• High vehicular travel speeds</li> <li>• Long pedestrian crossings</li> <li>• Low visibility of crosswalk markings</li> </ul> <p><u>Counter Measures</u></p> <p>Road Diet</p> <ul style="list-style-type: none"> <li>• Reduces vehicular travel speeds</li> <li>• Narrows the width of roadway allotted to vehicles</li> </ul> <p>Curb bulb-out</p> <ul style="list-style-type: none"> <li>• Further reduces vehicular travel speeds by acting as a traffic calming device</li> <li>• Improves sight distance and visibility for pedestrians and motorists</li> <li>• Shortens crossing distance</li> </ul> <p>High Visibility Pedestrian School Crossing</p> <ul style="list-style-type: none"> <li>• Improves visibility for pedestrians and motorists</li> <li>• Provides pedestrians a designated place to cross</li> </ul>  | <p><b>7 Alvin Drive at Modoc Avenue</b></p> <ul style="list-style-type: none"> <li>• 1 Pedestrian Involved Collision</li> </ul> <p><u>Major Hazards</u></p> <ul style="list-style-type: none"> <li>• High vehicular travel speeds</li> <li>• Long pedestrian crossings</li> <li>• Low visibility of crosswalk markings</li> </ul> <p><u>Counter Measures</u></p> <p>Road Diet</p> <ul style="list-style-type: none"> <li>• Reduces vehicular travel speeds</li> <li>• Narrows the width of roadway allotted to vehicles</li> </ul> <p>Curb bulb-out</p> <ul style="list-style-type: none"> <li>• Further reduces vehicular travel speeds by acting as a traffic calming device</li> <li>• Improves sight distance and visibility for pedestrians and motorists</li> <li>• Shortens crossing distance</li> </ul> <p>Pedestrian Refuge Island</p> <ul style="list-style-type: none"> <li>• Further shortens crossing distance</li> <li>• Simplifies crossing movement</li> </ul> <p>High Visibility Pedestrian School Crossing</p> <ul style="list-style-type: none"> <li>• Improves visibility for pedestrians and motorists</li> <li>• Provides pedestrians a designated place to cross</li> </ul>  |
|--|---|--|---|---|--|--|

# Notice of Public Information Meeting /OPEN HOUSE

**DATE:** *Thursday, March 26, 2015*  
**TIME:** *6 PM TO 8:00 PM*  
**PLACE:** *Natividad Elementary School  
 1465 Modoc Ave., Salinas, CA 93906*  
**SUBJECT:** *GRANT APPLICATIONS FOR East Alvin/Linwood/Maryal Safe Routes to School Enhancement and Bike Lanes*



The City of Salinas will hold an open house informational meeting on the above referenced project. The open house will be informal, with one-on-one discussions with City Staff and a Representative of the Conceptual Design Team.

Two presentations will take place at 6:30 pm and 7:30 pm. Staff will be available with displays to discuss the projects and answer your questions. Information will be available on the project's location, grant schedule and effects of this project.

During this meeting, you will also have the opportunity to submit written comments.

All persons interested in this project are invited to attend this meeting to become familiar with this project and to share your views and concerns. For further information regarding the project, contact James Serrano, Transportation Planner at (831) 758-7195 or Eda Herrera, Associate Engineer at (831) 758-7438.

Notice is further given to all individuals with disabilities that this meeting is being held in a physically accessible place. Please notify Eda Herrera at (831) 758-7438 or [eda@ci.salinas.ca.us](mailto:eda@ci.salinas.ca.us) at least 1 week prior to the open house meeting if you have special needs for which this department will need to make arrangements. Spanish translators will be available to translate for Spanish speakers. Attachment I

# Aviso de Información Pública /INVITACIÓN AL PÚBLICO EN GENERAL

**Fecha:** *Jueves, 25 de marzo del 2015*

**HORA:** *6 PM A 8 PM*

**LUGAR:** *La Escuela Natividad  
1465 Modoc Ave., Salinas, CA  
93906*

**ASUNTO:** *APLICACIONES PARA  
SUBSIDIOS para el Programa  
De Rutas Seguras A La  
Escuela y para bicicletas- Por  
Las Calles East Alvin, Linwood  
y Maryal*



La ciudad de Salinas llevara a cabo una reunión informativa sobre el proyecto mencionado arriba. La junta será informal, con conversaciones individuales con personal municipal y representantes del equipo de Diseño Conceptual.

Habrá dos presentaciones; una a las 6:30pm y otra a las 7:30pm. Personal estará disponible con exhibiciones para conversar sobre los proyectos y responder a sus preguntas. Se proveerá información sobre la localidad del proyecto, la programación de fondos y los efectos del proyecto.

También se le proveerá la oportunidad de someter comentarios por escrito durante la reunión.

Todos aquellos interesados están invitados a asistir a esta reunión para familiarizarse con este proyecto y a compartir sus opiniones e inquietudes. Para obtener más información sobre el proyecto, favor de ponerse en contacto con Eda Herrera, Ingeniera Asociada al (831) 758-7438 o James Serrano, Planiador de Transportacion al (831) 758-7195.

Aviso adicional a todas las personas discapacitadas: Esta reunión se llevara a cabo en un lugar físicamente accesible. Favor de notificar a Eda Herrera al (831) 758-7438 o por correo electrónico a [eda@ci.salinas.ca.us](mailto:eda@ci.salinas.ca.us), por lo menos 1 semana antes de la reunión, si usted tiene necesidades especiales para que el departamento pueda hacer los arreglos necesarios. Interpretes estarán disponible para traducir en español.

Indicators	California			93906		
	%	95% CI	Population	%	95% CI	Population
Ever diagnosed with asthma (1-17)	0.154	0.14 - 0.167	8629700	0.085	0.058 - 0.112	16200
Fair or poor health (18-64)	0.179	0.172 - 0.186	23392900	0.273	0.221 - 0.325	34700
Fair or poor health (65+)	0.274	0.261 - 0.287	4403600	NA		4800
Fair or poor health (0-17)	0.06	0.051 - 0.068	9134500	0.102	0.056 - 0.148	17200
Obese (BMI &ge; 30) (18+)	0.248	0.241 - 0.255	27796500	0.31	0.265 - 0.354	39500
Overweight for age (weight &ge; 95th percentile) (2-11)	0.136	0.118 - 0.153	4997900	NA		9700
Overweight or obese (BMI &ge; 85th percentile) (12-17)	0.324	0.295 - 0.353	3127100	NA		5500
Regular physical activity (5-17)	0.208	0.191 - 0.225	6610500	NA		12200

Please note that many estimates produced in AskCHIS Neighborhood Edition are not direct estimates. For more information on the methodology used to calculate estimates please visit <http://healthpolicy.ucla.edu>

Exported On: 05/01/2015 12:01:38

Monterey (MT)

	Monterey County	Error Margin	Top U.S. Performers*	California	Rank (of 57)
Health Outcomes					23
Length of Life					15
Premature death	4,991	4,756-5,227	5,200	5,295	
Quality of Life					35
Poor or fair health	24%	21-28%	10%	18%	
Poor physical health days	3.9	3.2-4.5	2.5	3.7	
Poor mental health days	4.6	3.8-5.3	2.3	3.6	
Low birthweight	5.8%	5.6-6.0%	5.9%	6.8%	
Health Factors					26
Health Behaviors					21
Adult smoking	13%	10-16%	14%	13%	
Adult obesity	22%	19-25%	25%	23%	
Food environment index	7.6		8.4	7.5	
Physical inactivity	16%	13-19%	20%	17%	
Access to exercise opportunities	88%		92%	93%	
Excessive drinking	15%	12-19%	10%	17%	
Alcohol-impaired driving deaths	28%		14%	31%	
Sexually transmitted infections	402		138	441	
Teen births	51	50-52	20	34	
Clinical Care					31
Uninsured	24%	22-25%	11%	20%	
Primary care physicians	1,604:1		1,045:1	1,294:1	
Dentists	1,606:1		1,377:1	1,291:1	
Mental health providers	426:1		386:1	376:1	
Preventable hospital stays	36	35-38	41	45	
Diabetic monitoring	84%	81-87%	90%	81%	
Mammography screening	63.5%	60.8-66.2%	70.7%	59.3%	
Social & Economic Factors					37
High school graduation	82%			83%	
Some college	45.7%	44.2-47.3%	71.0%	61.7%	
Unemployment	10.1%		4.0%	8.9%	
Children in poverty	24%	21-28%	13%	24%	
Income inequality	4.5	4.3-4.7	3.7	5.1	
Children in single-parent households	32%	30-34%	20%	32%	
Social associations	5.1		22.0	5.8	
Violent crime	464		59	425	
Injury deaths	50	47-53	50	46	
Physical Environment					18
Air pollution - particulate matter	7.2		9.5	9.3	
Drinking water violations	1%		0%	3%	
Severe housing problems	30%	29-31%	9%	29%	
Driving alone to work	71%	70-72%	71%	73%	
Long commute - driving alone	28%	27-29%	15%	37%	

\* 90th percentile, i.e., only 10% are better.

Note: Blank values reflect unreliable or missing data

2015

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### Physical Fitness Test

Report:

California Department of Education  
 Statewide Assessment Division  
 Prepared: 5/15/2015 1:17:53 PM

State: [California](#)  
 County: [Monterey](#)  
 District: [Salinas Union High](#)  
 School: North Salinas High

## 2013-14 California Physical Fitness Report Overall - Summary of Results North Salinas High

Additional information can be found at the California Department of Education [Physical Fitness Test Web page](#).

Physical Fitness Area	Total Tested <sup>1</sup> in Grade 5	Number Grade 5 Students in HFZ <sup>2</sup>	% Grade 5 Students in HFZ	% Grade 5 Students in Needs Improvement	% Grade 5 Students in Needs Improvement - Health Risk	Total Tested <sup>1</sup> in Grade 7	Number Grade 7 Students in HFZ <sup>2</sup>	% Grade 7 Students in HFZ	% Grade 7 Students in Needs Improvement	% Grade 7 Students in Needs Improvement - Health Risk	Total Tested <sup>1</sup> in Grade 9	Number Grade 9 Students in HFZ <sup>2</sup>	% Grade 9 Students in HFZ	% Grade 9 Students in Needs Improvement	% Grade 9 Students in Needs Improvement - Health Risk
Aerobic Capacity	0	0	0.0	0.0	0.0	0	0	0.0	0.0	0.0	475	405	85.3	9.5	5.2
Body Composition	0	0	0.0	0.0	0.0	0	0	0.0	0.0	0.0	475	281	59.2	17.5	23.3
Abdominal Strength	0	0	0.0	0.0	N/A	0	0	0.0	0.0	N/A	475	429	90.3	9.7	N/A
Trunk Extension Strength	0	0	0.0	0.0	N/A	0	0	0.0	0.0	N/A	475	444	93.5	6.5	N/A
Upper Body Strength	0	0	0.0	0.0	N/A	0	0	0.0	0.0	N/A	475	354	74.5	25.5	N/A
Flexibility	0	0	0.0	0.0	N/A	0	0	0.0	0.0	N/A	475	450	94.7	5.3	N/A

<sup>1</sup> Includes partially tested students

<sup>2</sup> HFZ is an acronym for Healthy Fitness Zone a registered trademark of The Cooper Institute

\*\* To protect confidentiality scores are not shown when the number of students tested is 10 or less

N/A Not applicable

The PFT is based on the FITNESSGRAM/ACTIVITYGRAM software, owned by the Cooper Institute, Dallas, TX, and published by Human Kinetics, Champaign, IL. The PFT is created and copyrighted by the California Department of Education (CDE) under a license agreement with Human Kinetics. The FITNESSGRAM is a registered trademark of The Cooper Institute.

The PFT performance standards are available on the [CDE FITNESSGRAM: Healthy Fitness Zone Charts Web page](#). Information about the FITNESSGRAM is available on the [Human Kinetics Web site](#) (Outside Source).

Questions: High School and Physical Fitness Assessment Office | [pft@cde.ca.gov](mailto:pft@cde.ca.gov) | 916-445-9449

California Department of Education  
 1430 N Street  
 Sacramento, CA 95814

Web Policy



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## Physical Fitness Test

Report:

California Department of Education  
Statewide Assessment Division  
Prepared: 5/15/2015 1:18:41 PM

State: [California](#)  
County: [Monterey](#)  
District: [Salinas City Elementary](#)  
School: Natividad Elementary

### 2013-14 California Physical Fitness Report Overall - Summary of Results Natividad Elementary

Additional information can be found at the California Department of Education [Physical Fitness Test Web page](#).

Physical Fitness Area	Total Tested <sup>1</sup> in Grade 5	Number Grade 5 Students in HFZ <sup>2</sup>	% Grade 5 Students in HFZ	% Grade 5 Students in Needs Improvement	% Grade 5 Students in Needs Improvement - Health Risk	Total Tested <sup>1</sup> in Grade 7	Number Grade 7 Students in HFZ <sup>2</sup>	% Grade 7 Students in HFZ	% Grade 7 Students in Needs Improvement	% Grade 7 Students in Needs Improvement - Health Risk	Total Tested <sup>1</sup> in Grade 9	Number Grade 9 Students in HFZ <sup>2</sup>	% Grade 9 Students in HFZ	% Grade 9 Students in Needs Improvement	% Grade 9 Students in Needs Improvement - Health Risk
Aerobic Capacity	95	45	47.4	34.7	17.9	0	0	0.0	0.0	0.0	0	0	0.0	0.0	0.0
Body Composition	95	38	40.0	25.3	34.7	0	0	0.0	0.0	0.0	0	0	0.0	0.0	0.0
Abdominal Strength	95	71	74.7	25.3	N/A	0	0	0.0	0.0	N/A	0	0	0.0	0.0	N/A
Trunk Extension Strength	95	91	95.8	4.2	N/A	0	0	0.0	0.0	N/A	0	0	0.0	0.0	N/A
Upper Body Strength	95	55	57.9	42.1	N/A	0	0	0.0	0.0	N/A	0	0	0.0	0.0	N/A
Flexibility	95	77	81.1	18.9	N/A	0	0	0.0	0.0	N/A	0	0	0.0	0.0	N/A

<sup>1</sup> Includes partially tested students

<sup>2</sup> HFZ is an acronym for Healthy Fitness Zone a registered trademark of The Cooper Institute

\*\* To protect confidentiality scores are not shown when the number of students tested is 10 or less

N/A Not applicable

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The PFT performance standards are available on the [CDE FITNESSGRAM: Healthy Fitness Zone Charts Web page](#). Information about the FITNESSGRAM is available on the [Human Kinetics Web site](#) (Outside Source).

Questions: High School and Physical Fitness Assessment Office | [pft@cde.ca.gov](mailto:pft@cde.ca.gov) | 916-445-9449

California Department of Education  
1430 N Street  
Sacramento, CA 95814

Web Policy



CDE Home » DataQuest » Report Results

## Physical Fitness Test

Report:  

California Department of Education  
Statewide Assessment Division  
Prepared: 5/15/2015 1:19:12 PM

State: [California](#)  
County: [Monterey](#)  
District: [Salinas City Elementary](#)  
School: El Gabilan Elementary

### 2013-14 California Physical Fitness Report Overall - Summary of Results El Gabilan Elementary

Additional information can be found at the California Department of Education [Physical Fitness Test Web page](#).

Physical Fitness Area	Total Tested <sup>1</sup> in Grade 5	Number Grade 5 Students in HFZ <sup>2</sup>	% Grade 5 Students in HFZ	% Grade 5 Students in Needs Improvement	% Grade 5 Students in Needs Improvement - Health Risk	Total Tested <sup>1</sup> in Grade 7	Number Grade 7 Students in HFZ <sup>2</sup>	% Grade 7 Students in HFZ	% Grade 7 Students in Needs Improvement	% Grade 7 Students in Needs Improvement - Health Risk	Total Tested <sup>1</sup> in Grade 9	Number Grade 9 Students in HFZ <sup>2</sup>	% Grade 9 Students in HFZ	% Grade 9 Students in Needs Improvement	% Grade 9 Students in Needs Improvement - Health Risk
Aerobic Capacity	99	58	58.6	32.3	9.1	0	0	0.0	0.0	0.0	0	0	0.0	0.0	0.0
Body Composition	99	49	49.5	25.3	25.2	0	0	0.0	0.0	0.0	0	0	0.0	0.0	0.0
Abdominal Strength	99	56	56.6	43.4	N/A	0	0	0.0	0.0	N/A	0	0	0.0	0.0	N/A
Trunk Extension Strength	99	84	84.8	15.2	N/A	0	0	0.0	0.0	N/A	0	0	0.0	0.0	N/A
Upper Body Strength	99	39	39.4	60.6	N/A	0	0	0.0	0.0	N/A	0	0	0.0	0.0	N/A
Flexibility	99	65	65.7	34.3	N/A	0	0	0.0	0.0	N/A	0	0	0.0	0.0	N/A

<sup>1</sup> Includes partially tested students

<sup>2</sup> HFZ is an acronym for Healthy Fitness Zone a registered trademark of The Cooper Institute

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## How much physical activity do adults need?

Physical activity is anything that gets your body moving. According to the *2008 Physical Activity Guidelines for Americans*, you need to do two types of physical activity each week to improve your health—**aerobic** and **muscle-strengthening**.

### For Important Health Benefits

Adults need at least:



2 hours and 30 minutes (150 minutes) of **moderate-intensity aerobic activity**

(</physicalactivity/everyone/glossary/index.html#mod-intensity>) (i.e., brisk walking) every week and



**muscle-strengthening activities** (</physicalactivity/everyone/glossary/index.html#muscle-strength>) on 2 or more days a week that work all major muscle groups (legs, hips, back, abdomen, chest, shoulders, and arms).

OR



1 hour and 15 minutes (75 minutes) of **vigorous-intensity aerobic activity**

(</physicalactivity/everyone/glossary/index.html#vig-intensity>) (i.e., jogging or running) every week and



**muscle-strengthening activities** (</physicalactivity/everyone/glossary/index.html#muscle-strength>) on 2 or more days a week that work all major muscle groups (legs, hips, back, abdomen, chest, shoulders, and arms).

OR



An equivalent mix of moderate- and vigorous-intensity **aerobic activity**

(</physicalactivity/everyone/glossary/index.html#aerobic>) and



**muscle-strengthening activities**

(</physicalactivity/everyone/glossary/index.html#muscle-strength>) on 2 or more days a week that work all major muscle groups (legs, hips, back, abdomen, chest, shoulders, and arms).



Need more help with the guidelines?

Watch this video:



(<http://streaming.cdc.gov/vod.php?id=faa9d80d8cbf4237dde33008ad0e58a020111024101218945>)  
 Windows Media Player, 4:43

[More videos \(/physicalactivity/everyone/videos/index.html\)](/physicalactivity/everyone/videos/index.html)

### 10 minutes at a time is fine

We know 150 minutes each week sounds like a lot of time, but it's not. That's 2 hours and 30 minutes, about the same amount of time you might spend watching a movie. The good news is that you can spread your activity out during the week, so you don't have to do it all at once. You can even break it up into smaller chunks of time during the day. It's about what works best for you, as long as you're doing physical activity at a moderate or vigorous effort for at least 10 minutes at a time.

### For Even *Greater* Health Benefits

Older adults should increase their activity to:



5 hours (300 minutes) each week of **moderate-intensity aerobic activity**

(</physicalactivity/everyone/glossary/index.html#mod-intensity>) and



**muscle-strengthening activities** (</physicalactivity/everyone/glossary/index.html#muscle-strength>) on 2 or more days a week that work all major muscle groups (legs, hips, back, abdomen, chest, shoulders, and arms).

OR



2 hours and 30 minutes (150 minutes) each week of **vigorous-intensity aerobic activity**

(</physicalactivity/everyone/glossary/index.html#vig-intensity>) and



**muscle-strengthening activities** (</physicalactivity/everyone/glossary/index.html#muscle-strength>) on 2 or more days a week that work all major muscle groups (legs, hips, back, abdomen, chest, shoulders, and arms).

More time equals more health benefits. If you go beyond 300 minutes a week of moderate-intensity activity, or 150 minutes a week of vigorous-intensity activity, you'll gain even more health benefits.

OR



An equivalent mix of moderate- and vigorous-intensity [aerobic activity](/physicalactivity/everyone/glossary/index.html#aerobic) (</physicalactivity/everyone/glossary/index.html#aerobic>) and

[muscle-strengthening activities](/physicalactivity/everyone/glossary/index.html#muscle-strength) (</physicalactivity/everyone/glossary/index.html#muscle-strength>) on 2 or more days a week that work all major muscle groups (legs, hips, back, abdomen, chest, shoulders, and arms).

## Aerobic activity – what counts?

Aerobic activity or "cardio" gets you breathing harder and your heart beating faster. From pushing a lawn mower, to taking a dance class, to biking to the store – all types of activities count. As long as you're doing them at a moderate or vigorous intensity for at least 10 minutes at a time.

Intensity is how hard your body is working during aerobic activity.

How do you know if you're doing light, moderate, or vigorous intensity aerobic activities? For most people, light daily activities such as shopping, cooking, or doing the laundry doesn't count toward the guidelines. Why? Your body isn't working hard enough to get your heart rate up.

Moderate-intensity aerobic activity means you're working hard enough to raise your heart rate and break a sweat. One way to tell is that you'll be able to talk, but not sing the words to your favorite song. Here are some examples of activities that require moderate effort:

- Walking fast
- Doing water aerobics
- Riding a bike on level ground or with few hills
- Playing doubles tennis
- Pushing a lawn mower

Vigorous-intensity aerobic activity means you're breathing hard and fast, and your heart rate has gone up quite a bit. If you're working at this level, you won't be able to say more than a few words without pausing for a breath. Here are some examples of activities that require vigorous effort:

- Jogging or running
- Swimming laps
- Riding a bike fast or on hills
- Playing singles tennis
- Playing basketball

You can do moderate- or vigorous-intensity aerobic activity, or a mix of the two each week. A rule of thumb is that 1 minute of vigorous-intensity activity is about the same as 2 minutes of moderate-intensity activity.

Some people like to do vigorous types of activity because it gives them about the same health benefits in half the time. If you haven't been very active lately, increase your activity level slowly. You need to feel comfortable doing moderate-intensity activities before you move on to more vigorous ones. The guidelines are about doing physical activity that is right for you.

For more examples, see [Measuring Physical Activity](/physicalactivity/everyone/measuring/index.html). (</physicalactivity/everyone/measuring/index.html>)

## Muscle-strengthening activities – what counts?

Besides aerobic activity, you need to do things to strengthen your muscles at least 2 days a week. These activities should work all the major muscle groups of your body (legs, hips, back, chest, abdomen, shoulders, and arms).

To gain health benefits, muscle-strengthening activities need to be done to the point where it's hard for you to do another repetition without help. A repetition is one complete movement of an activity, like lifting a weight or doing a sit-up. Try to do 8–12 repetitions per activity that count as 1 set. Try to do at least 1 set of muscle-strengthening activities, but to gain even more benefits, do 2 or 3 sets.



(</physicalactivity/everyone/videos/index.html>)

[More videos](/physicalactivity/everyone/videos/index.html) (</physicalactivity/everyone/videos/index.html>)

For more help with what counts as aerobic activity, [watch this video](#):



(<http://streaming.cdc.gov/id=e6e0389dc5b6ce24384/>)

Windows Media Player,

4:48

[More videos](#)

(</physicalactivity/everyone/vid>)

Build up over time  
If you want to do more vigorous-level activities, slowly replace those that take moderate effort like brisk walking, with more vigorous activities like jogging.



Learn how to strengthen your muscles at home (</physicalactivity/everyone/videos/index.html>) and in the gym (</physicalactivity/everyone/videos/index.html>).

You can do activities that strengthen your muscles on the same or different days that you do aerobic activity, whatever works best. Just keep in mind that muscle-strengthening activities don't count toward your aerobic activity total.

There are many ways you can strengthen your muscles, whether it's at home or the gym. You may want to try the following:

- Lifting weights
- Working with resistance bands
- Doing exercises that use your body weight for resistance (i.e., push ups, sit ups)
- Heavy gardening (i.e., digging, shoveling)
- Yoga

### What if you have a disability?

If you are an adult with a disability, regular physical activity can provide you with important health benefits, like a stronger heart, lungs, and muscles, improved mental health, and a better ability to do everyday tasks. It's best to talk with your health care provider before you begin a physical activity routine. Try to get advice from a professional with experience in physical activity and disability. They can tell you more about the amounts and types of physical activity that are appropriate for you and your abilities. If you are looking for additional information, visit [The National Center on Physical Activity and Disability](http://www.nepad.org) (<http://www.nepad.org>).

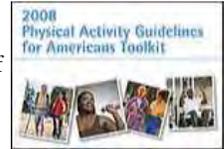
### Tips on Getting Active

[Adding Physical Activity to Your Life](/physicalactivity/everyone/getactive/index.html) (</physicalactivity/everyone/getactive/index.html>)

If you're thinking, "How can I meet the guidelines each week?" don't worry. You'll be surprised by the variety of activities you have to choose from.

[Be Active Your Way: A Guide for Adults](http://www.health.gov/paguidelines/pdf/adultguide.pdf)  [PDF-1.07 MB]  
(<http://www.health.gov/paguidelines/pdf/adultguide.pdf>)

Based on the 2008 Physical Activity Guidelines for Americans, this brochure can help you decide the number of days, types of activities, and times that fit your schedule.



### They did it. So can you!



[Alex, age 32](/physicalactivity/everyone/success/alex.html) (</physicalactivity/everyone/success/alex.html>) "After a knee injury, I decided I needed to be more active and make a lifestyle change."



[Demetrise, age 42](/physicalactivity/everyone/success/demetrise.html) (</physicalactivity/everyone/success/demetrise.html>) "I have started exercising regularly to calm down and reduce stress."



[Susan, age 45](/physicalactivity/everyone/success/susan.html) (</physicalactivity/everyone/success/susan.html>) "Being active helps me keep up with my kids."

Page last reviewed: December 1, 2011

Page last updated: March 3, 2014

Content source: [Division of Nutrition, Physical Activity and Obesity](#), [National Center for Chronic Disease Prevention and Health Promotion](#)

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## Physical Activity Guidelines for Adolescents: Consensus Statement

**James F. Sallis and Kevin Patrick**

The International Consensus Conference on Physical Activity Guidelines for Adolescents convened to review the effects of physical activity on the health of adolescents, to establish age-appropriate physical activity guidelines, and to consider how these guidelines might be implemented in primary health care settings. Thirty-four invited experts and representatives of scientific, medical, and governmental organizations established two main guidelines. First, all adolescents should be physically active daily or nearly every day as part of their lifestyles. Second, adolescents should engage in three or more sessions per week of activities that last 20 min or more and that require moderate to vigorous levels of exertion. Available data suggest that the vast majority of U.S. adolescents meet the first guideline, but only about two thirds of boys and one half of girls meet the second guideline. Physical activity has important effects on the health of adolescents, and the promotion of regular physical activity should be a priority for physicians and other health professionals.

The numerous health benefits of physical activity in adults have been extensively documented (1). The weight of scientific evidence has led to the development of specific exercise guidelines for the general population of adults (2), the recognition of physical inactivity as a major risk factor for cardiovascular diseases (3), and national health objectives to promote regular physical activity and decrease inactivity (4).

Physical activity has the potential to confer health benefits on children and adolescents as well. Several national medical and professional organizations have issued opinion statements, resolutions, or guidelines for youth physical activity (5, 6, 7, 8). The U.S. national health promotion and disease prevention objectives (4) include goals for increasing physical activity of children and adolescents, and the American Medical Association's *Guidelines for Adolescent Preventive Services* (8) recommend physician counseling to promote regular physical activity in adolescents. However, the existing opinion statements and guidelines are based primarily on studies of adults, and some scientists and practitioners may not

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expected. Three types of high-risk adolescents were identified; the obese, diabetics, and those with family histories of heart disease or hypercholesterolemia. For the obese and those with family histories, there is some evidence that physical activity is effective in increasing HDL cholesterol.

Studies have examined associations of physical activity with a wide variety of psychosocial variables in adolescence, most commonly depression, anxiety/stress, and self-esteem/self-concept (16). Most studies are on general population samples, and the majority of studies of each outcome find significant effects. To improve psychological health, the general population of adolescent boys and girls should engage in aerobic activities three times per week, for 20 min per occasion, at an intensity of 70% of maximum heart rate. Significant beneficial effects are obtained after 10 to 15 weeks of training. No recommendations could be developed based on studies of adolescents with clinical psychological disorders.

Injuries are the leading cause of death in adolescence, but physical activity and sports account for only about 5% of mortal injuries (17). Musculoskeletal injuries during the growing years of adolescence are of particular concern because of the vulnerability of the growth plates in the long bones. Although rare, injuries induced by forceful collisions during sports or by overuse during recreational physical activity have the potential to produce permanent damage to growing bones and to increase the risk of musculoskeletal problems in years later. The studies in this area typically report the types of injuries in adolescents and do not document rates of injuries or risk factors. No data are available on the risks of recreational activities, but injury rates for specific high school and college team sports indicate that football and wrestling are among the riskiest sports. Interpretation of these data is complicated by the different definitions of injury and varying levels of severity. No physical activity guidelines could be developed based on existing data on adolescents.

## **Physical Activity Guidelines for Adolescents**

This systematic examination of the adolescent literature on physical activity and various health outcomes, in the context of the extensive adult literature, provides the background for the most informed guidelines that can be developed at the present time. There are a number of general considerations that form the background for the recommendations.

There are two health-related rationales for adolescent physical activity. One is to promote physical and psychological health and well-being during adolescence. The second is to promote physical activity to enhance future health by increasing the probability of remaining active as an adult. It is believed that adolescents who develop a habit of participating in activities that can be carried over into adulthood will be more likely to remain active. These are typically thought of as activities that can be done by oneself or with one other person.

There are multiple health benefits of physical activity, and many expected positive outcomes have not yet been studied in adolescents. While physical activity entails some risk of injury, there was strong consensus that the benefits far outweigh the risks. Participating in a variety of activities that work different

parts of the body provides more health benefits, improves more fitness components, and teaches more activity skills that may allow the adolescent to be active in a variety of settings.

Adolescents involved in a decision-making process that allows them to select enjoyable and preferred activities are believed to be more likely to continue activity than are adolescents who participate in activities they perceive as physically or psychologically aversive. For those who are starting at a lower level of activity than recommended, gradual increases in physical activity over time are suggested.

Most adolescents can benefit from increasing their participation in physical activity. Many adolescents may want to exceed the guidelines because of an interest in athletics, recreational pursuits, or work demands. A small percentage of adolescents may engage in excessive amounts of physical activity that are associated with injuries, eating disorders or menstrual dysfunction. The following guidelines provide an amount of physical activity that is adequate for health maintenance for the general population of adolescents. The optimal amount of physical activity for health is not known.

## General Population Recommendations

### **Guideline 1**

*All adolescents should be physically active daily, or nearly every day, as part of play, games, sports, work, transportation, recreation, physical education, or planned exercise, in the context of family, school, and community activities.*

Adolescents should do a variety of physical activities as part of their daily lifestyles. These activities should be enjoyable, involve a variety of muscle groups, and include some weight bearing activities. The intensity or duration of the activity is probably less important than the fact that energy is expended and a habit of daily activity is established. Adolescents are encouraged to incorporate physical activity into their lifestyles by doing such things as walking up stairs, walking or riding a bicycle for errands, having conversations while walking with friends, parking at the far end of parking lots, and doing household chores.

**Rationale.** Daily weight-bearing activities, of even brief duration, during adolescence are critical for enhancing bone development that affects skeletal health throughout life. Substantial daily energy expenditure is expected to reduce risk of obesity and may have other positive health effects that have not been documented.

Though it is desirable to have a quantitative recommendation for daily physical activity, the available data do not support such a specific recommendation. Objective 1.3 from *Healthy People 2000* (4) is similar to the present recommendation, and provides a quantitative benchmark that can be used until more data are available. The objective is to “increase to at least 30 percent the proportion of people aged 6 and older who engage regularly, preferably daily, in light to moderate physical activity, for at least 30 minutes per day” (4, p. 97). Recently issued guidelines from the Centers for Disease Control and Prevention and the American College of Sports Medicine (18) also state that adults should accumulate at least 30 min of moderate physical activity on most, preferably all, days of the week. Thus, it is reasonable to recommend this as a minimal amount of physical activity for adolescents.

**Guideline 2**

*Adolescents should engage in three or more sessions per week of activities that last 20 min or more at a time and that require moderate to vigorous levels of exertion.*

Moderate to vigorous activities are those that require at least as much effort as brisk or fast walking. A diversity of activities that use large muscle groups are recommended as part of sports, recreation, chores, transportation, work, school physical education, or planned exercise. Examples include brisk walking, jogging, stair climbing, basketball, racquet sports, soccer, dance, swimming laps, skating, strength (resistance) training, lawn mowing, strenuous housework, cross-country skiing, and cycling.

**Rationale.** There is evidence that regular participation in continuous moderate to vigorous physical activity during adolescence enhances psychological health, increases HDL cholesterol, and increases cardiorespiratory fitness. Physical activity probably improves other health variables that have not yet been investigated in adolescents. It is not known whether more frequent, shorter sessions of physical activity would provide some of the same benefits.

**Issues for Special Populations**

For some subgroups, additional benefits have been documented. For obese adolescents, physical activity is an important adjunct to dietary change for weight control, and regular energy expenditure through physical activity appears to be essential for weight loss maintenance. For adolescents with high blood pressure, moderate to vigorous physical activity, three or four times per week, can be effective in reducing blood pressure.

As much as possible, adolescents with special needs should be encouraged and supported to meet the above guidelines. Some adolescents will require special assistance to meet the guidelines, and the type of assistance needed will vary widely based on the specific condition or disability. Even adolescents with significantly impaired mobility will benefit by being physically active, though they may need substantial encouragement and assistance to become more active.

**Implementation of the Guidelines*****Descriptive Epidemiology***

Before interventions are developed to increase adolescent physical activity, it is essential to know what proportion of adolescents are meeting the guidelines and what proportion are judged to need intervention. Results from a few national studies and several small sample studies suggest that the average adolescent in the U.S. spends approximately 60 min (study means range between 30 min and 120 min) per day doing some type of physical activity, broadly defined (19). Thus, although it is difficult to quantify, the majority of adolescents appear to meet the first recommendation of daily or nearly daily physical activity. The second recommendation of three or more sessions per week of moderate to vigorous activity represents a more structured definition of physical activity.



# The American Heart Association Recommendations for Physical Activity in Kids

**At least** **60** **minutes** of *moderate- to vigorous-intensity* aerobic activity **Every** **day**



© 2015 Learn more at [heart.org/KidsActivityRecommendations](http://heart.org/KidsActivityRecommendations).



## Protect AB 32: Clean Air Saves Lives and Money

### *Health and medical leaders fight to protect California's clean air policies*

The American Lung Association in California and leading health and medical organizations throughout the state support California's vital clean air leadership. We call on California's elected leaders to uphold our clean air laws and protect public health by:

- ≠ Promoting AB 32 (the state's landmark climate law) and California's leadership in setting strong clean air standards to transition California to a clean energy economy and protect public health.
- ≠ Supporting California's innovative and life-saving programs to implement AB 32 including: Low Carbon Fuel Standard, Advanced Clean Cars, SB 375 Sustainable Communities planning efforts and other key clean air programs.
- ≠ Fighting efforts to weaken, delay or undermine California's clean air and clean energy standards.

### California's Innovative Clean Air Programs Providing Critical Public Health Benefits Today

- ≠ **\$8.3 billion in avoided health costs by 2025 from reduced air pollution<sup>1</sup>**  
When fully implemented, the transition to cleaner fuels as a result of the Low Carbon Fuel Standard and transportation fuels component of the Cap and Trade program will save lives and billions in costs, including:
  - 900 fewer premature deaths and 600 fewer heart attacks
  - 38,000 fewer asthma attacks and 74,000 fewer lost work days
- ≠ **Equal to taking 6.5 million cars off the roads since 2006<sup>2</sup>**
  - In its first two years, the AB 32 clean fuel program alone:
    - Saved California 2 billion gallons of gasoline in 2 years (about two months' worth of total state consumption)<sup>3</sup>
- ≠ **Fuel cost savings of up to \$400 per year by 2020<sup>4</sup>**
  - Attracted more than \$20 billion in clean energy investment<sup>5</sup>
    - the clean economy now employs over 310,000 workers
  - 100,000 Zero Emission Vehicles on the roads<sup>6</sup>
    - 18 advanced technology models now available, more on the way
- ≠ **\$832 million from AB 32 Cap and Trade auction proceeds invested in California this year<sup>7</sup>**
  - \$230 million to benefit disadvantaged communities for energy efficiency and renewables, cleaner cars, expanded public transit, and more affordable housing.

<sup>1</sup> American Lung Association in California and Environmental Defense Fund, *Driving California Forward*. 2014.

<sup>2</sup> Fact Sheet on SB 1125, AB 32 Beyond 2020 <http://www.arb.ca.gov/cc/capandtrade/auctionproceeds/summaryproceedsappropriations.pdf>

<sup>3</sup> Institute of Transportation Studies, UC Davis, 2013 <http://insideclimatenews.org/news/20130606/california%E2%80%99s-low-carbon-fuel-rule-working-study-says-threats-loom>

<sup>4</sup> California Air Resources Board, 2014, [http://www.arb.ca.gov/cc/scopingplan/document/economic\\_appendix4.pdf](http://www.arb.ca.gov/cc/scopingplan/document/economic_appendix4.pdf)

<sup>5</sup> Fact Sheet on SB 1125, AB 32 Beyond 2020 <http://www.arb.ca.gov/cc/capandtrade/auctionproceeds/summaryproceedsappropriations.pdf>

<sup>6</sup> LA Times, 9/2014 <http://www.latimes.com/business/autos/la-fi-hy-plug-in-electric-cars-sales-california-20140909-story.html>

<sup>7</sup> 2014 California Air Resources Board <http://www.arb.ca.gov/cc/capandtrade/auctionproceeds/summaryproceedsappropriations.pdf>

## The Facts

### Air pollution harms public health in California

- ≠ Eight in 10 Californians live in areas with unhealthy air according to the American Lung Association's *State of the Air 2014* report.<sup>8</sup>
- ≠ Children, the elderly, low income individuals, communities of color and those with lung and heart illness face the highest risks when air quality is poor.
- ≠ Public health toll of air pollution includes:
  - Over 9,000 premature deaths from air pollution annually<sup>9</sup>
  - Children living in polluted areas experience slowed lung development
- ≠ Air pollution triggers asthma attacks and leads to public health emergencies.
  - Approximately 3.7 million adults (13%) and 1.2 million children (12.4%) in California have been diagnosed with asthma.<sup>10</sup>
- ≠ Dirty air puts an undue and costly burden on California's healthcare system:
  - Unhealthy air cost \$193 million in hospital admissions, ER visits in 2005-07.<sup>11</sup>
  - Health and economic costs of dirty air of nearly \$6 billion in the San Joaquin Valley and almost \$22 billion in Los Angeles region.<sup>12</sup>

### Oil companies and big polluters are spending millions to undermine AB 32, while pocketing record profits:

- ≠ Last year, oil companies spent \$13.5 million – **over \$37,000 per day** – lobbying to delay and weaken California's clean energy laws to keep us hooked on oil.
- ≠ Since 2009, when the AB 32 clean fuel program (LCFS) was passed, the oil industry has spent \$60 million lobbying in Sacramento, led by \$25 million spent by the Western States Petroleum Association (WSPA).<sup>13</sup>
- ≠ The oil industry invests 50 times more on dirty fuels than clean, alternative fuels.<sup>14</sup>

### California clean air laws are critical to clean up California fuels, cars and trucks

- ≠ Pollution from cars, trucks and our over-dependence on dirty fossil fuels are the main culprit causing our air pollution burden and its huge health toll.
- ≠ Each year, our dependence on dirty fuels for passenger vehicles causes almost \$15 billion in health and economic costs<sup>15</sup>.
- ≠ The LCFS will reduce carbon pollution by 10 percent by 2020 and fills a critical gap by ensuring that oil companies are actually investing significantly in alternatives as opposed to just saying they are.

<sup>8</sup> American Lung Association. [State of the Air](#). 2014.

<sup>9</sup> California Air Resources Board: [Estimate of Premature Deaths Associated with Fine Particulate Matter in California](#), 2010.

<sup>10</sup> California Breathing, California Department of Public Health. [Asthma in California: A Surveillance Report](#). 2013.

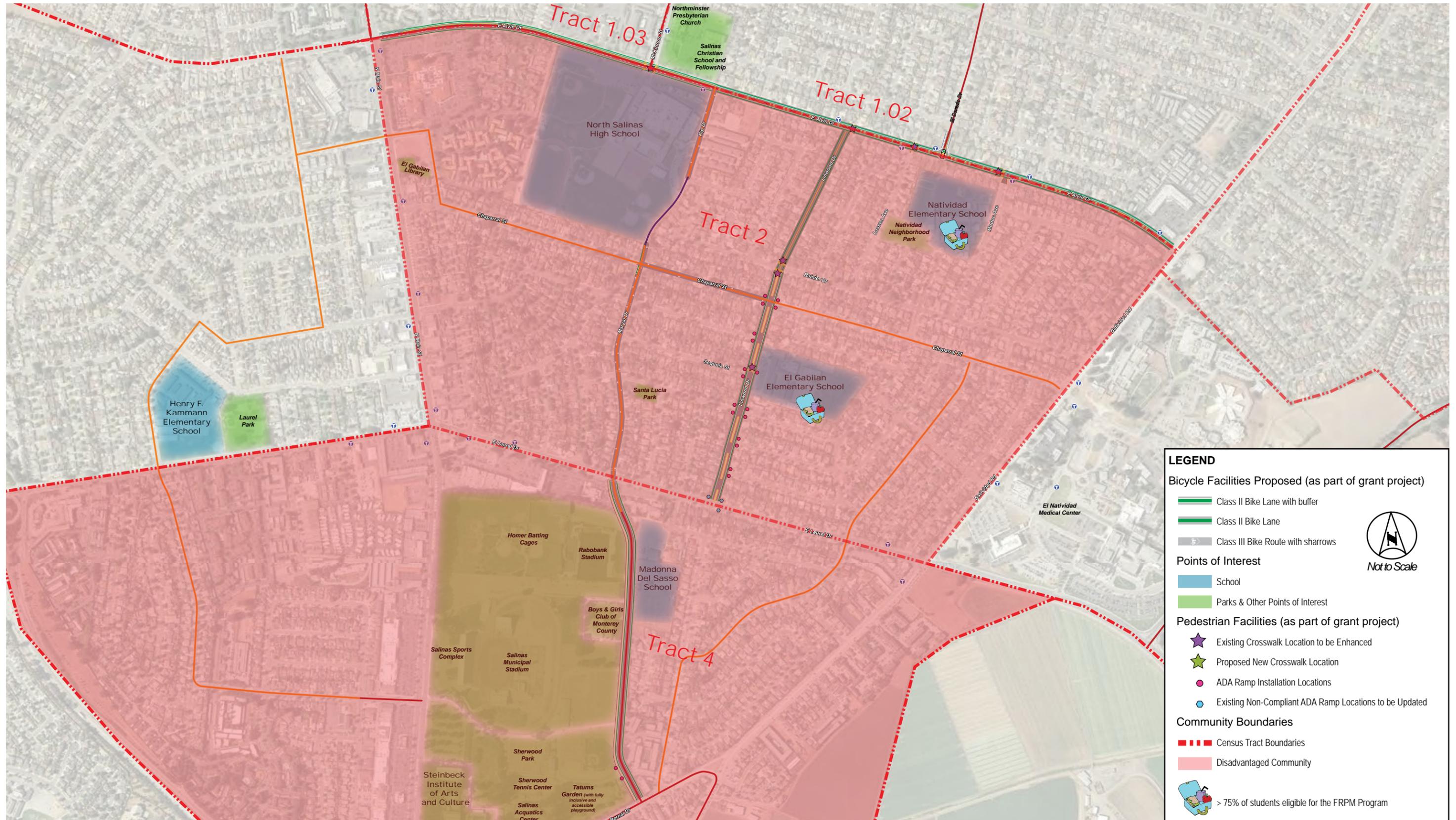
<sup>11</sup> RAND Corporation. [The Impact of Air Quality on Hospital Spending](#). 2010.

<sup>12</sup> California State University, Fullerton. [Dirty Air Costs California Economy \\$28 Billion Annually](#), 2008.

<sup>13</sup> California Secretary of State, [Cal-access campaign](#) and lobbying finance database.

<sup>14</sup> Natural Resources Defense Council, Mui. Simon. [Oil Companies' Investments in Dirty Fuels Outpacing Clean Fuels by Fifty Times](#). 2011.

<sup>15</sup> American Lung Association in California [Road to Clean Air](#), 2011.





# ACTIVE TRANSPORTATION



**BENEFIT-COST ANALYSIS TOOL** *Version 1.0*

**Project Name:**  
**Project Location:**

City of Salinas Alvin Drive Safe Routes to School Improvements
Alvin Drive and Linwood Drive, Salinas

**INFRASTRUCTURE**

<b>Bike Projects (Daily Person Trips for All Users) (Box 1A)</b>			
	Without Project		With Project
Existing	56		
Forecast (1 Yr after completion)	62		84
	Commuters		Recreational Users
Existing Trips	6		18
New Daily Trips (estimate) (1 YR after completion) (actual)	3.08		3.08

<b>Project Information- Non SR2S Infrastructure</b>		
Bike Class Type		Bike Class II
Average Annual Daily Traffic (AADT)		19,655

<b>Project Costs (Box 1D)</b>	
Non-SR2S Infrastructure Project Cost	
SR2S Infrastructure Project Cost	\$2,958,700

<b>ATP Requested Funds (Box 1E)</b>	
Non-SR2S Infrastructure	
SR2S Infrastructure	\$2,958,700

<b>CRASH DATA (Box 1F)</b>		
	Last 5 Yrs	Annual Average
Fatal Crashes	0	0
Injury Crashes	20	4
PDO	20	4

<b>Pedestrian Projects (Daily Person Trips for All Users) (Box 1B)</b>			
	Without Project		With Project
Existing	530		
Forecast (1 YR after project completion)	583		795
	Without Project		With Project
Existing step counts (600 steps=0.3mi=1 trip)			
Existing miles walked			

<b>SAFETY COUNTERMEASURES (improvements) (Box 1G)</b>			Y or N (Capitalized)
Signalized Intersection	Pedestrian countdown signal heads		N
	Pedestrian crossing		N
	Advance stop bar before crosswalk		N
	Install overpass/underpass		N
Unsignalized Intersection	Raised medians/refuge islands		Y
	Pedestrian crossing (new signs and markings only)		Y
	Pedestrian crossing (safety features/curb extensions)		Y
	Pedestrian signals		N
Roadways	Bike lanes		Y
	Sidewalk/pathway (to avoid walking along roadway)		Y
	Pedestrian crossing (with enhanced safety features)		Y
	Pedestrian crossing		Y
<b>Other reduction factor countermeasures</b>			Y

<b>Safe Routes to School (SR2S) (Box 1C)</b>	
	Total
Number of student enrollment	3,394
Approximate no. of students living along school route proposed for improvement	2035
Percentage of students that currently walk or bike to school	37.00%
Projected percentage of students that will walk or bike to school after the project	45.00%

**ESTIMATED SAFETY BENEFITS FROM POTENTIAL CRASH REDUCTION**

Countermeasures			OTHER REDUCTION FACTOR
Crash Reduction Factors (CRFs)			10%
Service Life			5
	1st year		\$0

	Fatal	Injury	PDO	Total
Frequency	0	0	0	0
Cost/crash	\$3,750,837	\$80,000	\$6,924	

**SAFE ROUTES TO SCHOOL**

**Infrastructure**

**Before Project**

No. of students enrollment	3,394
Approximate no. of students living along school route proposed for improvement	2035
Percent that currently walks/bikes to school	37%
Number of students that walk/bike to school	752.95

**After Project**

No. of students enrollment	3,394
Approximate no. of students living along school route proposed for improvement	2035
Projected percentage of students that will walk or bike because of the project	45%
Number of students that will walk/bike to school after the project	915.75

ATP Shift	58,608
Fuels Saved	\$9,992.66
Emissions Saved	\$732.60

Annual Mobility Benefits	\$381,975
Annual Health Benefits	\$23,826
Annual Safety Benefits	\$189,904
Fuel and Emissions Saved	\$10,725
Recreational Benefits	\$0

**Assumptions:**

- 1) 180 school days
- 2) 2 miles distance to school = 1 hour walk
- 3) Takes 1 hour back and forth to school grounds, used distance of 1 mile (composite for bike and walk)
- 4) Approximate no. of students living along school route proposed for improvement- we used this number for before and after to get an actual increase number of ATP users or corresponding percentage.
- 5) We used the value of time for adults for SR2S since we did not quantify parents' time, and the community in general. Value of time for adults \$13.03 vs. \$5.42 for kids.
- 6) Safety benefits are assumed to be the same as non-SRTS infrastructure projects.

Did not quantify recreational benefits for SR2S Infrastructure projects.

**20 Year Invest Summary Analysis**

Total Costs	\$2,958,700.00
Net Present Cost	\$2,844,903.85
Total Benefits	\$23,955,009.05
Net Present Benefit	\$15,864,911.77
Benefit-Cost Ratio	5.58

**20 Year Itemized Savings**

Mobility	\$11,318,561.52
Health	\$1,620,831.78
Recreational	\$1,391,640.85
Gas & Emissions	\$395,655.67
Safety	\$9,228,319.23

Funds Requested	\$2,958,700.00
Net Present Cost of Funds Requested	\$2,844,903.85
Benefit Cost Ratio	5.58

**ESTIMATED DAILY MOBILITY BENEFITS FROM THE PROJECT**

<b>Current Walk Counts</b>	
Total miles walked	0.00
Total person Trips walked	530.00
Total Steps walked	0.00

<b>After the Project is Completed</b>	
Total miles walked	0.00
Total person trips walked	795.00
Total Steps walked	0.00

Converted miles walked to trips	0
Difference of person trips walked	265
Converted steps walked to trips	0

<b>Current Bike Counts</b>	
Existing Commuters	6
New Commuters	3

<b>Benefits, 2014 values</b>	
Annual Mobility Benefit (Walking)	\$66,250
Annual Mobility Benefit (Biking)	\$17,610.05

<b>Total Annual Mobility Benefits</b>	<b>\$83,860</b>
---------------------------------------	-----------------

**Project Types**

For M values:

- 20.38 min/trip OFF STREET
- 18.02 min/trip ON STREET w/o parking benefit
- 15.83 min/trip ON STREET w/ parking benefit

\$13.03 Value of Time

600 steps=0.3mi=1 trip

\$1 Value of Total Pedestrian Environmental Impacts per trip

Sources:

NCHRP 552 Methodology (Biking)

Heuman (2006) as reported by UK Dept of Transport and Guidance (walking)

**YEARLY ESTIMATED HEALTH BENEFITS FROM THE PROJECT**

**INFRASTRUCTURE**

**Cycling:**

New Cyclists 28

Value of Health (ave.annual) \$146

Annual Health Benefits \$4,098

GDP Deflator

2006 0.9429

2014 1.0781

**Walking:**

New Walkers 265

Value of Health \$146

Annual Health Benefits \$38,784

Total Annual Health Benefits \$42,882

Source: NCHRP 552- Guidelines for Analysis of Investments in  
 Bicycle Facilities, Appendix G.  
 (Estimated annual per capita cost savings of direct and/indirect  
 of physical activity)

## YEARLY ESTIMATED GAS AND EMISSION SAVINGS FROM THE PROJECT

### INFRASTRUCTURE

New Pedestrians	265
New Bicyclists	28
Avoided VMT due to Walking	19,875
Avoided VMT due to Biking	10,500
Fuel Saved	\$5,179
Emissions Saved	\$380
Fuel and Emissions saved	\$5,559

#### Underlying assumptions for calculations:

- 1) Bike miles traveled= 1.5 mi, walk miles traveled= .3 (CHTS)
  - 2) Assume 50% of new walkers and cyclists choose not to drive their cars
  - 3) 1 mile driven is ~ 0.05 gal ~ 1 lb of CO<sub>2</sub> based on US average 20mpg.
- Source: Active Transportation for America: The Case for Increased Federal Investment in Bicycling and Walking. Rails to Trails Conservancy, page 22.  
<http://www.railstotrails.org/resourcehandler.ashx?id=2948>
- 4) Gasoline price per gallon is \$3.41 (incl. tax)
  - 5) Carbon price is \$25 per ton
  - 6) 250 working days
  - 7) 2,000 lbs = 1 ton

**YEARLY ESTIMATED RECREATIONAL BENEFITS FROM THE PROJECT**

<b>Biking</b>		
New Recreational Users	3	\$10 per trip
New Commuters	3	
Existing Recreational Users	18	\$4 per trip
Value of Spending Recreational Time for New Recreational Users	\$3,819	
Value of Spending Recreational Time for Existing Recreational Users	\$9,166	
Potential number of recreational time outdoors	124	
<b>Annual Biking Recreational Benefits</b>	<b>\$9,166</b>	
Sources: NCHRP 552 for New Users and Commuters, TAG (January 2010 UK's Department of Transport Guidance on the Appraisal of Walking and Cycling Schemes) for Existing Users, World Health Organization's HEAT for cycling (124 days- the observed number of days cycled in Stockholm)		

<b>Walking</b>		
Total Recreational pedestrians	80	15%- See Misc. Tab
Value of Spending Recreational time for all pedestrians	\$29,018	\$1 per trip
Potential number of recreational time outdoors	365	
<b>Annual Walking Recreational Benefits</b>	<b>\$29,018</b>	
Sources: Pedestrian and Bicycle Information Center. TAG (January 2010 UK's Department of Transport Guidance on the Appraisal of Walking and Cycling Schemes) for Existing Users.		

<b>Total Annual Recreational Benefits</b>	<b>\$38,184</b>
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**ESTIMATED SAFETY BENEFITS FROM POTENTIAL CRASH REDUCTION**

Countermeasures	SIGNALIZED INTERSECTION COUNTERMEASURES				UNSIGNALIZED INTERSECTION COUNTERMEASURES			ROADWAY COUNTERMEASURES					OTHER REDUCTION FACTOR	Average of 3 highest countermeasures	Annual Benefits	
	Install pedestrian countdown signal heads	Install pedestrian crossing	Install advance stop bar before crosswalk (bicycle box)	Install pedestrian overpass/underpass	Install raised medians/refuge islands	Install pedestrian crossings (new signs and markings only)	Install pedestrian crossing (with enhanced safety measures/ curb extensions)	Install pedestrian signal	Install bike lanes	Install sidewalk/pathway to avoid walking along roadways	Install pedestrian crossing (with enhanced safety measures)	Install Pedestrian crossing				
Applicable Countermeasures	N	N	N	N	Y	Y	Y	N	Y	Y	Y	Y	Y	Y		
Crash Reduction Factors (CRFs)	25%	25%	15%	75%	45%	25%	35%	55%	35%	80%	30%	35%	10%			
Service Life	20	20	10	20	20	10	20	20	20	20	10	10				
1st year		\$0	\$0	\$0	\$0	\$160,231	\$89,017	\$124,624	\$0	\$124,624	\$284,856	\$106,821	\$124,624	\$35,607	\$189,904	\$189,904

	Fatal	Injury	PDO	Total
Frequency	0	4	4	8
Cost/crash	\$4,130,347	\$81,393	\$7,624	

ECONOMIC EVALUATION (Constant Values)

<b>Total Benefits</b>	#####
Mobility Benefits	#####
Health Benefits	\$1,620,832
Recreational Benefits	\$1,391,641
Safety Benefits	\$9,228,319
Gas & Emission Benefits	\$395,656

<b>Total Costs</b>	\$2,958,700
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<b>Benefit-Cost Ratio (BCR)</b>	7.6
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INFRASTRUCTURE - Non SR25

Year	Mobility Benefits	Health Benefits	Recreational Benefits		Gas & Emissions Benefits	Total Benefits	Total Project Cost	Growth Factor	
				Safety Benefits					
<b>PROJECT OPEN</b>									
1	\$83,860	\$42,882	\$38,184	\$189,904	\$5,559	\$360,388	\$0	1.02	
2	\$85,537	\$43,739	\$38,947	\$193,702	\$5,670	\$367,595			
3	\$87,248	\$44,614	\$39,726	\$197,576	\$5,783	\$374,947			
4	\$88,993	\$45,506	\$40,521	\$201,527	\$5,899	\$382,446			
5	\$90,773	\$46,417	\$41,331	\$205,558	\$6,017	\$390,095			
6	\$92,588	\$47,345	\$42,158	\$209,669	\$6,137	\$397,897			
7	\$94,440	\$48,292	\$43,001	\$213,862	\$6,260	\$405,855			
8	\$96,329	\$49,258	\$43,861	\$218,140	\$6,385	\$413,972			
9	\$98,255	\$50,243	\$44,738	\$222,502	\$6,513	\$422,252			
10	\$100,221	\$51,248	\$45,633	\$226,952	\$6,643	\$430,697			
11	\$102,225	\$52,273	\$46,546	\$231,492	\$6,776	\$439,310			
12	\$104,269	\$53,318	\$47,476	\$236,121	\$6,911	\$448,097			
13	\$106,355	\$54,384	\$48,426	\$240,844	\$7,050	\$457,059			
14	\$108,482	\$55,472	\$49,395	\$245,661	\$7,191	\$466,200			
15	\$110,652	\$56,581	\$50,382	\$250,574	\$7,334	\$475,524			
16	\$112,865	\$57,713	\$51,390	\$255,585	\$7,481	\$485,034			
17	\$115,122	\$58,867	\$52,418	\$260,697	\$7,631	\$494,735			
18	\$117,424	\$60,045	\$53,466	\$265,911	\$7,783	\$504,630			
19	\$119,773	\$61,246	\$54,536	\$271,229	\$7,939	\$514,722			
20	\$122,168	\$62,471	\$55,626	\$276,654	\$8,098	\$525,017			
						Sum Total Benefits	Total Project Cost		
Total	\$2,037,579	\$1,041,912	\$927,761	\$4,614,160	\$135,060	\$8,756,471	\$0		

**INFRASTRUCTURE- SR25**

Year	Mobility	Health Benefits	Recreational	Safety Benefits	Gas & Emission	Total Benefits	Total Project	Growth Factor	
	Benefits		Benefits		Benefits		Cost		
<b>PROJECT OPEN</b>									
1	\$381,975	\$23,826	\$0	\$189,904	\$10,725	\$606,430	\$2,958,700	1.02	
2	\$389,614	\$24,303	\$0	\$193,702	\$10,940	\$618,559			
3	\$397,407	\$24,789	\$0	\$197,576	\$11,159	\$630,930			
4	\$405,355	\$25,285	\$0	\$201,527	\$11,382	\$643,549			
5	\$413,462	\$25,790	\$0	\$205,558	\$11,609	\$656,419			
6	\$421,731	\$26,306	\$0	\$209,669	\$11,842	\$669,548			
7	\$430,166	\$26,832	\$0	\$213,862	\$12,078	\$682,939			
8	\$438,769	\$27,369	\$0	\$218,140	\$12,320	\$696,598			
9	\$447,544	\$27,916	\$0	\$222,502	\$12,566	\$710,530			
10	\$456,495	\$28,475	\$0	\$226,952	\$12,818	\$724,740			
11	\$465,625	\$29,044	\$0	\$231,492	\$13,074	\$739,235			
12	\$474,938	\$29,625	\$0	\$236,121	\$13,336	\$754,020			
13	\$484,436	\$30,218	\$0	\$240,844	\$13,602	\$769,100			
14	\$494,125	\$30,822	\$0	\$245,661	\$13,874	\$784,482			
15	\$504,008	\$31,438	\$0	\$250,574	\$14,152	\$800,172			
16	\$514,088	\$32,067	\$0	\$255,585	\$14,435	\$816,175			
17	\$524,370	\$32,709	\$0	\$260,697	\$14,723	\$832,499			
18	\$534,857	\$33,363	\$0	\$265,911	\$15,018	\$849,149			
19	\$545,554	\$34,030	\$0	\$271,229	\$15,318	\$866,132			
20	\$556,465	\$34,711	\$0	\$276,654	\$15,625	\$883,454			
						Sum Total	Total Project		
						Benefits	Cost		
Total	\$9,280,983	\$578,919	\$0	\$4,614,160	\$260,596	\$14,734,658	\$2,958,700		

**SUMMARY OF QUANTIFIABLE BENEFITS AND COSTS**

Year	Mobility Benefits	Health Benefits	Recreational Benefits	Safety Benefits	Gas & Emission Benefits	Total Benefits	Total Project Cost	Benefit Cost Ratio
<b>PROJECT OPEN</b>								
1	\$465,835	\$66,708	\$57,275	\$379,807	\$16,284	\$985,910	\$2,958,700	8.10
2	\$475,152	\$68,042	\$58,421	\$387,403	\$16,610	\$1,005,628		
3	\$484,655	\$69,403	\$59,589	\$395,152	\$16,942	\$1,025,740		
4	\$494,348	\$70,791	\$60,781	\$403,055	\$17,281	\$1,046,255		
5	\$504,235	\$72,207	\$61,997	\$411,116	\$17,626	\$1,067,180		
6	\$514,319	\$73,651	\$63,237	\$419,338	\$17,979	\$1,088,524		
7	\$524,606	\$75,124	\$64,501	\$427,725	\$18,338	\$1,110,294		
8	\$535,098	\$76,627	\$65,791	\$436,279	\$18,705	\$1,132,500		
9	\$545,800	\$78,159	\$67,107	\$445,005	\$19,079	\$1,155,150		
10	\$556,716	\$79,722	\$68,449	\$453,905	\$19,461	\$1,178,253		
11	\$567,850	\$81,317	\$69,818	\$462,983	\$19,850	\$1,201,818		
12	\$579,207	\$82,943	\$71,215	\$472,243	\$20,247	\$1,225,855		
13	\$590,791	\$84,602	\$72,639	\$481,688	\$20,652	\$1,250,372		
14	\$602,607	\$86,294	\$74,092	\$491,321	\$21,065	\$1,275,379		
15	\$614,659	\$88,020	\$75,574	\$501,148	\$21,486	\$1,300,887		
16	\$626,952	\$89,780	\$77,085	\$511,171	\$21,916	\$1,326,904		
17	\$639,491	\$91,576	\$78,627	\$521,394	\$22,354	\$1,353,443		
18	\$652,281	\$93,407	\$80,199	\$531,822	\$22,801	\$1,380,511		
19	\$665,327	\$95,276	\$81,803	\$542,458	\$23,257	\$1,408,122		
20	\$678,633	\$97,181	\$83,439	\$553,308	\$23,723	\$1,436,284		
						Sum Total Benefits	Total Project Cost	Benefit Cost Ratio
Total	\$11,318,562	\$1,620,832	\$1,391,641	\$9,228,319	\$395,656	\$23,955,009	\$2,958,700	8.10

SUMMARY OF QUANTIFIABLE BENEFITS AND COSTS

Year	Mobility Benefits	Health Benefits	Recreational Benefits	Safety Benefits	Gas & Emission Benefits	Total Benefits	Present Value Benefit	Total Project Cost	Present Value Cost	Discount Rate	Net Present Value	BCA Ratio	Funds Requested	PV of Funds Requested
<b>PROJECT OPEN</b>														
1	\$465,835	\$66,708	\$57,275	\$379,807	\$16,284	\$985,910	\$947,990	\$2,958,700	\$2,844,904	4.00%	\$13,020,007.93	5.58	2,958,700	2,844,904
2	\$475,152	\$68,042	\$58,421	\$387,403	\$16,610	\$1,005,628	\$929,759	\$0	\$0					
3	\$484,655	\$69,403	\$59,589	\$395,152	\$16,942	\$1,025,740	\$911,879	\$0	\$0					
4	\$494,348	\$70,791	\$60,781	\$403,055	\$17,281	\$1,046,255	\$894,343	\$0	\$0					
5	\$504,235	\$72,207	\$61,997	\$411,116	\$17,626	\$1,067,180	\$877,144	\$0	\$0					
6	\$514,319	\$73,651	\$63,237	\$419,338	\$17,979	\$1,088,524	\$860,276	\$0	\$0					
7	\$524,606	\$75,124	\$64,501	\$427,725	\$18,338	\$1,110,294	\$843,732	\$0	\$0					
8	\$535,098	\$76,627	\$65,791	\$436,279	\$18,705	\$1,132,500	\$827,507	\$0	\$0					
9	\$545,800	\$78,159	\$67,107	\$445,005	\$19,079	\$1,155,150	\$811,593	\$0	\$0					
10	\$556,716	\$79,722	\$68,449	\$453,905	\$19,461	\$1,178,253	\$795,986	\$0	\$0					
11	\$567,850	\$81,317	\$69,818	\$462,983	\$19,850	\$1,201,818	\$780,678	\$0	\$0					
12	\$579,207	\$82,943	\$71,215	\$472,243	\$20,247	\$1,225,855	\$765,665	\$0	\$0					
13	\$590,791	\$84,602	\$72,639	\$481,688	\$20,652	\$1,250,372	\$750,941	\$0	\$0					
14	\$602,607	\$86,294	\$74,092	\$491,321	\$21,065	\$1,275,379	\$736,500	\$0	\$0					
15	\$614,659	\$88,020	\$75,574	\$501,148	\$21,486	\$1,300,887	\$722,336	\$0	\$0					
16	\$626,952	\$89,780	\$77,085	\$511,171	\$21,916	\$1,326,904	\$708,445	\$0	\$0					
17	\$639,491	\$91,576	\$78,627	\$521,394	\$22,354	\$1,353,443	\$694,821	\$0	\$0					
18	\$652,281	\$93,407	\$80,199	\$531,822	\$22,801	\$1,380,511	\$681,459	\$0	\$0					
19	\$665,327	\$95,276	\$81,803	\$542,458	\$23,257	\$1,408,122	\$668,354	\$0	\$0					
20	\$678,633	\$97,181	\$83,439	\$553,308	\$23,723	\$1,436,284	\$655,501	\$0	\$0					
	<b>Total Mobility Benefits</b>	<b>Health Benefits</b>	<b>Recreational Benefits</b>	<b>Safety Benefits</b>	<b>Gas &amp; Emission Benefits</b>	<b>Sum Total Benefits</b>	<b>Sum Present Value Benefit</b>	<b>Sum Total Project Cost</b>	<b>Sum Present Value Cost</b>				<b>Sum Funds Requested</b>	<b>Sum PV Funds Requested</b>
	\$11,318,562	\$1,620,832	\$1,391,641	\$9,228,319	\$395,656	\$23,955,009	\$15,864,912	\$2,958,700	\$2,844,904				\$2,958,700	\$2,844,904

**PARAMETERS**

Mobility Parameters		
CA Statewide Hourly Wage (2014)	\$26.07	
Value of Time (VOT)- adult	\$13.03	
Value of Time (VOT)- child	\$5.42	
Bike Path (Class I)	20.38	min/trip
Bike Lane (Class II)	18.02	min/trip
Bike Route (Class III)	15.83	min/trip

Health Parameters		
Cycling	\$146	annual\$/person
Walking	\$146	annual\$/person

Accident Cost Parameters		
Cost of a Fatality (K)	\$4,130,347	\$/crash
Cost of an Injury	\$81,393	\$/crash
Cost of Property Damage (PDO)	\$7,624	\$/crash

Source: Appendix D, Local Roadway Safety: A manual for CA's Local Road Owners Caltrans. April 2013.

Recreational Values Parameters			
Biking	New Users	\$10	per trip
	Existing Users	\$4	per trip
Walking	All Users	\$1	per trip

VMT Reduction		
Price of gasoline (per gallon incl. tax)	\$3.41	
Price of CO2 (per ton)-adj to 2014\$	\$25	
Price of Co2 (per lb)	\$0.01	
Working days	250	

Average fuel price (November 2013-November 2014) based on EIA's Table 9.4: Retail Motor Gasoline and On\_Highway Diesel Fuel Prices [http://www.eia.gov/totalenergy/data/monthly/pdf/sec9\\_6.pdf](http://www.eia.gov/totalenergy/data/monthly/pdf/sec9_6.pdf)

Interagency Working Group on Social Cost of Carbon, United States Government, Technical Support Document: Social Cost of Carbon for Regulatory Impact Analysis Under Executive Order 12866, February 2010.

2%	Average CA Annual Growth of Population (1955-2011)
4%	Discount Rate used (same as Cal B/C Model)

Loomis, Mychal

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**From:** Agacer-Solis, Nerie Rose@DOT <rose.agacer@dot.ca.gov>  
**Sent:** Tuesday, May 19, 2015 9:12 AM  
**To:** Loomis, Mychal  
**Subject:** RE: Benefit-Cost Tool used in ATP Grant

Mychal,

Thanks for your comments. EAB will definitely look at all comments and suggestions received to revise the tool, especially to account for length, locations, and other important factors that directly affect ATP users.

Rose Agacer  
(916) 651-6014

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**From:** mychal.loomis@kimley-horn.com [mailto:mychal.loomis@kimley-horn.com]  
**Sent:** Thursday, May 14, 2015 2:28 PM  
**To:** Agacer-Solis, Nerie Rose@DOT  
**Cc:** eda@ci.salinas.ca.us; james@ci.salinas.ca.us; victorg@ci.salinas.ca.us  
**Subject:** Benefit-Cost Tool used in ATP Grant

Hello Rose,

First off, thank you for creating this tool to help provide some insight to a benefit-cost relationship. This is a difficult concept to capture but important to help understand what health benefits may come out of ATP infrastructure improvement. Having a standardized approach to the calculation allows the industry to have a way to compare projects. Not everyone will agree on every parameter used in the calculations, or the inputs or results. This tool should not, and I don't think it is intended to be, an end-all, be-all tool, but it is a great source for thinking about what projects may truly benefit the community and how the cost of the project will or will not pay for itself.

The projects we used it on were for infrastructure only, with SR2S components, so the ones related to that are the only tabs I used. Overall, I thought the tool was easy to use. The inputs were logical, and the outputs were information and helpful.

I saw the limitations noted in the Powerpoint presentation about the tool so I know you have input on some of those discussions. A couple of other thoughts on additional features of the tool that could be helpful:

Would it be helpful to have a 10-year service life as well? Some of the safety countermeasures have a service life of 10 years so if a project was only doing those types of countermeasures, it may be helpful to determine the longevity of the improvements.

Would it be necessary to have a couple different pre-set parameter options? For example, an "urban" setting and a "rural" setting. They may have different distances and parameters that can be pre-loaded?

We will include our inputs and outputs as an attachment to our grant application if you would like to review them. Looking forward to seeing future versions of the tool! Thanks again.

**Mychal Loomis, P.E.**  
**Kimley-Horn** | 401 B Street, Suite 600, San Diego, CA 92101  
Direct: 619 744 0161 | [www.kimley-horn.com](http://www.kimley-horn.com)

(Submitted on behalf of the City of Salinas for the ATP Grants),<sub>1</sub>

Attachment I

**Foster, Emily**

---

**From:** Hsieh, Wei@CCC <Wei.Hsieh@CCC.CA.GOV> on behalf of ATP@CCC <ATP@CCC.CA.GOV>  
**Sent:** Tuesday, May 19, 2015 2:25 PM  
**To:** Loomis, Mychal; inquiry@atpcommunitycorps.org  
**Cc:** eda@ci.salinas.ca.us; james@ci.salinas.ca.us; victorg@ci.salinas.ca.us; Sorenson, Dave; Foster, Emily; ATP@CCC; Hsieh, Wei@CCC; WohlGemuth, Janet@CCC; Burks-Herrmann, Brenda@CCC  
**Subject:** RE: ATP Grant Application: City of Salinas, Alvin Drive and Linwood Drive

Hi Mychal,

Janet WohlGemuth, the Conservation Supervisor at our CCC Monterey location has responded to the partnership for your project. The CCC can do planting for the landscaping component of the scope of work.

Please include this email with your application as proof that you reached out to the CCC. Feel free to contact Janet WohlGemuth directly [Janet.WohlGemuth@ccc.ca.gov](mailto:Janet.WohlGemuth@ccc.ca.gov) if your project receives funding.

Thank you,

Wei Hsieh, Manager  
Programs & Operations Division  
California Conservation Corps  
1719 24<sup>th</sup> Street  
Sacramento, CA 95816  
(916) 341-3154  
[Wei.Hsieh@ccc.ca.gov](mailto:Wei.Hsieh@ccc.ca.gov)

---

**From:** mychal.loomis@kimley-horn.com [mailto:mychal.loomis@kimley-horn.com]  
**Sent:** Monday, May 18, 2015 5:49 PM  
**To:** ATP@CCC; inquiry@atpcommunitycorps.org  
**Cc:** eda@ci.salinas.ca.us; james@ci.salinas.ca.us; victorg@ci.salinas.ca.us; Dave.Sorenson@kimley-horn.com; emily.foster@kimley-horn.com  
**Subject:** ATP Grant Application: City of Salinas, Alvin Drive and Linwood Drive

- 01 Project Location Map\_Salinas\_Alvin Dr and Linwood Dr.pdf (346 kB)
- 02 SR2S Project Map\_Salinas\_Alvin Dr and Linwood Dr\_.pdf (9 MB)
- 03 Engineer Estimate\_Alvin Dr and Linwood Dr .pdf (48.1 kB)
- 04 Project Schedule\_Alvin Dr and Linwood Dr.pdf (109.1 kB)

Download the attachments by [clicking here](#).

Hello,

The City of Salinas will be applying for funding from the Caltrans Active Transportation Program (ATP) - Cycle 2. The information provided below and in the attachments summarizes the proposed project. We are requesting your review of this information to determine if the California Conservation Corps or Community Conservation Corps would be able to participate in the project.

**Project Description:**

The project would improve bicycle and pedestrian facilities along East Alvin Drive, Linwood Drive, Chaparral Drive, and Maryal Drive with the implementation of road diets, buffered bike lanes and sharrows, pedestrian crossing enhancements, and pedestrian ramp improvements. Addition of a roundabout or traffic signal would be included at the intersection of East Alvin Drive and El Dorado Drive.

**Attached are the following:**

- 01 Project Location Map
- 02 Preliminary Plan
- 03 Detailed Cost Estimate
- 04 Project Schedule

Please let me know if you have any questions on the project or require additional information.

**Mychal Loomis, P.E.**

**Kimley-Horn** | 401 B Street, Suite 600, San Diego, CA 92101

Direct: 619 744 0161 | [www.kimley-horn.com](http://www.kimley-horn.com)

(Submitted on behalf of the City of Salinas for the ATP Grants)

**Foster, Emily**

---

**From:** Active Transportation Program <inquiry@atpcommunitycorps.org>  
**Sent:** Tuesday, May 19, 2015 1:02 PM  
**To:** Loomis, Mychal  
**Cc:** atp@ccc.ca.gov; eda; james; victorg; Sorenson, Dave; Foster, Emily  
**Subject:** Re: ATP Grant Application: City of Salinas, Alvin Drive and Linwood Drive

Hi Mychal,

Thank you for reaching out to the local conservation corps. Unfortunately, we are not able to participate in this project. Please include this email with your application as proof that you reached out to the Local Corps.

Thank you

Monica

On Mon, May 18, 2015 at 5:49 PM, <[mychal.loomis@kimley-horn.com](mailto:mychal.loomis@kimley-horn.com)> wrote:

- 01 Project Location Map\_Salinas\_Alvin Dr and Linwood Dr.pdf (346 kB)
- 02 SR2S Project Map\_Salinas\_Alvin Dr and Linwood Dr\_.pdf (9 MB)
- 03 Engineer Estimate\_Alvin Dr and Linwood Dr .pdf (48.1 kB)
- 04 Project Schedule\_Alvin Dr and Linwood Dr.pdf (109.1 kB)

Download the attachments by [clicking here](#).

Hello,

The City of Salinas will be applying for funding from the Caltrans Active Transportation Program (ATP) - Cycle 2. The information provided below and in the attachments summarizes the proposed project. We are requesting your review of this information to determine if the California Conservation Corps or Community Conservation Corps would be able to participate in the project.

**Project Title: City of Salinas, Alvin Drive and Linwood Drive Safe Routes to School Improvements**

**Project Description:**

The project would improve bicycle and pedestrian facilities along East Alvin Drive, Linwood Drive, Chaparral Drive, and Maryal Drive with the implementation of road diets, buffered bike lanes and sharrows, pedestrian crossing enhancements, and pedestrian ramp improvements. Addition of a roundabout or traffic signal would be included at the intersection of East Alvin Drive and El Dorado Drive.

Attached are the following:

- 01 Project Location Map
- 02 Preliminary Plan
- 03 Detailed Cost Estimate
- 04 Project Schedule

Please let me know if you have any questions on the project or require additional information.

**Mychal Loomis, P.E.**

**Kimley-Horn** | 401 B Street, Suite 600, San Diego, CA 92101  
Direct: [619 744 0161](tel:6197440161) | [www.kimley-horn.com](http://www.kimley-horn.com)

(Submitted on behalf of the City of Salinas for the ATP Grants)

--

**Monica Davalos** | Legislative Policy Intern  
Active Transportation Program  
California Association of Local Conservation Corps  
1121 L Street, Suite 400  
Sacramento, CA 95814  
[916.426.9170](tel:916.426.9170) | [inquiry@atpcommunitycorps.org](mailto:inquiry@atpcommunitycorps.org)



February 19, 2015

Mr. James Serrano  
Transportation Planner, Public Works Department  
City of Salinas  
200 Lincoln Avenue  
Salinas, CA 93901

**RE: East Alvin Drive and Linwood Street Safe Routes to School Enhancements**

Mr. Serrano,

The Association of Monterey Bay Area Governments (AMBAG) is pleased to support of the City of Salinas's Active Transportation Program application for the East Alvin Drive and Linwood Street Safe Routes to School Enhancements project. The proposed improvements include several elements that encourage active transportation, increase pedestrian and bicyclist safety, improve bicycle access to schools and adjacent residential neighborhoods, reduce vehicle trips, and fill gaps in the bicycle network. By providing intersection safety improvements, road diets, new bike lanes, pedestrian and bike lane improvements, this project will result in significant improvements to bicycle and pedestrian travel between schools and surrounding residential areas.

The grant seeks to fund preliminary and final design, environmental, and construction of the proposed improvements. This project is consistent with AMBAG's long rang plan and we support the City of Salinas's grant application for the East Alvin Drive and Linwood Drive Safe Routes to School Enhancements.

Sincerely,

Maura F. Twomey  
Executive Director  
Association of Monterey Bay Area Governments



# Salinas Union High School District

**Timothy J. Vanoli**  
Superintendent  
tim.vanoli@salinasuhdsd.org

**Dan Burns**  
Associate Superintendent  
Instructional Services  
dan.burns@salinasuhdsd.org

**Randy Bangs**  
Assistant Superintendent  
Human Resources  
randall.bangs@salinasuhdsd.org

**Ana V. Aguillon**  
Interim Manager of  
Business Services/CBO  
ana.aguillon@salinasuhdsd.org

May 19, 2015

Mr. James Serrano  
Transportation Planner, Public Works Department  
City of Salinas  
200 Lincoln Avenue  
Salinas, CA 93901

**RE: East Alvin Drive, Linwood Street and Maryal Drive Safe Routes to School Enhancements**

Mr. Serrano,

The Salinas Union High School District is pleased to be a supporter of the City of Salinas's proposed bicycle, pedestrian, and traffic calming enhancements along East Alvin Drive, Linwood Drive, Maryal Drive and we are equally supportive of the City of Salinas's Active Transportation Program grant application for 2015.

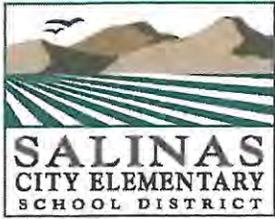
The Salinas Union High School District is the school district for middle and high schools in the City of Salinas. As part of our education, we encourage and promote healthy transportation modes in our community such as walking and biking. The proposed improvements will help support healthier transportation mode options in our community by improving facilities to and from two Salinas Union High School District facilities (North Salinas High School and Harden Middle School). Additionally, the pedestrian and bicycle enhancements on Maryal Drive will provide a safe and walkable route to the Salinas Sports Complex (Base Ball and Football activities) , Boys and Girls Club, Sherwood Park and the Sherwood Hall Community Center.

Lastly, of the proposed bicycle and pedestrian facilities along East Alvin Drive and Linwood Drive would be beneficial to our students and the community. Please let us know if the School District can be of further assistance on this project.

Sincerely,

Karen L. Luna  
Manager of Facilities and Planning

C: Superintendent Vanoli  
Manager Business Serv/CBO Aguillon



ADMINISTRATION

JUVENAL LUZA, Ph.D.  
Superintendent

GERALD STRATTON  
Assistant Superintendent  
Business Services

LORI SANDERS  
Assistant Superintendent  
Educational Services

MARY PRITCHARD  
Director, Bilingual-Migrant-Early  
Childhood Education Services

PAT WILLINGHAM  
Director, Personnel Services

TERRY RYAN  
Director, Maintenance, Operations,  
Transportation & Food Services

BEATRIZ CHAIDEZ  
Director, Pupil Personnel Services  
& Special Education

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Trustee Area 4

STEPHEN KIM  
Trustee Area 5

840 South Main Street  
Salinas CA 93901  
Phone (831) 753-5600  
Fax (831) 753-5610

May 18, 2015

Mr. James Serrano  
Transportation Planner, Public Works Department  
City of Salinas  
200 Lincoln Avenue  
Salinas, CA 93901

**RE: East Alvin Drive, Linwood Street and Maryal Drive Safe Routes to School Enhancements**

Mr. Serrano,

The Salinas City Elementary School District is very pleased to support the City of Salinas' proposed bicycle, pedestrian, and traffic calming enhancements along East Alvin Drive, Linwood Drive and Maryal Drive; we are equally supportive of the City of Salinas's Active Transportation Program (ATP) grant application for 2015.

The Salinas City Elementary School District is one of the school districts operating Kindergarten through 6th grade schools in the City of Salinas. Located in an economically disadvantaged community, we offer many services to our students free of charge, including free breakfast and lunch during the school day and dinner at our after school programs. A component of all our instructional programs includes encouragement and promotion of healthy transportation modes in our community such as walking and biking. With the proposed and long overdue ATP traffic safety improvements, the Salinas City Elementary School District expects that our school communities will be more responsive to our consistent advocacy for parents and students to make healthier transportation mode choices—walking and bicycling—when going to and from school at the two Salinas City Elementary School District facilities that will benefit from this project, El Gabilan Elementary School and Natividad Elementary School.

The addition of the proposed bicycle and pedestrian facilities along East Alvin Drive and Linwood Drive will be beneficial to our students and the community. Please let us know if the School District can be of further assistance on this project.

Sincerely,

Gerald J. Stratton  
Assistant Superintendent, Business Services



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55-B Plaza Circle, Salinas, CA 93901-2902 • Tel: (831) 775-0903 • Website: [www.tamcmonterey.org](http://www.tamcmonterey.org)

May 27, 2015

Mr. James Serrano  
Transportation Planner, Public Works Department  
City of Salinas  
200 Lincoln Avenue  
Salinas, CA 93901

**RE: East Alvin Drive and Linwood Street Safe Routes to School Enhancements**

Dear Mr. Serrano:

The Transportation Agency for Monterey County is submitting this letter of support for the City of Salinas's proposed bicycle, pedestrian, and traffic calming enhancements along East Alvin Drive and Linwood Drive. The project is important for improving pedestrian and bicyclist safety and access through a residential area of Salinas that connects to several schools and activity centers.

This project completes missing gaps in the bicycle and pedestrian networks and improves safety by creating buffers between vehicles and bicyclists, reducing pedestrian crossing distances, providing appropriate pedestrian crosswalks and ramps, and establishing proper intersection control at key intersections. The project would be expected to reduce vehicle trips and increase bicycle and pedestrian trips.

The East Alvin Drive and Linwood Street Safe Routes to School Enhancements project is included in the Transportation Agency's *Bicycle and Pedestrian Master Plan*. Our agency supports the City of Salinas' effort to improve the safety and convenience for bicycle and pedestrian commuters.

Should you have any questions, please contact Michael Zeller, Senior Transportation Planner, of my staff at 831-775-4416. Thank you for your consideration.

Sincerely,

A handwritten signature in blue ink, appearing to read "Debra L. Hale", is written over the word "Sincerely,".

Debra L. Hale  
Executive Director



## Building Healthy Communities - East Salinas

606 Williams Road • Salinas, CA 93905 • P (831) 717-1384 • Fax (831) 975-4768

---

May 26, 2015

Mr. James Serrano  
Transportation Planner, Public Works Department  
City of Salinas  
200 Lincoln Avenue  
Salinas, CA 93901

**RE: East Alvin Drive and Linwood Street Safe Routes to School Enhancements**

Mr. Serrano,

East Salinas Building Healthy Communities (BHC) is a community driven initiative, grounded in a strong local history of community advocacy and active partnerships between residents, private organizations, and public agencies. BHC participants work together to transform the environments where East Salinas residents live, work, and play into places that support health and economic well-being. East Salinas BHC leverages this collaborative approach to effectively engage residents in local planning and policy decisions.

The representatives of Building Healthy Communities are very pleased to support the City of Salinas's bicycle, pedestrian, and traffic calming enhancements along East Alvin Drive and Linwood Drive. The proposed bicycle and pedestrian improvements cover a large portion of the community with several key connections. Implementation of this project will reinforce the City's commitment to the goals of our program, providing healthy community alternatives for transportation. Children are a large part of the population and trips to and from school are easy ways for creating activity that benefit their health.

We strongly support the City of Salinas's 2015 Active Transportation Program grant application for the addition of the proposed bicycle, pedestrian, and traffic calming enhancements along East Alvin Drive and Linwood Drive. The facilities provided with this project would be very beneficial to our community. Please let us know if we can be of further assistance on this project.

Sincerely,



Andrea Manzo  
Hub Manager  
East Salinas Building Healthy Communities

## SIGNAL WARRANT ANALYSIS

Chapter 4C of the CA-MUTCD, Traffic Control Signal Needs Studies, lists ten warrants for the installation of a traffic signal at an intersection. Generally, when an intersection meets one or more of the above signal warrants, it should be considered for signalization. A brief summary is provided with the corresponding calculations for the Alvin Drive and El Dorado Drive intersection warrant analysis, when applicable.

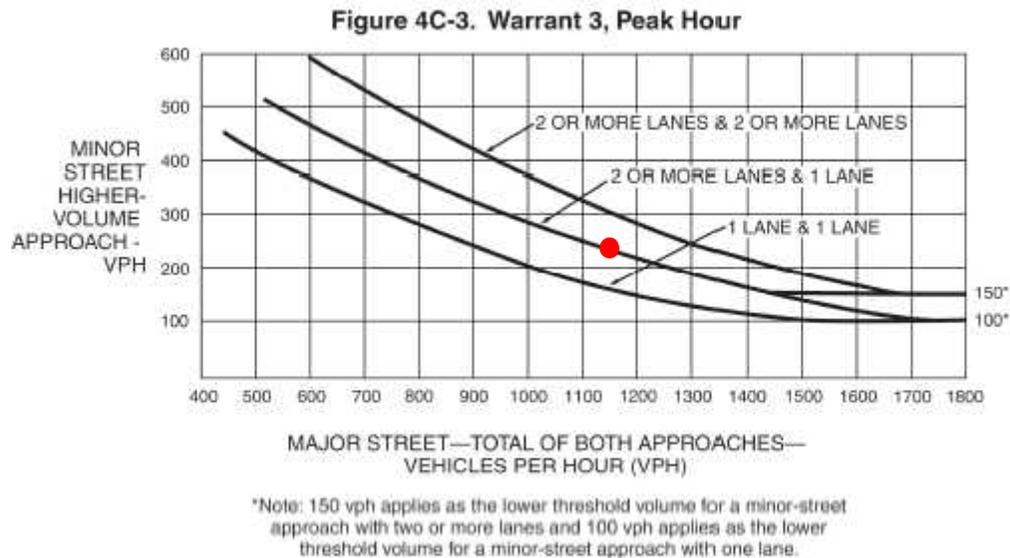
### Warrant 3, Peak-Hour

Analyzes whether the minor street approach experiences undue delay in crossing or entering the major approach for a minimum of one hour on an average day. This warrant was conducted with existing counts.

This warrant has two parts, and if either one of the parts is met then the warrant is met. The highest peak hour volume occurred between 5:00 and 6:00 p.m. During this time, the through volume on Alvin Drive (major street) was 1,155 vehicles and the El Dorado Drive (minor street) volume was 241 vehicles.

For Part A, the delay experienced by traffic on the minor street approach was found to be 66.1 seconds per vehicle. The total delay was calculated to be 4.4 vehicle-hours (241 vehicles x 66.1 seconds x 1/3600 seconds per hour). To meet Part A of the warrant, the total delay must exceed four vehicle-hours, the volume on the minor street approach must exceed 100 vehicles and the total entering volume serviced must exceed 650 vehicles. **Thus, Part A of this warrant was met.**

For Part B, the volumes were plotted on Figure 4C-3 of the CA-MUTCD and fell below the “2 or more lanes & 2 or more lanes” curve. Thus, Part B of this warrant was not met.



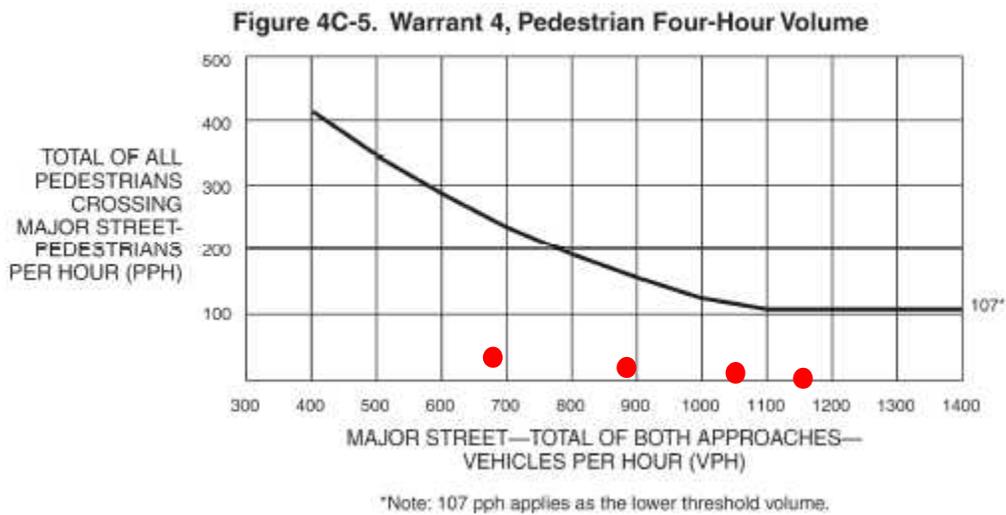
**Since Part A was met, this warrant is met.**

**Warrant 4, Pedestrian Volumes**

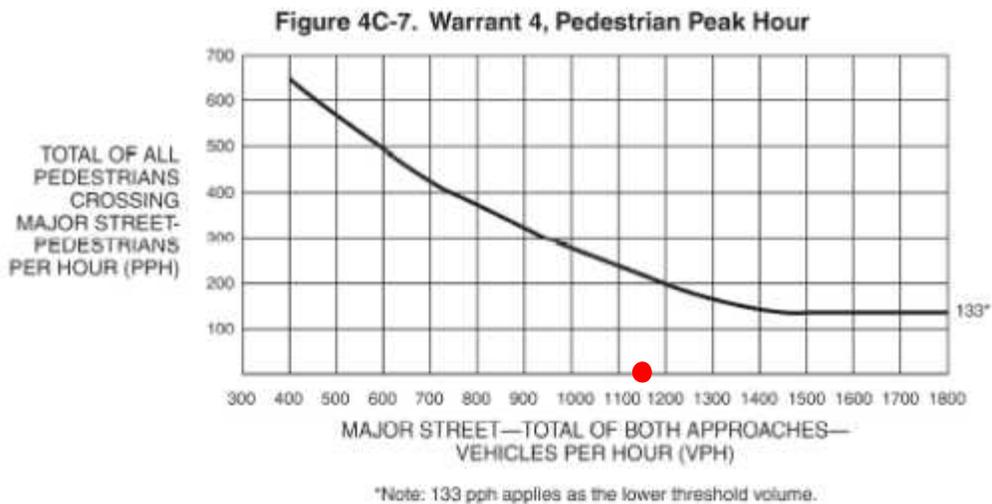
Analyzes whether pedestrians experience excessive delay in crossing the major street due to heavy traffic volumes. This warrant was conducted with existing counts. This warrant has two parts, and if either one of the parts is met then the warrant is met.

HOUR	VEHICLES PER HOUR	PEDESTRIANS PER HOUR
	MAJOR STREET (TOTAL OF BOTH APPROACHES)	(TOTAL OF ALL CROSSINGS)
7:00 – 8:00 AM	684	31
8:00 – 9:00 AM	851	9
4:00 – 5:00 PM	1053	6
5:00 – 6:00 PM	1155	2

For Part A, the volumes were plotted on Figure 4C-5 of the CA-MUTCD and fell below the curve. Thus, Part A of this warrant was not met.



For Part B, the volumes were plotted on Figure 4C-7 of the CA-MUTCD and fell below the curve. Thus, Part B of this warrant was not met.



Since both Part A and Part B was not met, this warrant is not met.

### Warrant 5, School Crossing

Determines whether school children crossing of the major roadway would warrant signal installation. Special California criterion is provided for this warrant in the CA-MUTCD.

This warrant was conducted with existing counts. This warrant has one part, and if it is met then the warrant is met. The highest crossing hour (pedestrian volume) occurred between 7:15 and 8:15 a.m. During this time, 33 pedestrians crossed the intersection.

For this warrant to be met

- the number of adequate gaps in the traffic stream during the period when the school children are using the crossing must be less than the number of minutes in the same period;
- there are a minimum of 20 schoolchildren during the highest crossing hour; and
- the distance to the nearest traffic control signal along the major street is greater than 300 ft.

Based on the delay experienced by traffic on the minor street approach during the highest crossing hour (15.8 seconds) it is probable that there are not many adequate gaps for pedestrians to cross Alvin Drive (using a walking speed of 3.5 ft/sec and a roadway width of 64 feet it is estimated that it takes around 19 seconds for a pedestrian to cross Alvin Drive) . In addition, there were 31 pedestrians (schoolchildren) during the same hour and the intersection is greater than 300 ft from a traffic control signal. **Thus, it is assumed that this warrant was met.**

*It should be noted that a roundabout is the preferred intersection control at this location. If after further environmental review a roundabout is not feasible, an engineering study of the frequency and adequacy of gaps in the vehicular traffic stream on Alvin Drive must be conducted to verify if a traffic signal is truly warranted. As part of the analysis, considerations must be given to the implementation of other remedial measures, such as warning signs and flashers, school crossing guards, or a grade-separated crossing before the decision is made to install a traffic control signal.*

### Warrant 7, Crash Experience

Frequency and severity of accidents may justify the installation of a traffic signal. This warrant was conducted with existing counts. This warrant has three parts, all three parts must be met for the warrant to be met.

For Part A, adequate trial of alternatives has not been conducted. **Thus, Part A of this warrant was not met.**

For Part B, there have been no reported crashes at the intersection of Alvin Drive and El Dorado Drive within the last five years. **Thus, Part B of this warrant was not met.**

For Part C, 8 hours of vehicular volume data was not available; therefore, part C could not be conducted. **Thus, Part C of this warrant was not met.**

**Since Parts A, B and C were not met, this warrant is not met.**

### California Special Warrant, Bicycle Signal Warrant

Analyzes whether bicycle volumes or collisions are considerable or special geometrics apply.

This warrant was conducted with existing counts. This warrant has three parts, if two of the three parts are met then the warrant is met. The highest peak hour volume occurred between 4:00 and 5:00 p.m. During this time, the vehicles per hour entering the intersection was 1396 vehicles and the corresponding bicycles entering the intersection was 2 bicycles.

For Part 1, the volume warrant was less than 50,000 ( $1396 \times 2 = 2,792$ ) and the bicycle volume was less than 50. ***Thus, Part 1 of this warrant was not met.***

For Part 2, no bicycle/vehicle collisions have occurred over a 12-month period. ***Thus, Part 2 of this warrant was not met.***

For Part 3, a separated bicycle/multi use path does not intersect a roadway and there are no bicycle movements that are not permitted for a motor vehicle as well. ***Thus Part 3 of this warrant was not met.***

**Since parts 1,2, and 3 of this warrant were not met, this warrant is not met.**

Figure 4C-101 (CA). Traffic Signal Warrants Worksheet (Sheet 2 of 5)

**WARRANT 2 - Four Hour Vehicular Volume**

SATISFIED\* YES  NO

Record hourly vehicular volumes for any four hours of an average day.

APPROACH LANES	2 or One More		Hour			
	One	More				
Both Approaches - Major Street						
Higher Approach - Minor Street						

*All plotted points fall above the applicable curve in Figure 4C-1. (URBAN AREAS)	Yes <input type="checkbox"/>	No <input type="checkbox"/>
<u>OR</u> , All plotted points fall above the applicable curve in Figure 4C-2. (RURAL AREAS)	Yes <input type="checkbox"/>	No <input type="checkbox"/>

**WARRANT 3 - Peak Hour  
(Part A or Part B must be satisfied)**

SATISFIED YES  NO

**PART A**

SATISFIED YES  NO

(All parts 1, 2, and 3 below must be satisfied for the same one hour, for any four consecutive 15-minute periods)

1. The total delay experienced by traffic on one minor street approach (one direction only) controlled by a STOP sign equals or exceeds four vehicle-hours for a one-lane approach, or five vehicle-hours for a two-lane approach; <u>AND</u>	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>
2. The volume on the same minor street approach (one direction only) equals or exceeds 100 vph for one moving lane of traffic or 150 vph for two moving lanes; <u>AND</u>	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>
3. The total entering volume serviced during the hour equals or exceeds 800 vph for intersections with four or more approaches or 650 vph for intersections with three approaches.	Yes <input checked="" type="checkbox"/>	No <input type="checkbox"/>

**PART B**

SATISFIED YES  NO

APPROACH LANES	2 or One More		Hour
	One	More	
Both Approaches - Major Street		1155	
Higher Approach - Minor Street		241	

The plotted point falls above the applicable curve in Figure 4C-3. (URBAN AREAS)	Yes <input type="checkbox"/>	No <input checked="" type="checkbox"/>
<u>OR</u> , The plotted point falls above the applicable curve in Figure 4C-4. (RURAL AREAS)	Yes <input type="checkbox"/>	No <input type="checkbox"/>

The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal.

Figure 4C-101 (CA). Traffic Signal Warrants Worksheet (Sheet 3 of 5)

**WARRANT 4 - Pedestrian Volume**  
 (Parts 1 and 2 Must Be Satisfied)

SATISFIED YES  NO

**Part 1 (Parts A or B must be satisfied)**

Hours - - ->

A.	Vehicles per hour for any 4 hours	684	851	1053	1155
	Pedestrians per hour for any 4 hours	31	9	6	2

Figure 4C-5 or Figure 4C-6  
 SATISFIED YES  NO

Hours - - ->

B.	Vehicles per hour for any 1 hour				
	Pedestrians per hour for any 1 hour				

Figure 4C-7 or Figure 4C-8  
 SATISFIED YES  NO

**Part 2**

SATISFIED YES  NO

<u>AND</u> , The distance to the nearest traffic signal along the major street is greater than 300 ft	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>
<u>OR</u> , The proposed traffic signal will not restrict progressive traffic flow along the major street.	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>

**WARRANT 5 - School Crossing**  
 (Parts A and B Must Be Satisfied)

SATISFIED YES  NO

**Part A**  
 Gap/Minutes and # of Children

SATISFIED YES  NO

Gaps vs Minutes	Minutes Children Using Crossing	60
	Number of Adequate Gaps	
School Age Pedestrians Crossing Street / hr		33

Hour

Gaps < Minutes YES  NO

AND Children > 20/hr YES  NO

<u>AND</u> , Consideration has been given to less restrictive remedial measures.	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>
--	---

**Part B**

SATISFIED YES  NO

The distance to the nearest traffic signal along the major street is greater than 300 ft	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>
<u>OR</u> , The proposed signal will not restrict the progressive movement of traffic.	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>

The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal.

Figure 4C-101 (CA). Traffic Signal Warrants Worksheet (Sheet 4 of 5)

**WARRANT 6 - Coordinated Signal System** SATISFIED YES  NO   
 (All Parts Must Be Satisfied)

MINIMUM REQUIREMENTS	DISTANCE TO NEAREST SIGNAL	
≥ 1000 ft	N _____ ft, S _____ ft, E _____ ft, W _____ ft	Yes <input type="checkbox"/> No <input type="checkbox"/>
On a one-way street or a street that has traffic predominantly in one direction, the adjacent traffic control signals are so far apart that they do not provide the necessary degree of vehicular platooning.		Yes <input type="checkbox"/> No <input type="checkbox"/>
OR, On a two-way street, adjacent traffic control signals do not provide the necessary degree of platooning and the proposed and adjacent traffic control signals will collectively provide a progressive operation.		

**WARRANT 7 - Crash Experience Warrant** SATISFIED YES  NO   
 (All Parts Must Be Satisfied)

Adequate trial of alternatives with satisfactory observance and enforcement has failed to reduce the crash frequency.		Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
REQUIREMENTS	Number of crashes reported within a 12 month period susceptible to correction by a traffic signal, and involving injury or damage exceeding the requirements for a reportable crash.	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
5 OR MORE		
REQUIREMENTS	CONDITIONS	✓
ONE CONDITION SATISFIED 80%	Warrant 1, Condition A - Minimum Vehicular Volume	
	OR, Warrant 1, Condition B - Interruption of Continuous Traffic	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
	OR, Warrant 4, Pedestrian Volume Condition Ped Vol ≥ 152 for any hour OR, Ped Vol ≥ 80 for any 4 hours	

**WARRANT 8 - Roadway Network** SATISFIED YES  NO   
 (All Parts Must Be Satisfied)

MINIMUM VOLUME REQUIREMENTS	ENTERING VOLUMES - ALL APPROACHES	✓	FULFILLED
1000 Veh/Hr	During Typical Weekday Peak Hour _____ Veh/Hr and has 5-year projected traffic volumes that meet one or more of Warrants 1, 2, and 3 during an average weekday.		Yes <input type="checkbox"/> No <input type="checkbox"/>
	OR During Each of Any 5 Hrs. of a Sat. or Sun _____ Veh/Hr		
CHARACTERISTICS OF MAJOR ROUTES		MAJOR ROUTE A	MAJOR ROUTE B
Hwy. System Serving as Principal Network for Through Traffic			
Rural or Suburban Highway Outside Of, Entering, or Traversing a City			
Appears as Major Route on an Official Plan			
Any Major Route Characteristics Met, Both Streets			Yes <input type="checkbox"/> No <input type="checkbox"/>

The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal.

**Intersection**

Intersection Delay, s/veh 13

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Vol, veh/h	228	407	438	82	84	157
Conflicting Peds, #/hr	2	0	0	2	2	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	0
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	248	442	476	89	91	171

Major/Minor	Major1	Major2	Minor2
Conflicting Flow All	567	0	1461
Stage 1	-	-	523
Stage 2	-	-	938
Follow-up Headway	2.218	-	3.518
Pot Capacity-1 Maneuver	1005	-	142
Stage 1	-	-	595
Stage 2	-	-	381
Time blocked-Platoon, %	-	-	-
Mov Capacity-1 Maneuver	1003	-	95
Mov Capacity-2 Maneuver	-	-	95
Stage 1	-	-	594
Stage 2	-	-	256

Approach	EB	WB	SB
HCM Control Delay, s	3.5	0	66.1
HCM LOS			F

Minor Lane / Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1003	-	-	-	95	550
HCM Lane V/C Ratio	0.247	-	-	-	0.961	0.31
HCM Control Delay (s)	9.763	0	-	-	162.5	14.5
HCM Lane LOS	A	A			F	B
HCM 95th %tile Q(veh)	0.974	-	-	-	5.625	1.313

**Notes**

~ : Volume Exceeds Capacity; \$ : Delay Exceeds 300 Seconds; Error : Computation Not Defined

**Intersection**

Intersection Delay, s/veh 4.8

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Vol, veh/h	138	358	282	36	59	194
Conflicting Peds, #/hr	2	0	0	2	2	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	0
Veh in Median Storage, #	-	0	0	-	0	-
Grade, %	-	0	0	-	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	150	389	307	39	64	211

Major/Minor	Major1	Major2	Minor2
Conflicting Flow All	348	0	330
Stage 1	-	-	-
Stage 2	-	-	-
Follow-up Headway	2.218	-	3.318
Pot Capacity-1 Maneuver	1211	-	712
Stage 1	-	-	-
Stage 2	-	-	-
Time blocked-Platoon, %	-	-	-
Mov Capacity-1 Maneuver	1209	-	710
Mov Capacity-2 Maneuver	-	-	-
Stage 1	-	-	-
Stage 2	-	-	-

Approach	EB	WB	SB
HCM Control Delay, s	2.3	0	15.8
HCM LOS			C

Minor Lane / Major Mvmt	EBL	EBT	WBT	WBR	SBLn1	SBLn2
Capacity (veh/h)	1209	-	-	-	221	710
HCM Lane V/C Ratio	0.124	-	-	-	0.29	0.297
HCM Control Delay (s)	8.399	0	-	-	27.8	12.2
HCM Lane LOS	A	A			D	B
HCM 95th %tile Q(veh)	0.424	-	-	-	1.158	1.243

**Notes**

~ : Volume Exceeds Capacity; \$ : Delay Exceeds 300 Seconds; Error : Computation Not Defined

# QUEUE DISTANCE (AVER)

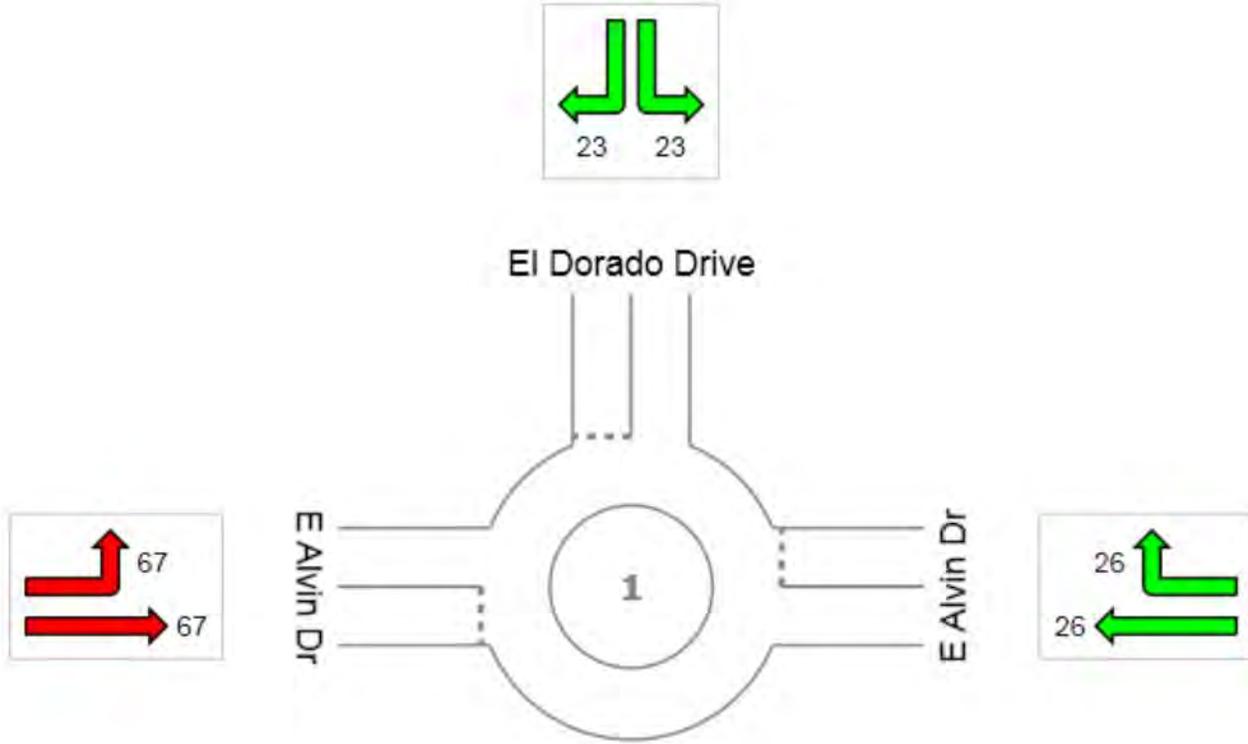
Average Back of Queue for any lane used by movement (feet)

Site: E Alvin Dr / El Dorado Dr (AM Peak)

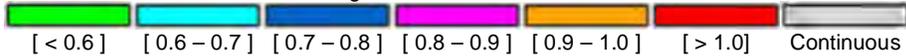
New Site  
Roundabout

### All Movement Classes

	East	North	West	Intersection
Queue Distance (Aver)	26	23	67	67



Colour code based on Queue Storage Ratio



## DELAY (CONTROL)

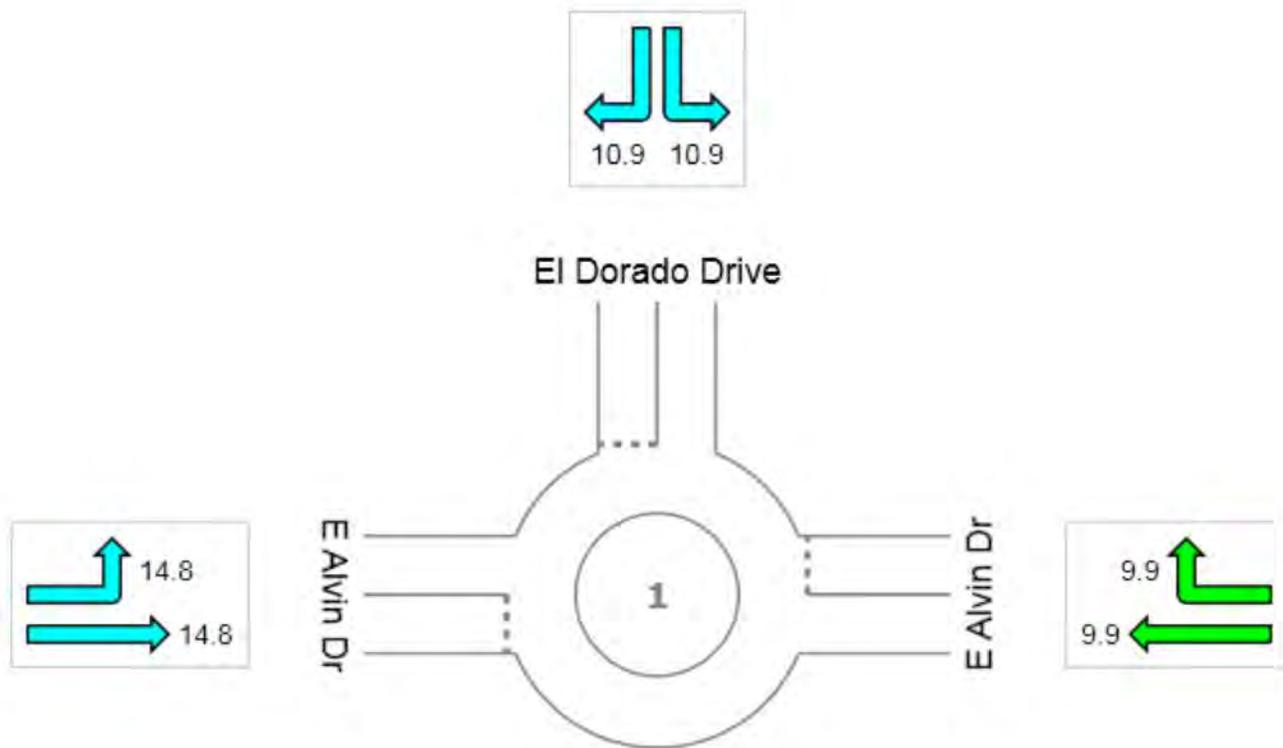
Average control delay per vehicle, or average pedestrian delay (seconds)

 Site: E Alvin Dr / El Dorado Dr (AM Peak)

New Site  
Roundabout

### All Movement Classes

	East	North	West	Intersection
Delay (Control)	9.9	10.9	14.8	12.5
LOS	A	B	B	B



Colour code based on Level of Service



Level of Service Method: Delay & v/c (HCM 2010)

LOS F will result if  $v/c > 1$  irrespective of movement delay value (does not apply for approaches and intersection).

Roundabout Level of Service Method: Same as Sign Control

HCM Delay Formula option is used. Control Delay does not include Geometric Delay since Exclude Geometric Delay option applies.

# QUEUE DISTANCE (AVER)

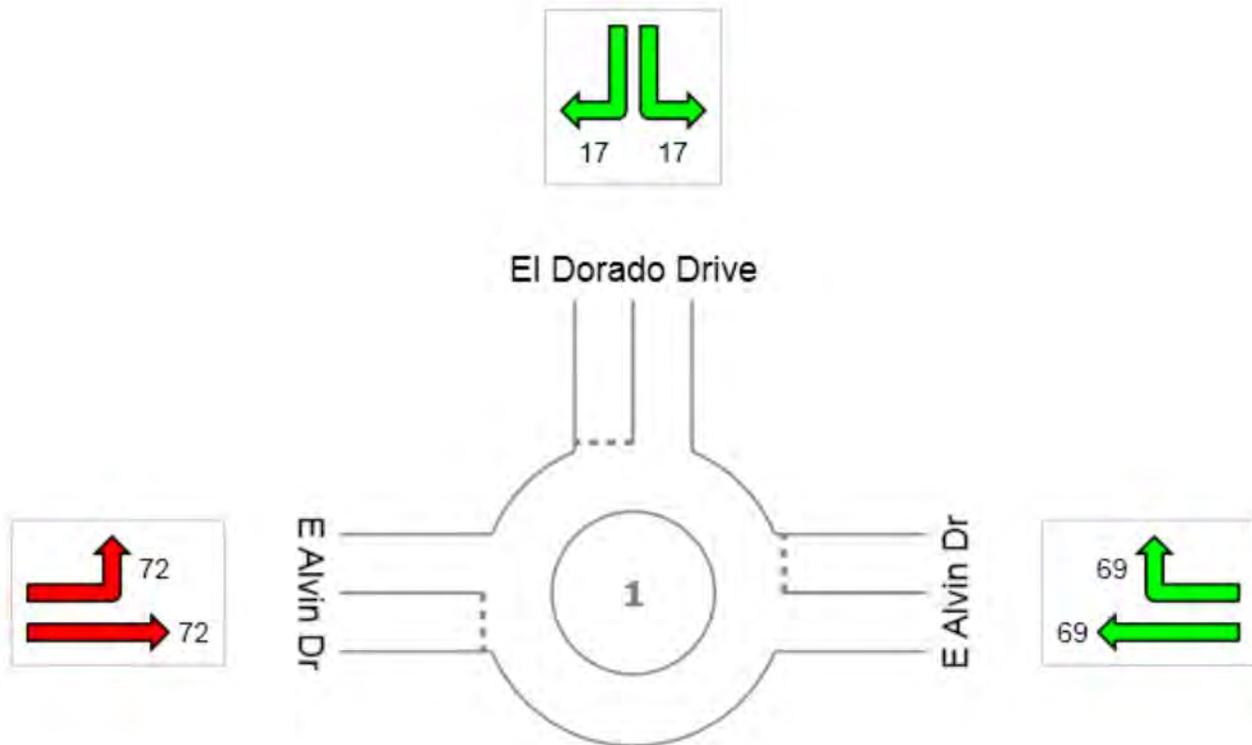
Average Back of Queue for any lane used by movement (feet)

 Site: E Alvin Dr / El Dorado Dr (PM Peak)

New Site  
Roundabout

### All Movement Classes

	East	North	West	Intersection
Queue Distance (Aver)	69	17	72	72



Colour code based on Queue Storage Ratio



## DELAY (CONTROL)

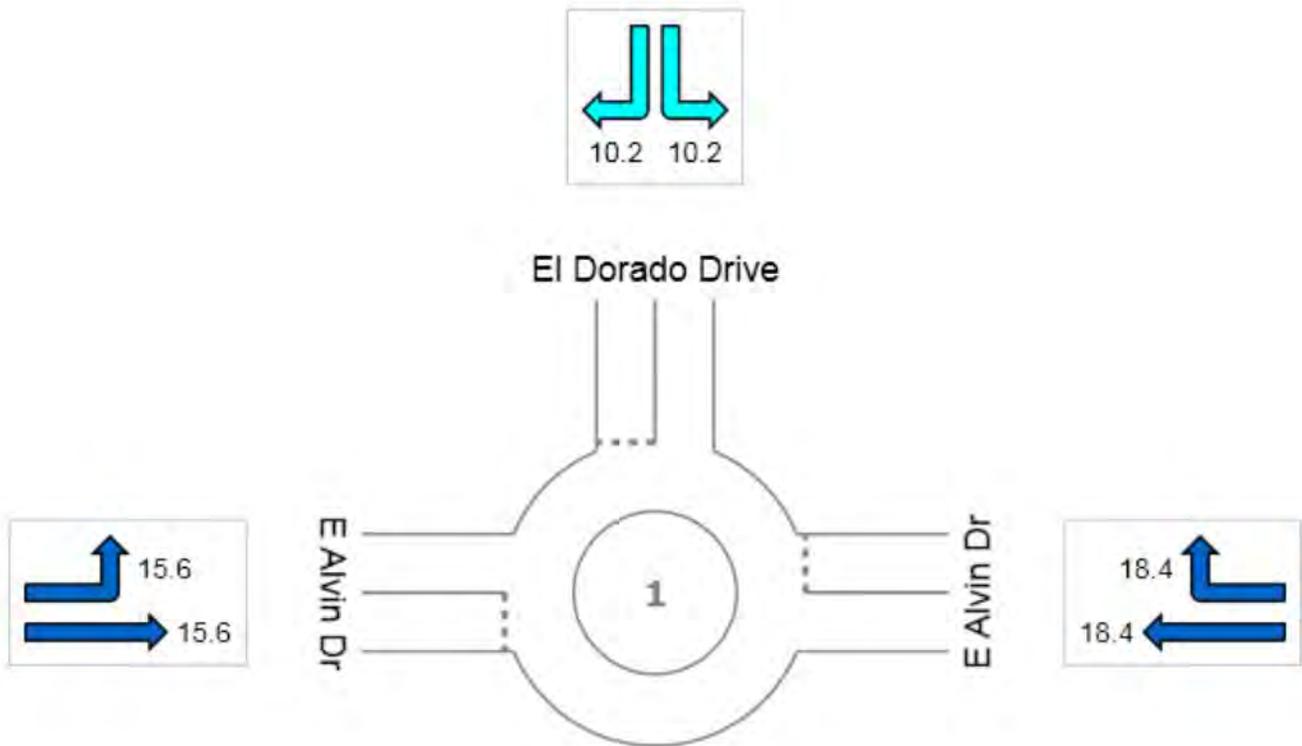
Average control delay per vehicle, or average pedestrian delay (seconds)

 Site: E Alvin Dr / El Dorado Dr (PM Peak)

New Site  
Roundabout

### All Movement Classes

	East	North	West	Intersection
Delay (Control)	18.4	10.2	15.6	15.8
LOS	C	B	C	C



Colour code based on Level of Service



Level of Service Method: Delay & v/c (HCM 2010)

LOS F will result if  $v/c > 1$  irrespective of movement delay value (does not apply for approaches and intersection).

Roundabout Level of Service Method: Same as Sign Control

HCM Delay Formula option is used. Control Delay does not include Geometric Delay since Exclude Geometric Delay option applies.

05-Salinas-2  
 HCM 2010 Signalized Intersection Summary  
 4: Alvin Dr & El Dorado Dr

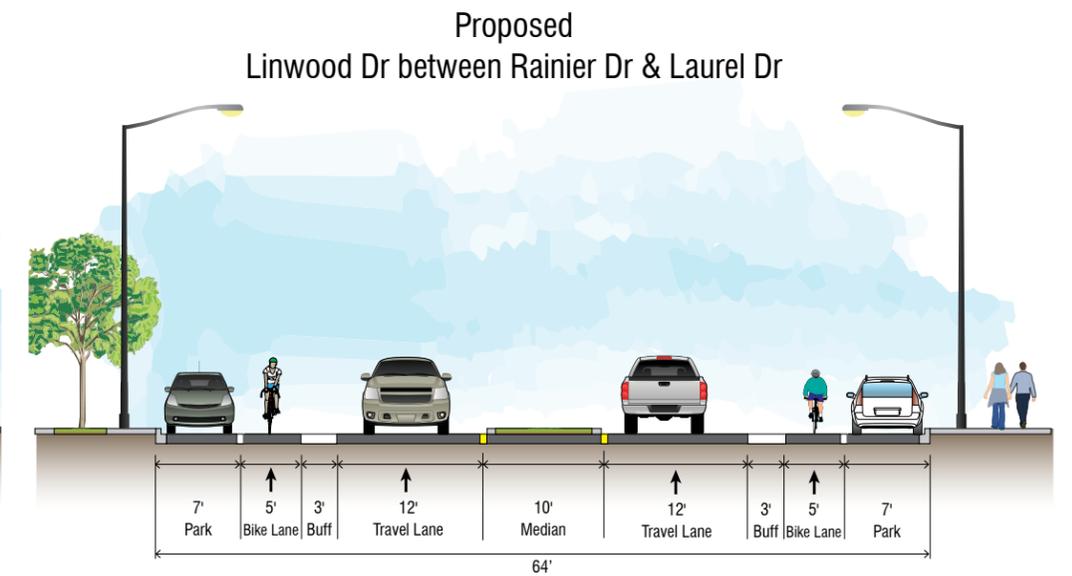
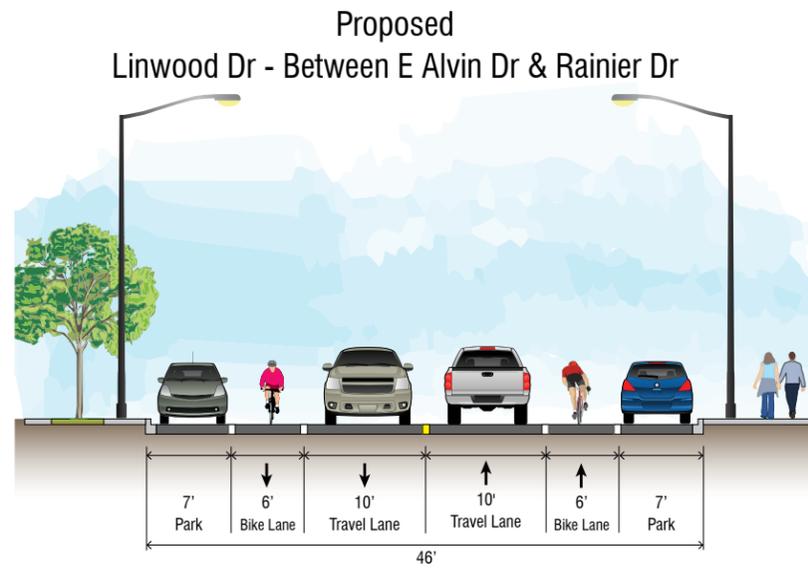
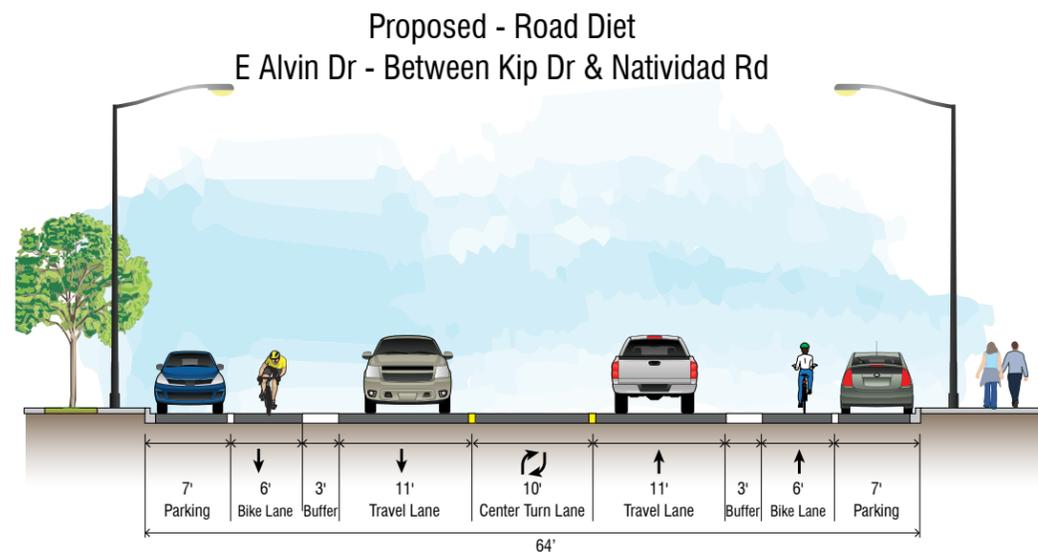
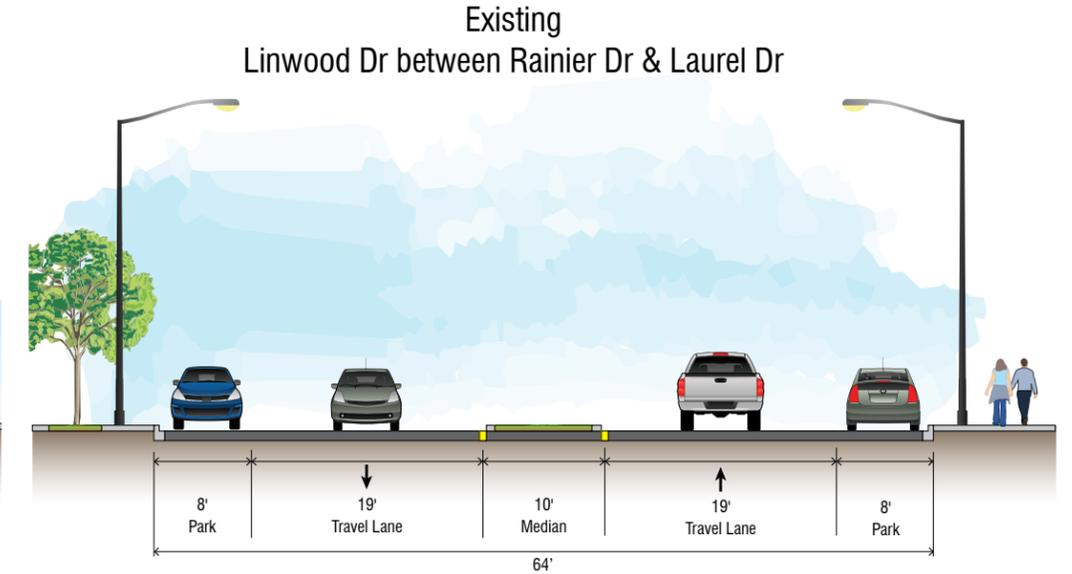
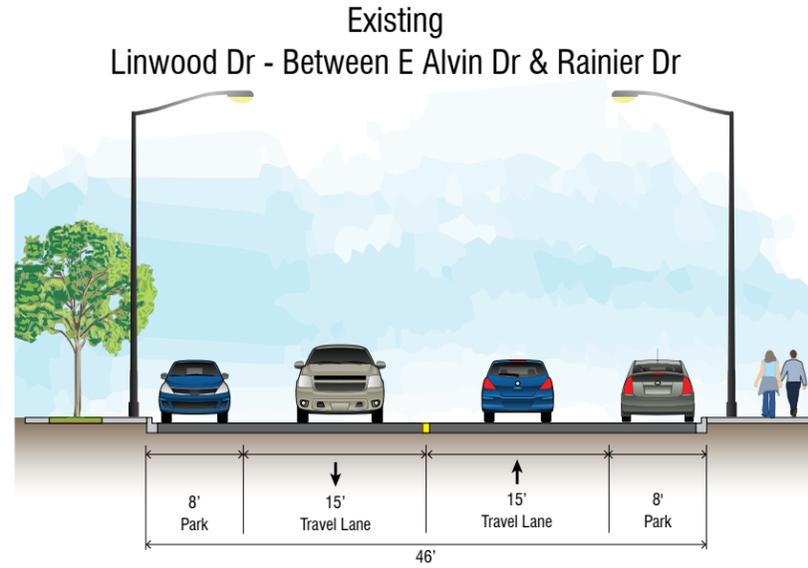
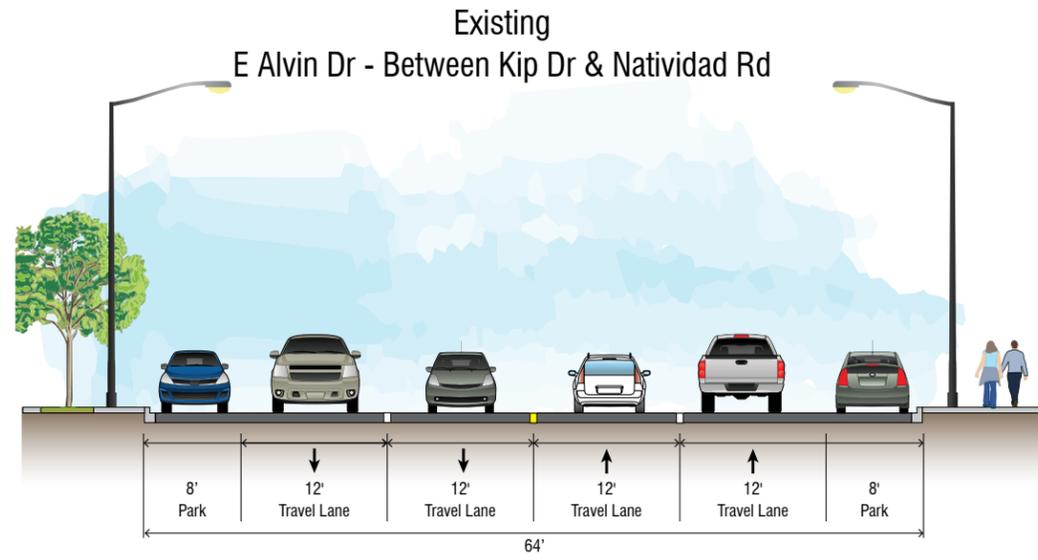
5/22/2015



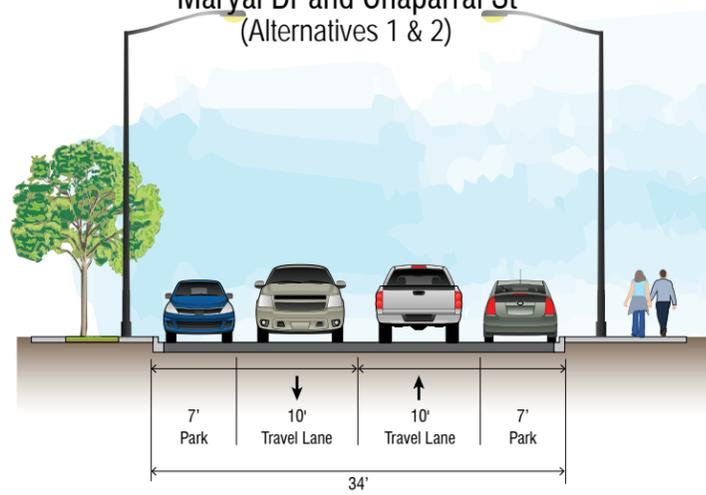
Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Volume (veh/h)	148	372	332	40	59	194
Number	7	4	8	18	1	16
Initial Q (Qb), veh	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00			0.98	1.00	1.00
Parking Bus Adj	1.00	1.00	1.00	1.00	1.00	1.00
Adj Sat Flow veh/h/ln	190.0	186.3	186.3	190.0	186.3	190.0
Lanes	0	1	1	0	0	1
Cap, veh/h	0	1287	1126	134	0	0
Arrive On Green	0.00	0.69	0.69	0.69	0.00	0.00
Sat Flow, veh/h	0	1863	1630	194	0	0
Grp Volume(v), veh/h	0	404	0	404	0	0
Grp Sat Flow(s),veh/h/ln	0	1863	0	1824	0	0
Q Serve(g_s), s	0.0	1.1	0.0	1.1	0.0	0.0
Cycle Q Clear(g_c), s	0.0	1.1	0.0	1.1	0.0	0.0
Prop In Lane	0.00			0.11	0.00	0.00
Lane Grp Cap(c), veh/h	0	1287	0	1260	0	0
V/C Ratio(X)	0.00	0.31	0.00	0.32	0.00	0.00
Avail Cap(c_a), veh/h	0	3745	0	2539	0	0
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	0.00	1.00	0.00	1.00	0.00	0.00
Uniform Delay (d), s/veh	0.0	0.8	0.0	0.8	0.0	0.0
Incr Delay (d2), s/veh	0.0	0.1	0.0	0.1	0.0	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0
%ile Back of Q (50%), veh/ln	0.0	0.0	0.0	0.1	0.0	0.0
Lane Grp Delay (d), s/veh	0.0	0.9	0.0	0.9	0.0	0.0
Lane Grp LOS		A		A		
Approach Vol, veh/h		404	404		0	
Approach Delay, s/veh		0.9	0.9		0.0	
Approach LOS		A	A			
<b>Timer</b>						
Assigned Phs	7	4	8			
Phs Duration (G+Y+Rc), s	0.0	12.9	12.9			
Change Period (Y+Rc), s	4.0	4.0	4.0			
Max Green Setting (Gmax), s	4.0	26.0	18.0			
Max Q Clear Time (g_c+I1), s	0.0	3.1	3.1			
Green Ext Time (p_c), s	0.0	5.4	4.5			
<b>Intersection Summary</b>						
HCM 2010 Ctrl Delay			0.9			
HCM 2010 LOS			A			
<b>Notes</b>						
User approved volume balancing among the lanes for turning movement.						



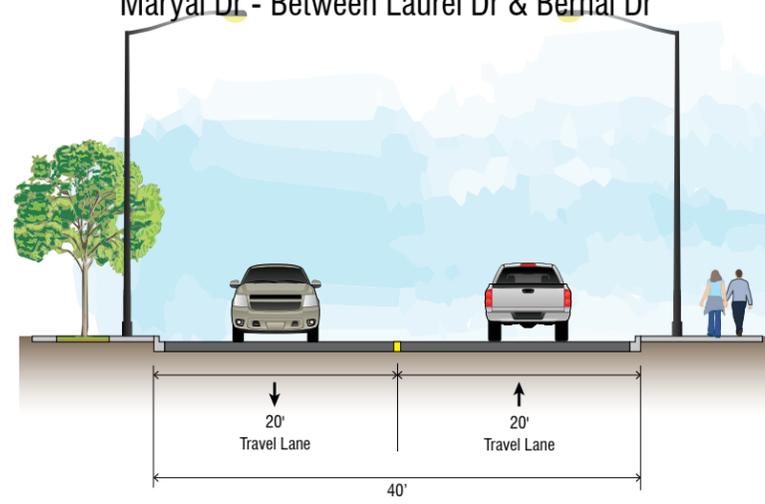
Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Volume (veh/h)	228	407	438	82	84	157
Number	7	4	8	18	1	16
Initial Q (Qb), veh	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00			1.00	1.00	1.00
Parking Bus Adj	1.00	1.00	1.00	1.00	1.00	1.00
Adj Sat Flow veh/h/ln	190.0	186.3	186.3	190.0	186.3	190.0
Lanes	0	1	1	0	0	1
Cap, veh/h	0	1344	1101	206	0	0
Arrive On Green	0.00	0.72	0.72	0.72	0.00	0.00
Sat Flow, veh/h	0	1863	1526	285	0	0
Grp Volume(v), veh/h	0	442	0	565	0	0
Grp Sat Flow(s),veh/h/ln	0	1863	0	1812	0	0
Q Serve(g_s), s	0.0	1.2	0.0	1.8	0.0	0.0
Cycle Q Clear(g_c), s	0.0	1.2	0.0	1.8	0.0	0.0
Prop In Lane	0.00			0.16	0.00	0.00
Lane Grp Cap(c), veh/h	0	1344	0	1307	0	0
V/C Ratio(X)	0.00	0.33	0.00	0.43	0.00	0.00
Avail Cap(c_a), veh/h	0	3371	0	2270	0	0
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	0.00	1.00	0.00	1.00	0.00	0.00
Uniform Delay (d), s/veh	0.0	0.7	0.0	0.8	0.0	0.0
Incr Delay (d2), s/veh	0.0	0.1	0.0	0.2	0.0	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0
%ile Back of Q (50%), veh/ln	0.0	0.1	0.0	0.1	0.0	0.0
Lane Grp Delay (d), s/veh	0.0	0.9	0.0	1.0	0.0	0.0
Lane Grp LOS		A		A		
Approach Vol, veh/h		442	565		0	
Approach Delay, s/veh		0.9	1.0		0.0	
Approach LOS		A	A			
<b>Timer</b>						
Assigned Phs	7	4	8			
Phs Duration (G+Y+Rc), s	0.0	14.4	14.4			
Change Period (Y+Rc), s	4.0	4.0	4.0			
Max Green Setting (Gmax), s	4.0	26.0	18.0			
Max Q Clear Time (g_c+I1), s	0.0	3.2	3.8			
Green Ext Time (p_c), s	0.0	7.1	5.7			
<b>Intersection Summary</b>						
HCM 2010 Ctrl Delay			1.0			
HCM 2010 LOS			A			
<b>Notes</b>						
User approved volume balancing among the lanes for turning movement.						



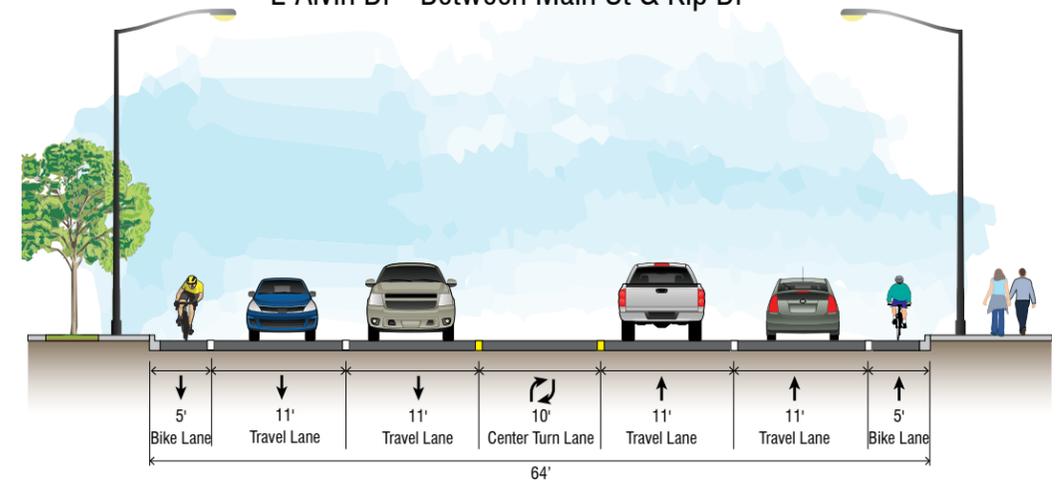
Existing and Proposed  
Maryal Dr and Chaparral St  
(Alternatives 1 & 2)



Existing  
Maryal Dr - Between Laurel Dr & Bernal Dr



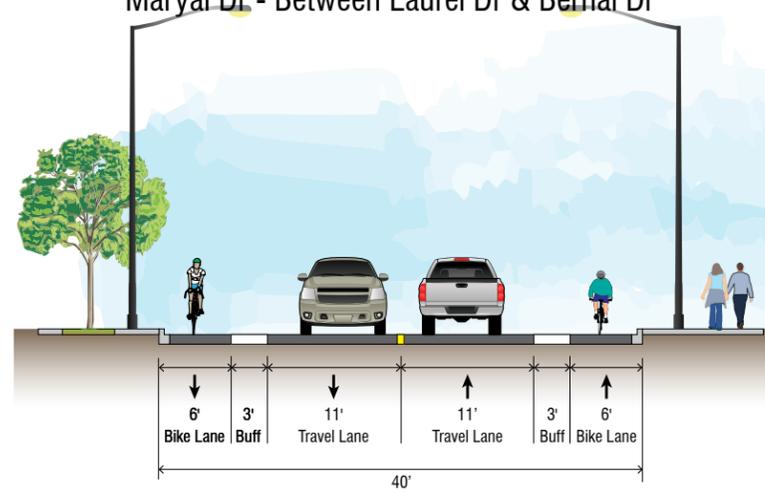
Existing  
E Alvin Dr - Between Main St & Kip Dr



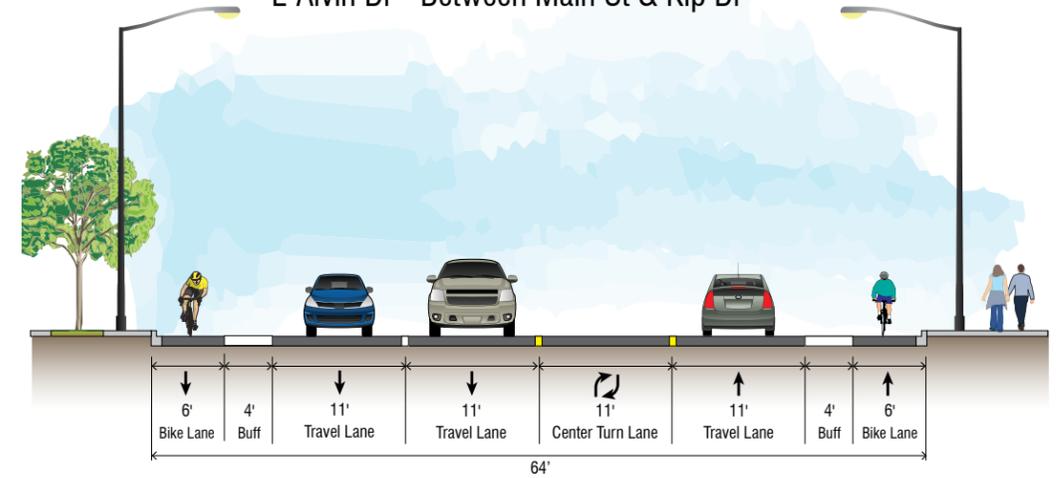
Proposed Striping Enhancements  
for Maryal Dr, Chaparral St, and Kip Dr



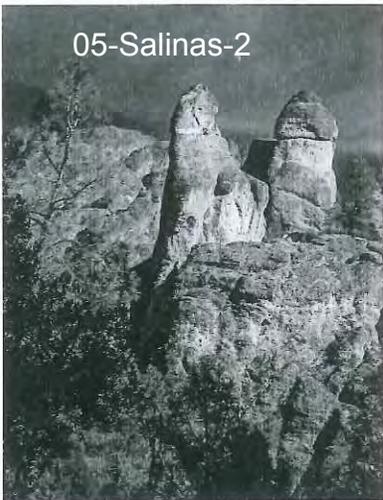
Proposed  
Maryal Dr - Between Laurel Dr & Bernal Dr



Proposed  
E Alvin Dr - Between Main St & Kip Dr



05-Salinas-2



Monterey Bay 2035

# Moving Forward

Sustainability.  
Mobility.  
Accessibility.  
Economy.  
Social Equity.



# 2035 Metropolitan Transportation Plan / Sustainable Communities Strategy

Final  
June 2014



Attachment K

**Amtrak**

The only regular rail passenger currently operating in the region is provided by Amtrak, the most popular long distance passenger train in the United States. The Coast Starlight, which connects Los Angeles to Seattle, stops in Salinas, the only Amtrak rail station in the region. This route operates one train in each direction daily. In the future, Amtrak will expand service by offering the Coast Starlight services which will stop at new additional stations in Soledad and King City.

Rail passengers can ride the Amtrak bus to connect to the Capitol Corridor route, which runs daily between San Jose and Sacramento. There are also three round trip connecting bus services between the state Capitol and Monterey County daily. Each major area of Monterey County – the Monterey Peninsula, Salinas, and the South Monterey County cities – is served by this connecting bus service. The Amtrak Capitol Corridor service provides four round trips between San Jose and Sacramento on weekdays and six round trips on weekends. The Capitol Corridor connecting bus service to Monterey County serves Watsonville, Salinas, California State University Monterey Bay (CSUMB), and four locations within the City of Monterey.

**Commuter and Light Rail**

The Transportation Agency for Monterey County (TAMC) and the Santa Cruz County Regional Transportation Commission (SCCRTC) are working to bring rail service to Monterey and Santa Cruz Counties, so that residents can travel to jobs, education, and entertainment.

Two rail services for Monterey County are planned:

- *Capitol Corridor Extension to Salinas* – An extension of commuter rail service from Santa Clara County to Salinas
- *Monterey Branch Light Rail* – Passenger light rail service on the Monterey Peninsula

The Monterey Branch Line will connect to the planned commuter rail service in Castroville and provide local transit service to planned stations in Monterey, Seaside, Sand City, Marina/CSUMB, and Castroville. As a precursor to the light rail bus

rapid transit is being considered along the same alignment. A less expensive alternative, bus rapid transit will allow transportation agencies to phase in a full light rail system.

In 2012, the Santa Cruz County Regional Transportation Commission (SCCRTC) purchased a rail line extending almost 32 miles from Davenport to Pajaro. One rail service is planned for Santa Cruz County:

- *Santa Cruz Branch Rail Line* – Planned passenger rail and expanded freight service between Santa Cruz and Watsonville

This service will use the existing right of way which requires significant improvements before passenger rail service can operate on the existing tracks. The Monterey Bay Sanctuary Scenic Trail will also share the right of way with the rail line in Santa Cruz County.

**Active Transportation**

For the purposes of the 2035 MTP/SCS, active transportation refers to bicycling and walking. Walking and bicycling are essential parts of the region’s transportation system, are low cost, do not emit greenhouse gases, can help reduce roadway congestion, and increase health and quality of life of residents. Additionally these types of facilities can often be implemented as part of maintenance and operations projects making this kind of investment very cost effective.

As the region works toward reducing congestion and greenhouse gases, walking and bicycling will become more essential to meet the region’s future needs. To make active transportation a more attractive and feasible mode of travel for the different users in the region, additional infrastructure improvements need to be made. Given that all trips, including automobile trips, start with walking, it is important to ensure that the sidewalks and streets are accommodating to all users. In all, the 2035 MTP/SCS’s active transportation improvements total over \$898 million.

### Bicycle and Pedestrian Facilities

When Caltrans and local jurisdictions provide bicycle and pedestrian amenities, they not only are encouraging recreational opportunities but are also providing an alternative to driving. In the region, the RTPAs administer the distribution and use of bicycle and pedestrian funds as provided for under the Transportation Development Act (TDA).

TAMC and SCCRTC provide ongoing bicycle programs covering facilities planning, policy development, education/promotion, and staffing of the respective county Bicycle Advisory Committees. Program efforts are focused on coordination and incorporation of bicycle planning and promotion into all planning activities including general plan development, capital improvement programming, development review, environmental review, and other transportation system management efforts. Some examples of bicycle and pedestrian projects around the region are:

- Monterey Bay Sanctuary Scenic Trail
- Carmel to Pebble Beach bicycle facility
- Bicycle kiosks, lockers, and wayfinding signs
- Sidewalk enhancements
- Bicycle and pedestrian plans

### Bicycle Network

A considerable bicycle network exists, particularly in the urbanized portions of the region. Although there is a general lack of continuity in bike lanes striped on the region’s street network, progress has been made in planning and funding bikeway improvements. TAMC and SCCRTC are developing a Monterey Bay Sanctuary Scenic Trail. Continued emphasis on improving bicycle routes that safely connect employment centers and residential locations will increase commuter bicycle use. A map of the regional bicycle network is shown in Figure 2-3.

Bike lanes in the region are classified in three categories:

- *Class I Bikeway* – Typically called a “bike path” or “multiuse path,” a Class I bikeway provides bicycle travel on a right-of-way completely separated from any street or highway. Class I bikeways are not for the exclusive use of bicyclists, and can be used by pedestrians, joggers, and other non-motorized users.
- *Class II Bikeway* – Often referred to as a “bike lane,” a Class II bikeway provides a striped lane for one-way travel on a street or highway.
- *Class III Bikeway* – Generally referred to as a “bike route,” a Class III bikeway may include signage or sharrows and provides for shared use with vehicles.

### Pedestrian Facilities

Pedestrian travel is a vital part of the transportation, economic and social life of the Monterey Bay Area, and pedestrian amenities — such as appropriately sized sidewalks, crosswalks, curb cuts, landscaping, and benches — are seen as beneficial additions that make communities walkable, friendly, and livable.

Pedestrian facilities including sidewalks, streets, and trails are fundamental to the functioning of Monterey Bay Area neighborhoods. Cities that promote walking in all its forms are promoting healthy neighborhoods and communities. Local jurisdictions are working to achieve an effective pedestrian network by implementing pedestrian infrastructure improvements in conjunction with new and redeveloped streets, and working closely with the public to identify where existing gaps in pedestrian facilities exist. In some areas, local jurisdictions are implementing traffic calming projects to slow vehicular traffic and create more attractive pedestrian environments.

More emphasis is being placed on walking as a viable, inexpensive, nonpolluting, and healthy way to travel. Most pedestrian infrastructure is in the form of sidewalks; however, there are many significant trails in the region. Multipurpose trails are separated from roadways and are usually

shared by more than one user type including rollerbladers, bicyclists, skateboarders, pedestrians, horses, and joggers.

Opportunities for additional shared use facilities may be present in the region. For example, Pacific Gas and Electric (PG&E) owns and operates pipelines that distribute natural gas to most communities throughout the region via 12" and 20" pipelines. Many of these pipelines have 25 to 100 foot easements that could be utilized for pedestrian and bicycle paths. Additionally, PG&E has easements throughout the state for electrical transmission lines, some of which have been made into linear greenbelts with bicycle and pedestrian paths.

### **Complete Streets**

The Complete Streets Act of 2008 (AB 1358) requires cities and counties to incorporate the concept of complete streets in their general plan updates to ensure that transportation plans meet the needs of all users of the roadway system. AMBAG supports and encourages implementation of complete streets policies in the 2035 MTP/SCS. The Regional Complete Streets Guidebook, included as Appendix H, was developed by staff from the Transportation Agency for Monterey County, the San Benito County Council of Governments, and the Santa Cruz County Regional Transportation Commission. Regional agencies will work with local jurisdictions as they implement complete streets strategies within their jurisdiction by providing information and resources to support local planning activities. Complete streets must be context sensitive to adjacent land uses in order to function well for diverse roadway users. Recognizing that roadways have primarily been designed to serve the automobile, regional complete streets efforts highlight bicycle and pedestrian access as an essential design objective.

### **Safe Routes to School**

SAFETEA-LU established the Safe Routes to School program to "enable and encourage primary and secondary school children to walk and bicycle to school" and to support infrastructure related and educational projects that are geared toward

providing a safe, appealing environment for walking and bicycling. Safe Routes to School programs can play a critical role in eliminating some of the vehicle trips that occur during peak periods to drop off or pick up students by ensuring safe routes to bike or walk to school.

Under the new transportation authorization bill, MAP-21, Safe Routes to School has been combined with other bicycling and walking programs into a new program called Transportation Alternatives. There is less funding available for Transportation Alternatives than for the programs that were consolidated and there is no longer dedicated funding for Safe Routes to School.

### **Trails**

The Monterey Bay Sanctuary Scenic Trail (MBSST) is planned to be a multiuse recreation and interpretive pathway that links existing and newly established trail segments into a continuous coastal trail around the Monterey Bay. The MBSST Final Master Plan and Environmental Impact Report was adopted by SCCRTC in November 2013. The TAMC MBSST Final Master Plan was adopted in January 2008.

In addition to providing bicycle and pedestrian facilities, interpretive features educate users of the trail about the natural and cultural resources of the Monterey Bay National Marine Sanctuary and its environs. The trail is located and designed so visitors can explore and enjoy the coastal communities of Santa Cruz and Monterey Counties, while respecting residential, agricultural, and environmentally sensitive surroundings along the trail.

The approximately 110 mile coastal trail corridor provides public access along Monterey Bay from Santa Cruz to Monterey. The trail is envisioned for pedestrians and bicyclists, with each trail section dictated by natural landforms and features, existing land uses, and desired destinations. The project links existing local trails, bridging the gaps between them. Sections of the MBSST network will be included in the California Coastal Trail, a 1,200 mile hiking trail which will eventually extend the entire length of the California Coast.

so that regional land use and transportation strategies take into account and respond appropriately to the needs of all jurisdictions.

The implementation strategies included in this 2035 MTP/SCS include a series of strategies focused solely on economic development and better understanding the dynamics of rural and low cost areas so that the needs and interests of these populations are better reflected in the regional planning process.

## Transportation System and Programs

### Integrated Multimodal Network

The 2035 MTP/SCS calls for an expanded transportation network that will complement the overall land use pattern. Working together, these complementary land use and transportation strategies can significantly reduce GHG by increasing transit ridership, increasing walking and biking, and reducing the auto trips.

### Transit

As shown in Figure 4-13, the 2035 MTP/SCS calls for an expansion of the public transit network and transit service on new and existing routes, resulting in greater transit accessibility and connectivity throughout the region. The 2035 MTP/SCS introduces bus rapid transit and rail passenger service in the region in key corridors. These include extension of the Capital Corridor to Salinas, light rail transit services on the Monterey Peninsula, and future passenger rail service in Santa Cruz County.

### Roadways

The 2035 MTP/SCS includes strategic capacity and technology enhancements to existing highways (as shown in Figure 4-14) as well as local streets. These enhancements, combined with transit, rail, and active transportation improvements complement the preferred land use pattern and support the expected growth throughout the region. The overall land use pattern relies on the development of high quality transit stations and efficient transportation corridors, which leads to significant GHG reductions and

other benefits due to a higher walk/bike mode share, more transit use, and shorter auto trips.

### Active Transportation

The 2035 MTP/SCS also includes a notable increase in the regional active transportation network. Figure 4-15 shows the bicycle network in 2035. Active transportation is an essential part of the region's transportation system, is low cost, does not produce greenhouse gases, can help reduce roadway congestion, and increases health and the quality of life of residents. Active transportation will receive over \$898 million or nearly 12 percent in available revenues under the 2035 MTP/SCS. This is a significant increase as compared to less than one percent of the available revenue in the 2010 MTP. This emphasis signifies an important opportunity to advance the goals of SB 375 by increasing non-motorized modes of transportation, thereby expanding access to transit and improving public health and air quality. The Regional Transportation Planning Agencies - Transportation Agency for Monterey County, Santa Cruz County Regional Transportation Commission and San Benito Council of Governments - worked closely with cities and counties to identify a list of projects that will add and enhance walking and biking facilities to make these modes more attractive for short distance trips, including trips to access transit. Additionally, the Regional Transportation Planning Agencies developed the Regional Complete Streets Guidelines to assist local jurisdictions in project design and implementation.

### Programs and Strategies

In addition to infrastructure improvements to the transportation network there are less costly programs and strategies that can improve the flow of traffic on the transportation network as well as the effectiveness of the transportation system as a whole.

### Transportation Systems Management

Transportation System Management (TSM) measures also support the goals of the 2035 MTP/SCS by making improvements to improve operational efficiency. These techniques contribute

to improved traffic flow, better air quality, improved system accessibility, and safety. The following TSM measures support the forecasted land use development pattern of the 2035 MTP/SCS:

- Enhanced incident management
- Ramp metering
- Traffic signal synchronization
- Improved data collection

### Transportation Demand Management

In addition to the transportation network, the 2035 MTP/SCS also relies on strategic and extensive Travel Demand Management (TDM) measures that support planned land use patterns. These cost-effective strategies improve the effectiveness of the transportation system by supporting a shift from single occupancy vehicle use to other alternatives. TDM measures will receive a total of more than \$46 million in available revenues.

The 2035 MTP/SCS employs the following TDM measures to improve mobility and access:

- Promoting telecommuting and flexible work schedules
- Complete streets improvements to increase first mile/last mile connectivity
- Expanding vanpool programs
- Expanding traveler information systems

### Public Health

The 2035 MTP/SCS recognizes the impact that transportation and land use decisions have on the health of the region's residents. A substantial body of research shows that certain aspects of the transportation infrastructure, including public transit, sidewalks and safe street crossings near schools, and bicycle paths, are associated with more walking and bicycling, greater physical activity, and lower obesity rates. The Plan supports the integration of transportation and land use policies to promote improved public health. The 2035 MTP/SCS seeks to promote active transportation options,

and a decrease in bicycle and pedestrian fatalities and injuries through increased funding of active transportation facilities and transportation demand management measures.

The 2035 MTP/SCS also sets forth a vision for a less carbon intensive vehicle fleet. Through partial zero and zero-emission vehicle technologies, the 2035 MTP/SCS promotes a more sustainable future for the region that includes less tail pipe emissions from the vehicles that are on the road.

### Energy and Alternative Fuels

The transportation of people and goods in cars, trucks, buses, and on motorcycles is the single largest source of GHG emissions in the region. The levels of fuel consumption and GHG partly result from the region's reliance on petroleum-based gasoline and diesel fuels, as well as the average fuel efficiency of vehicles.

The region's need for gasoline and diesel is projected to decline from about 129 million gallons per day in 2010 to about 112 million gallons per day by 2035. (California Energy Commission, "Transportation Energy Forecasts and Analyses for the 2009 Integrate Energy Policy Report.") The projected reduction in fuel consumption is due in large part to state fuel efficiency standards for vehicles and state mandated increases in the supply and use of alternative transportation fuels. Electric vehicles in particular are an important alternative to conventional vehicles as they have the potential to reduce greenhouse gas emissions resulting from the consumption of fossil fuels, particularly in a state with a cleaner energy mix.

Increasing electric vehicle use will help achieve statewide policies aimed at reducing greenhouse gas emissions. California has a number of policies to encourage widespread adoption of electric vehicles.

AB 32 requires the state to reduce emissions to 1990 levels by 2020, and Executive Order S-3-05 calls for a 80 percent reduction below 1990 levels by 2050. Key elements of the state's AB 32 Scoping Plan for achieving these goals include the Zero

# Transportation Agency for Monterey County Bicycle and Pedestrian Master Plan December 2011

PREPARED BY:  
Alta Planning + Design

PREPARED FOR:  
Transportation Agency for Monterey County

FUNDED IN PART BY:  
Monterey Bay Unified Air Pollution Control District



### 1.2.1. Vision

The following vision statement expresses the desired bicycling and walking environment in Monterey County.

*This Plan envisions Monterey County with a transportation system that supports sustainability, active living and community where bicycling and walking are an integral part of daily life. The system will include a comprehensive, safe, and convenient bicycle and pedestrian network that will support bicycling and walking as a viable, convenient, and popular travel choice for residents and visitors.*

### 1.2.2. Goals

The six goals presented are broad statements of purpose; each addresses a topic designed to support the vision for bicycling and walking in Monterey County. These goals identify a strategy for improving non-motorized transportation.

1. Increase and improve bicycle and pedestrian mobility across Monterey County.
2. Maintain and improve the quality, operation and integrity of bikeway and walkway network facilities.
3. Improve bicycle and pedestrian safety.
4. Increase the number of commute, recreation and utilitarian bicycle and pedestrian trips.
5. Increase the number of high quality support facilities to complement the bicycle network and walkway facilities.
6. Increase education and awareness of the value of bicycle and pedestrian travel for commute and non-commute trips.

### 1.2.3. Objectives

Objectives are specific measurable action items that evaluate progress towards a goal. The following objectives identify actions developed to help the Plan's goals to be achieved.

1. Increase the mileage of transportation related bicycle facilities miles in Monterey County by 10 percent from 175 miles to 192 miles by the year 2015.
2. Complete the Monterey Bay Sanctuary Scenic Trail by the year 2025.
3. Implement the Bicycle and Pedestrian Master Plan over the next twenty (20) years.
4. Increase the number of trips made by bicycle from the existing 0.8 percent to three (3) percent by the year 2015.
5. Increase the number of walking trips from the existing 3.8 percent to 5 percent by the year 2015.
6. Reduce the number of bicycle and pedestrian related collisions, injuries and fatalities.
7. Provide maintained bikeways and walkways that are clean, safe, and encourage use.
8. Increase the number of bicycle and pedestrian support facilities.
9. Work with local agencies to institutionalize and promote education, encouragement and outreach bicycle and pedestrian programs.

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**1.2.4. Policies**

The following policies identify specific action areas to achieve this Plan's objectives.

- Policy 1.** Update the Agency Bikeways and Pedestrian Master Plan and Monterey County Bicycle Map in concert with the 5-year update schedule for the Regional Transportation Plan to document gaps on the regional bicycle and pedestrian facilities network and set priorities for funding projects.
- Policy 2.** Implement the 2011 Bikeways and Pedestrian Master Plan over the next twenty (20) years.
- Policy 3.** Prioritize the top ten Bikeways and Pedestrian Master Plan projects for funding.
- Policy 4.** Identify gaps in the countywide regional bicycle facilities network and needed improvements to and within key pedestrian activity centers and county community areas, and define priorities for eliminating these gaps by making needed improvements.
- Policy 5.** Support and encourage local efforts to require the construction of bicycle and pedestrian facilities and amenities, where warranted, as a condition of approval of new development and major redevelopment projects as part of Agency's goal to coordinate land use decision-making with regional transportation planning.
- Policy 6.** Accommodate, and encourage other agencies to accommodate, the need for mobility, accessibility, and safety of bicyclists and pedestrians when planning, designing, and developing transportation improvements. Such accommodations could include:
- a. Reviewing capital improvement projects to make sure that needs of non-motorized travel are considered in planning, programming, design, reconstruction, retrofit, maintenance, construction, operations, and project development activities and products.
  - b. Accommodating the needs of all travelers through a "complete streets" approach to designing new transportation improvements that includes sidewalks, bicycle lanes, crosswalks, pedestrian cut-throughs, or other bicycle and pedestrian improvements.
  - c. Designation of low-traffic bicycle boulevards incorporating traffic calming features to facilitate safe, direct, and convenient bicycle travel within jurisdictions.
- Policy 7.** In order to facilitate regional travel by bicycle, encourage member agencies to construct bicycle facilities on new roadways as follows:
- a. In coordination with regional and local bikeways plans,
  - b. According to the specifications in Chapter 1000 of the Department of Transportation Highway Design Manual,
  - c. With consideration of bicycle lanes (Class 2 facilities) on all new major arterials and on new collectors with an Average Daily Traffic (ADT) greater than 3,000, or with a speed limit in excess of 30 miles per hour, and
  - d. With special attention to safe design where bicycle paths intersect with streets.

- Policy 8. Work to have some of the County's bike routes incorporated into the United States Bicycle Route System, administered by the Adventure Cycling Association.
- Policy 9. Work with agencies with jurisdictions over actuated intersections to:
- a. Conform with Caltrans requirements for bicycle detection at all new and modified actuated intersections, and
  - b. Encourage Caltrans conforming bicycle detection at all existing actuated intersections on designated bikeways.
- Policy 10. Continue to administer the Bike Protection Program to subsidize the cost of bike racks and lockers in locations most heavily used by bicyclists.
- Policy 11. Work with local agencies to develop a coordinated approach to bicycle signage, the system for which could include:
- a. Directional and destination signs along bikeways and shared use trails,
  - b. Location maps in downtown areas and other major pedestrian districts
  - c. A route identification system and common set of signs for the regional bicycle network identified in this Bicycle and Pedestrian Master Plan.
- Policy 12. Determine funding needs for expanding and improving bicycle and pedestrian facilities, and seek funding for those needs.
- Policy 13. Encourage routine maintenance of bikeway and walkway network facilities, as funding and priorities allow, including regular sweeping of bikeways and shared-use pathways. Programs to support these maintenance efforts could include:
- a. Sidewalk repair programs, including incentive to property owners to improve adjoining sidewalks beyond any required maintenance,
  - b. Continued administration of the Bicycle Service Request Form Program to alert public works departments to bicycle-related hazards,
  - c. Develop and administer a Pedestrian Service Request Form Program similar to the Bicycle Service Request Form,
  - d. "Adopt a Trail" programs that involve volunteers for trail clean-up and other maintenance,
  - e. Enforcement of sweeping requirements of towing companies following automobile accidents,
  - f. Encourage those who drive from fields onto highways and roads to minimize the transfer of mud, dirt, gravel and sand from fields and dirt roads to the public roadways,
  - g. Encourage the removal of mud, dirt, gravel and sand that is transferred to the public roadways as soon as possible, and
  - h. Encourage active identification of funding for bikeway maintenance from potential sources including the Bicycle Transportation Account and prioritizing street sweeping on roadways with bikeways.

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- Policy 14. Support the development and implementation of effective safety programs for adults and children to educate drivers, bicyclists, and pedestrians as to their rights and responsibilities, and adult and youth pedestrian and bicycle education and safety programs, including:
- a. Enforcement of pedestrian- and bicycle-related laws by local police departments,
  - b. Teaching of bicycle and pedestrian safety to school children and drivers, and
  - c. Informing interested agencies and organizations about available education materials and assistance such as those programs administered by the National Bicycle Safety Network and the National Safe Routes to School Partnership.
- Policy 15. Support programs being developed, or in place in Monterey County, that encourage and promote bicycle and pedestrian travel. These programs could include:
- a. Producing and distributing the Agency's Monterey County Bicycle Map as resources allow,
  - b. Supporting programs that would encourage more students to walk or bicycle to school,
  - c. Continuing the encouragement of bicycling and walking as part of transportation demand management and commute alternatives programs, and
  - d. Continuing to work with local jurisdictions and partner agencies to sponsor Monterey County Bike Week as a mechanism for promoting bicycle travel and bicycle safety.
- Policy 16. The Agency's Bicycle and Pedestrian Facilities Advisory Committee (Committee) will continue to review development proposals from local agencies and provide comments to public works staff to help resolve bicycle and pedestrian issues of concern and make sure that the proposed facilities are practical, safe and usable. The committee will develop countywide or sub-regional approaches that would help overcome obstacles standing in the way of achieving Agency's bicycle and pedestrian planning goals.
- Policy 17. Minimize trail impacts to private lands including agricultural, residential and other land uses.
- Policy 18. Avoid trail development on private lands when a feasible alternative alignment exists on adjacent public properties.
- Policy 19. Provide amenities such as restrooms, drinking fountains, benches, lighting and others at major trailheads to enhance user experience.

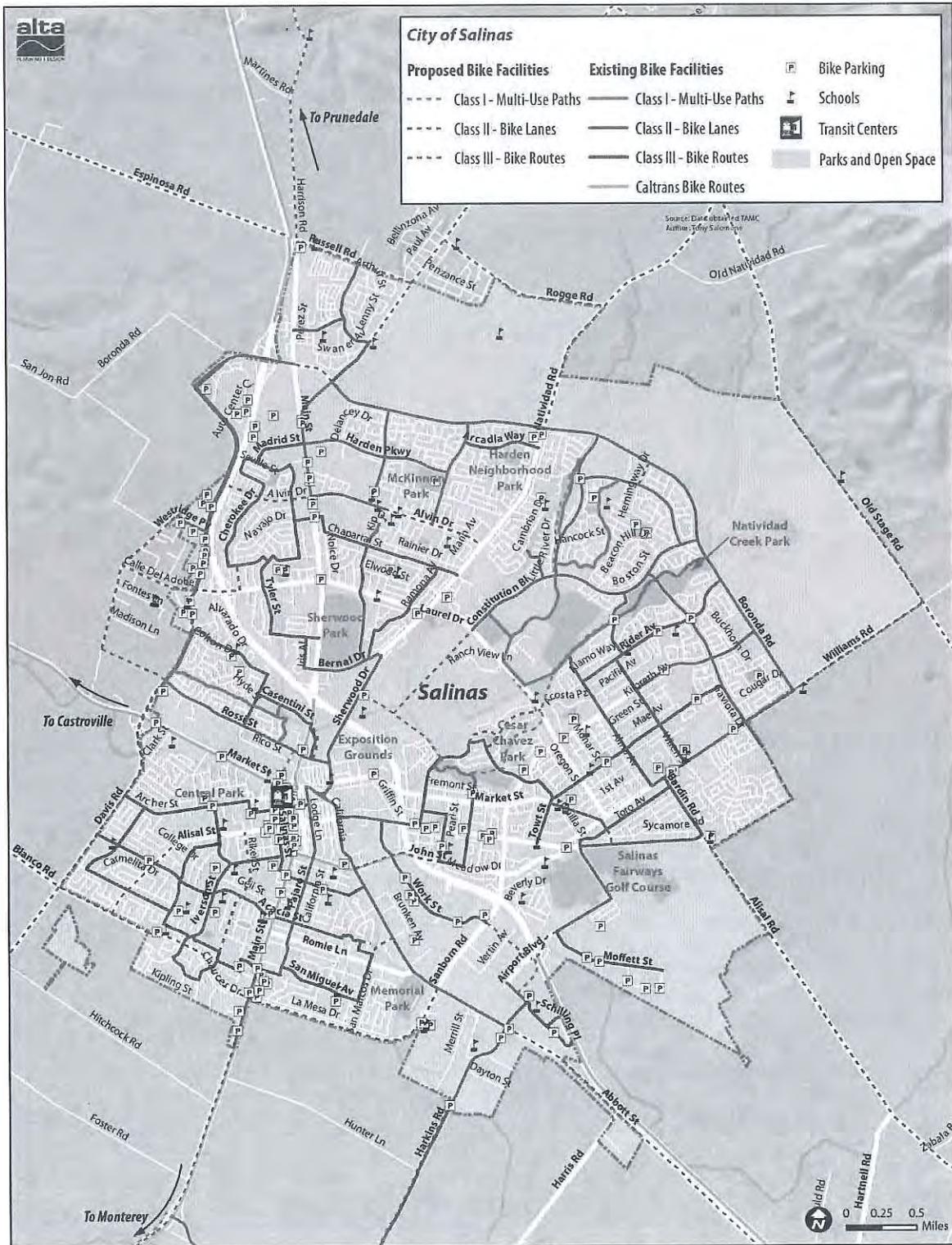
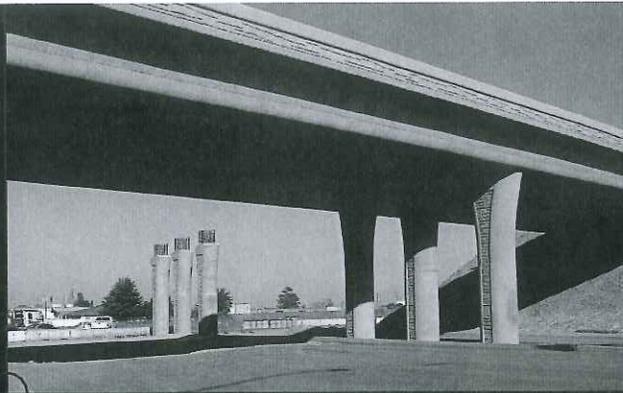


Figure 6-12: Salinas Bikeway Projects



# 2014

## MONTEREY COUNTY REGIONAL TRANSPORTATION PLAN

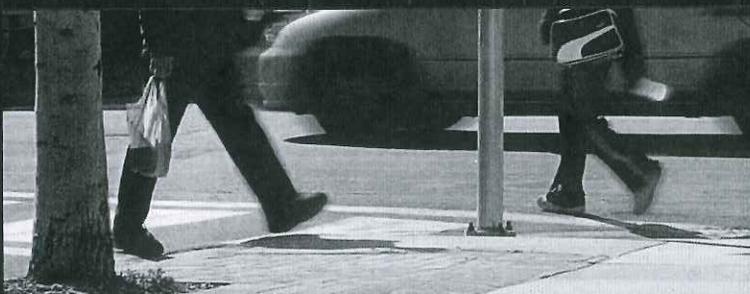


Figure 2-1: Regional Transportation Plan Goals, Policies and Performance Measures

Goals	Policy Objectives	Performance Measures
<b>Access &amp; Mobility</b>		
<p><i>Improve ability of Monterey County residents to meet most daily needs without having to drive.</i></p> <p><i>Improve the convenience and quality of trips, especially for walk, bike, transit, car/vanpool and freight trips.</i></p>	<ul style="list-style-type: none"> <li>• To improve safe, attractive and affordable access to work, school, goods and other key destinations by walking, bicycling and transit.</li> <li>• Improve travel time and travel time reliability for pedestrian and bicycle trips between key origins and destinations.</li> <li>• Improve travel time reliability and speed consistency for transit, car/vanpool and freight trips between key origins and destinations.</li> <li>• Improve the quality of walk, bicycle, car/vanpool and transit trips.</li> </ul>	<ul style="list-style-type: none"> <li>• Percentage of work trips that are 30 minutes or less by mode.</li> <li>• Average work trip travel time.</li> </ul>
<b>Safety &amp; Health</b>		
<p><i>Design, operate, and manage the transportation system to reduce serious injuries and fatalities, promote active living, and lessen exposure to pollution.</i></p>	<ul style="list-style-type: none"> <li>• To decrease fatalities and injuries for all travel modes. Pedestrian and bicyclist fatalities and injuries will not be higher than their proportion of total trips.</li> <li>• Improve health by increasing percentage of trips made by healthy transportation options (bicycle, pedestrian and transit trips).</li> <li>• Decrease the quantities of harmful airborne pollutants and congested vehicle miles traveled.</li> </ul>	<ul style="list-style-type: none"> <li>• Number of fatalities and injuries per capita.</li> <li>• Bicycle, pedestrian and transit mode share.</li> <li>• Congested vehicle miles of travel.</li> <li>• Harmful airborne pollutants (tons/day).</li> </ul>

Figure 2-1 (Cont.): Regional Transportation Plan Goals, Policies and Performance Measures

Goals	Policy Objectives	Performance Measures
<b>Environmental Stewardship</b>		
<p><i>Protect and enhance the County's built and natural environment. Act to reduce the transportation system's emission of greenhouse gases.</i></p>	<ul style="list-style-type: none"> <li>• Reduce greenhouse gas emissions consistent with regional targets.</li> <li>• Avoid or minimize impacts to local, state and federally defined sensitive areas.</li> <li>• Conserve farmland resources.</li> </ul>	<ul style="list-style-type: none"> <li>• Projected greenhouse gas emissions in 2020 and 2035.</li> <li>• Impacts to open space (acres).</li> <li>• Impacts to farmland conservation (acres).</li> </ul>
<b>Social Equity</b>		
<p><i>Reduce disparities in healthy, safe access to key destinations for transportation-disadvantaged populations. Demonstrate that planned investments do not adversely impact transportation-disadvantaged populations.</i></p>	<ul style="list-style-type: none"> <li>• Demonstrate that planned investments reduce or eliminate disparities in Access &amp; Mobility, Economic Benefit, and Safety &amp; Health objectives between transportation-disadvantaged and non-transportation disadvantaged populations.</li> <li>• Demonstrate that transportation-disadvantaged communities do not experience disproportionate impacts from transportation construction or operations.</li> </ul>	<ul style="list-style-type: none"> <li>• Distribution of investments.</li> <li>• Equitable transit access: Low income and minority populations within 1/2 mile of a high quality transit stop.</li> </ul>
<b>Economic Benefit</b>		
<p><i>Invest in transportation improvements – including operational improvements – that re-invest in the Monterey County economy, improve economic access and improve travel time reliability and speed consistency for high-value trips. Optimize cost-effectiveness of transportation investments.</i></p>	<ul style="list-style-type: none"> <li>• Improve regional accessibility for freight and reduce truck hours of delay.</li> <li>• Prioritize enhancement and maintenance of the existing transportation system. Maintain streets and roads in a condition rated good or higher according to the Pavement Management Index.</li> </ul>	<ul style="list-style-type: none"> <li>• Jobs near transit (percent).</li> <li>• Truck delay (hours).</li> <li>• Maintain the transportation system (percent of funding).</li> </ul>

part by the League of California Cities and California Association of Counties, has surveyed municipalities and evaluated the condition of facilities across the state since 2008 using a scoring system based on a 100 point scale. A score of 71-80 is considered to be good, and a range where best management practices can be employed. Between 2008 and 2012, the condition of Monterey County roadways deteriorated from a score of 63, which is considered at risk in the assessment, to a score of 50, which is on the cusp of failing.

This plan identifies a total of \$3.84 billion in costs needed to improve and maintain the system in a state of good repair, of which only 11.5% is assumed to be funded in the plan. As described in Chapter 3, even if all of the transportation funding forecasted for the plan were discretionary, these costs would consume most of the county's transportation funding capacity, and other important goals of the plan would not be met.

Costs included in the regional plan, however, do present an important opportunity to implement complete streets projects whenever improvements are proposed and funded, which can improve access for pedestrians, bicyclists and transit at a relatively low cost.



### **Complete Streets**

Complete Streets projects are an important component of the strategy to develop sustainable communities in Monterey County and to achieve greenhouse gas targets. California Assembly Bill 1358 requires that policies supporting the implementation of complete streets be incorporated into municipal general plans whenever those plans are updated. As part of the coordinated process to prepare the Sustainable Communities Strategy, the Transportation Agency completed a Complete Streets Needs Assessment of Monterey County to identify gaps in priority development areas where complete streets projects are needed to accommodate pedestrian, bicycle and transit access appropriate to the type of street and location. Projects identified for these locations are included in the Regional Transportation Plan as operations, maintenance and rehabilitation costs.

To facilitate the implementation of Complete Streets projects, the Agency also prepared a *Complete Streets Guidebook*, which contains resources that member jurisdictions can use to evaluate street projects to ensure that Complete Streets features are considered during planning and design. The Guidebook, and links to other online Complete Streets resources, is available on the Transportation Agency website.



### **Roundabouts**

Complementary to the complete streets policy approach described above, consideration and implementation of roundabouts at intersections is an important strategy for achieving the goals of the 2014 Monterey County Regional Transportation Plan. Roundabouts at intersections



Source: City of Marina, CA

allow for free movement of vehicles at intersections, which reduces vehicle emissions. Roundabout intersections are proven to be safer than signalized intersections given low design speeds, simplified turn movements and the reduced number of conflicts through intersections. Roundabouts also incorporate pedestrian and bicycle friendly accommodations that

Roundabouts are increasingly supported by state and federal policy and technical guidance. Specifically, Intersection Control Evaluation is a framework adopted by the Caltrans that includes consideration of roundabouts for intersection improvements. The Transportation Agency recommends that member jurisdictions utilize the Intersection Control Evaluation guidance available through Caltrans whenever considering intersection improvements.

## Active Transportation: Bicycle and Pedestrian Investments

Bike and pedestrian facilities are integral components of Monterey County's multi-modal transportation system. The region's mild climate and relatively flat topology make biking and walking a viable mode of travel for many living in the county. The close proximity between housing and jobs in the older communities of Monterey County also support the use of bicycles and walking as a transportation alternative, although key gaps in the network currently exist.



The Regional Transportation Plan includes policies for maximizing the transportation system to promote walking and bicycle travel, including development of bicycle and pedestrian facilities, safety programs and promotional events, improved access and safety provisions, and improved linkages to bikeways and recreational trail system.

### Bicycle Facilities

Monterey County's regional bikeways system, and the Agency's regional bicycle planning activities are described in more detail below.

### Bikeways and Planning in Monterey County – Existing Conditions

Monterey County has approximately 246 miles of maintained bikeways on state, county and local roads. Bikeways in the county are classified as Class I, II, and III. These classifications generally follow design standards established by Caltrans. Classifications are described as follows:

- **Class I: Bicycle Paths** are bikeways separated from vehicle traffic.
- **Class II: Bicycle Lanes** provide cyclists a marked area of the roadway that is part of the roadway also used by motor vehicles. Bicycle lanes have identification signage, pavement stencils, striping, and minimum width requirements.
- **Class III: Bicycle Routes** are recommended roadways that bicycles share with motor vehicles without a marked bike lane. Bicycle Route signs are placed periodically along the route and at changes of direction.

The majority of bikeways in Monterey County are Class II and III, however a large Class I facility exists along the Monterey Peninsula coastline. The Monterey Bay Coastal Trail extends from Lovers Point in Pacific Grove to Del Monte Boulevard, north of Marina, providing a scenic and highly traveled recreational opportunity as well as an important bicycle and pedestrian commuter link in the Monterey peninsula. It is anticipated that the Monterey Bay Coastal Trail

will become an important link in the proposed Monterey Bay Sanctuary Scenic Trail (described later in this chapter) and larger California Coastal Trail.

### Recreational Bicycling

Many of the bicycle and pedestrian facilities in Monterey County also serve recreational users. The need for recreational facilities in the area is also supported by the county's tourism economy. Cycling events held at Laguna Seca each year draw visitors to Monterey County seeking recreational opportunities, which contributes to the need for quality facilities.

### Intermodal Transportation Links

Bicycle riders may connect with other transportation modes if the proper facilities are available. These modes include transit, carpools, rail, and air transportation. Bike racks are now available on all MST buses. MST now carries more than 2,200 bikes on buses every month.

State and federal rail services are required to offer accommodations to store bicycles during short trips. Presently, interstate Amtrak service still requires bicycles to be boxed and stored in the baggage compartment; however, intercity and commuter trains within California do provide for unboxed bicycle storage. Amtrak stations are not equipped with secure bicycle locking facilities for either employees or passengers. Local jurisdictions may apply for funding for such facilities near or at the stations. Improvements to the area's rail system will also benefit bicycle usage, as future rail facilities will include bicycle storage to promote multi-modal travel.

### Policy Considerations for Bicycle Facility Design

The Transportation Agency has adopted two policies at the recommendation of its Bicycle and Pedestrian Facilities Advisory Committee to guide planning for bicycle facilities in Monterey County and direct input provided by the Agency on plans and designs developed by member jurisdictions. In order to facilitate regional travel by bicycle, TAMC encourages its member agencies to construct bicycle facilities on new roadways as follows:

- In coordination with regional and local bikeways plans;
- According to the specifications in Chapter 1000 of the Caltrans Highway Design Manual;
- With consideration of bicycle lanes (Class 2 facilities) on all new major arterials and on new collectors with an Average Daily Traffic (ADT) greater than 3,000, or with a speed limit in excess of 30 miles per hour;
- With special attention to safe design where bicycle paths intersect with streets; and



- With consideration of sharrows in plans and projects proposed by the Agency and member jurisdictions, consistent with the Monterey County Bicycle and Pedestrian Master Plan and the California Manual for Uniform Traffic Control Devices.

### Bicycle Programs

The Transportation Agency administers several programs to promote and facilitate bicycle travel in Monterey County, which include:

- **Monterey County Bikeways Map**: In 1997, TAMC published the first Monterey County Bikeways Map. The Agency completed the most recent update in 2008, illustrating bikeways, recommended routes, and bicycle facilities throughout Monterey County. The Agency expects to complete and distribute the next Bike Map in 2014.
- **Bicycle Service Request Form Program**: In 2001, the Agency initiated a Bicycle Service Request Form Program. Service request forms are available at bike shops and on-line to report roadway hazards to bicyclists. The Agency distributes these request forms to local public works departments for their response and action.
- **Bicycle Protection Program**: Between 2001 and 2012, the Agency received funding through the Monterey Bay Air Pollution Control District to help increase the number of bike racks and lockers in the county. Through the Bike Protection Program, the Agency provided bike racks and lockers in the locations most heavily used by bicyclists. A total of 185 bicycle racks and lockers and providing secured bicycle parking facilities for 506 bicycles distributed through the program. Public bicycle storage continues to be a pressing need in Monterey County. The Agency plans to pursue funding to reinstate the program.
- **Monterey County Bike Month**: Public education is important for increasing interest in, bicycling as a form of daily transportation. Up to 2012, the Transportation Agency planned and coordinated a Monterey County Bike Week public awareness campaign each May to coordinate with National Bike Month. The Agency plans to support future campaigns as a sponsor and work with its Bicycle and Pedestrian Facilities Advisory Committee to organize activities.

### Bicycle Sharing

In 2012, the Transportation Agency prepared a study that examined the feasibility of establishing a bicycle sharing program in Monterey County. The concept of bicycle sharing originated in Europe and has been gaining popularity in the United States. Bicycle sharing is a form of public transportation that allows riders to rent bicycles from automated docking stations and return the bicycles to any station in the network. Similar to car sharing, bicycle sharing systems are membership-based. Membership fees typically pay for the first half hour of use, at which point additional charges are assessed in half-hour intervals. The pricing structure of these systems therefore incentivizes short trips. Benefits of bike sharing systems identified in published research include traffic congestion and emissions reductions by providing an alternative to short automobile trips, increased public awareness and enthusiasm for bicycling, economic benefits around bike sharing stations, and possible public health benefits.



The *Bicycle Sharing Feasibility Study and Implementation Plan* identified a system of stations on the Monterey Peninsula and in Salinas that would form the basis of a viable program. The study identified strategies for partnering with local bicycle rental business to establish a program, as well as a concept of operations document to serve as a roadmap for implementing a system.

Monterey County has a relatively small population with unique conditions that pose challenges for establishing a bicycle sharing program. The County has a robust tourist economy and established local business serving the local visitor rental market; although the program is targeted toward residents and commuters for short trips, a bicycle sharing program was seen during the outreach process as a competitor for visitor business.

A Bay Area Bikeshare program deployed in the San Francisco Bay Area in 2013 and expansion is already planned. Interest in bicycle sharing may increase in Monterey County as the public becomes more familiar with that program. The *Bicycle Sharing Feasibility Study and Implementation Plan* is available as a resource for implementing a program in Monterey County in the future.

### Pedestrian Facilities

Walking is a viable, inexpensive, non-polluting, and healthy way to travel. Walking also serves as intermediary trips between other transportation modes, such as work-bus stop, shop-car, and school-bike trips. The Sustainable Communities Strategy calls for increased investment in improvements for pedestrian access as a means to encourage more walking trips.

As described above, pedestrian investments can be incorporated into local streets and roads projects as Complete Streets components. Pedestrian-specific enhancements can include sidewalks, intersection improvements incorporating bulb-outs and pavement treatments, as well as streetscape improvements that enhance the attractiveness and comfort of the pedestrian environment. The Complete Streets Needs Assessment identifies regionally significant gaps in the existing pedestrian circulation system. Improvements identified in Safe Routes to School Plans are included in lists of local projects upon which the Active Transportation group funding category is based.

