



City of Alameda

# TRANSPORTATION CHOICES PLAN:

*Transit and Transportation Demand Management*

FINAL REPORT

January 2018

**City of Alameda**  
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**TRANSPORTATION CHOICES PLAN:**  
**Transit and Transportation Demand Management**

**FINAL REPORT**  
**JANUARY 2018**

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*Photo source: CDM Smith*

# EXECUTIVE SUMMARY



# EXECUTIVE SUMMARY

## PREFACE

It is important to understand the purpose and the intent of this Transportation Choices Plan and how it is to be used to guide future transportation decisions in the City of Alameda. First, the Transportation Choices Plan is intended to provide a framework for implementing future transit and Travel Demand Management (TDM) projects and programs in the City. The plan includes:

1. Current goals and objectives to allow the City to measure its performance in providing effective travel choices and reducing single occupant vehicle trips.
2. Quantification of existing and expected future travel characteristics in terms of cross estuary trips and trips within Alameda.
3. Identification of potential projects and programs that, if implemented, would move the City towards the achievement of the performance goals. These projects and programs have been categorized by their expected performance and by the time frame in which they could reasonably be implemented.

Secondly, this plan is intended to be a living document, which means it will be adapted and modified over time to better address the ever-changing nature of transportation and land use development within the City and in the region as a whole. It is expected that:

- The Transportation Commission “shall monitor, via quarterly staff reports, implementation of approved transportation plans and policies,” which includes the Transportation Choices Plan, as required in its bylaws.
- There will be an ongoing performance monitoring program with annual reports to the City Council on how the City is doing in terms of meeting the goals and objectives of the plan.
- The list and ranking of projects will change as further information is developed for each project and as there are changes in the City’s priorities and the desires of the community. This includes removing projects from the Plan, particularly should information be obtained that show insufficient or no demonstrable benefit in addressing City goals or impracticality due to high cost/benefit ratio.

- The goals and objectives also may be modified once the ability of the City to meet the performance standards becomes clearer and external factors such as the economy and funding availability are better understood.

Finally, acceptance of this plan does not constitute approval of the projects and programs that are identified. Each project and program will need to undergo additional levels of review, public comment involving community members and key stakeholders such as Caltrans, Alameda County, AC Transit and the City of Oakland, environmental study, and design development before an actual decision is made to move forward.



## BACKGROUND AND PURPOSE

Transportation is fundamental to every aspect of Alameda's future: economic development, housing-jobs balance, quality of life, and its environmental footprint. As an island community, its connections to adjacent communities are uniquely limited and therefore, particularly sensitive. As an island community, access to Alameda is not just constrained by its existing bridges, tubes, and waterways, but by the challenges associated with expansion of current capacities or creation of new facilities. Access points to and from the main island and the Bay Farm Island peninsula are located only on the northern and eastern edges of the City, so many trips to and from Alameda require travel through the City, which also contributes to congestion. Alameda's unique geography immediately adjacent to Interstate-880, a major regional highway operating at or above capacity, further complicates vehicle access. Access to BART stations in Oakland, which provide access to jobs and amenities across the region, are relatively close, but require using the already congested crossings. Furthermore, ferry parking facilities are at capacity, and the ferry terminals also are located in the far extremes of Alameda.

Implementation of this plan will help reduce drive alone trips to and from Alameda, and within the City which, in turn will:

- Increase the number of people who bicycle, walk, carpool, and take the bus or ferry
- Reduce the total number of vehicles on roadways
- Reduce congestion and travel time
- Reduce parking demand
- Reduce environmental impacts from transportation
- Mitigate impacts of new growth
- Improve safety and accessibility

This plan will also help maintain and improve communitywide access for residents, employees and visitors in the following ways:

- Residents - commute trips, local trips, school trips
- Employees - commute trips into Alameda
- Visitors - primarily coming from outside the City for shopping, school or entertainment

## Planning Process

The City of Alameda has taken a comprehensive approach to this planning effort that has involved community stakeholders, including the business community and transportation agencies. The planning process began in January 2016 and will continue through completion of the Transportation Choices Final Plan, when it is reviewed by the Transportation Commission and Planning Board, and approved by the City Council.

## Community Engagement

The coordinated planning effort behind the City of Alameda Transportation Choices Plan includes a comprehensive community engagement process consisting of community workshops, organizational advisory group meetings, a public opinion survey, a webpage (<https://alamedaca.gov/transportation-choices-plan>), two web-based surveys, and Transportation Commission, Commission on Disability Issues, Planning Board, Mayor's Economic Development Advisory Panel and City Council meetings.

## Vision and Goals

The purpose of the City of Alameda Transportation Choices Plan is to help ensure that the City sustains its high quality of life during a time of anticipated population and employment growth. The City has identified goals and objectives that will help it achieve that outcome. The goals and objectives are derived from outreach efforts and conversations with City staff, commissions/boards, and the City Council.

### Vision

Sustain a high quality of life in Alameda by improving mobility for all over the next 15 years and beyond.



## Goals

The goals of this plan are devised to provide two overarching measures for decreasing drive alone trips and increasing walking, bicycling, transit, carpooling and other non-drive alone trips in the City of Alameda. One goal relates to estuary crossings to/from Alameda and the other relates to trips within the City.

- Goal 1 Estuary Crossings: Decrease drive alone trips at estuary crossings, especially in the peak period (Figure 1).
- Goal 2 Alameda Trips: Increase the share of walking, bicycling, bus, and carpooling trips within Alameda (Figure 2).

Baseline and future conditions were assessed to determine the percent increase in walking, bicycling, transit, and carpooling trips to meet the two goals.

Goal 1 is to decrease drive-alone trips across the estuary in the morning peak by increasing non-drive alone trips by twelve percentage points from 27 percent to 39 percent. This relates to an increase of 2,500 additional walking, bicycling, transit, and carpool morning peak-hour person trips at estuary crossings (in 2030) (see Figure 1).

Goal 2 is to increase the share of walking, bicycling, transit, and carpooling trips in Alameda by increasing non-drive alone trips by five percentage points from 37 percent to 42 percent. This relates to an increase of 3,300 walking, bicycling, transit, and carpool person trips in Alameda throughout the day (in 2030) (see Figure 2).

The priority strategies and list of projects and programs referred to in Chapters 3 and 4 are designed to meet the quantified goals.

Figure 1: AM Peak Hour Estuary Crossings Goal for Non-Drive Alone Trips

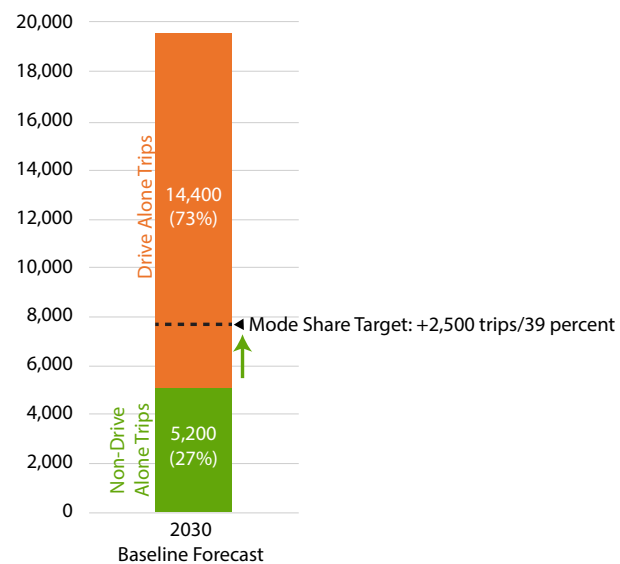
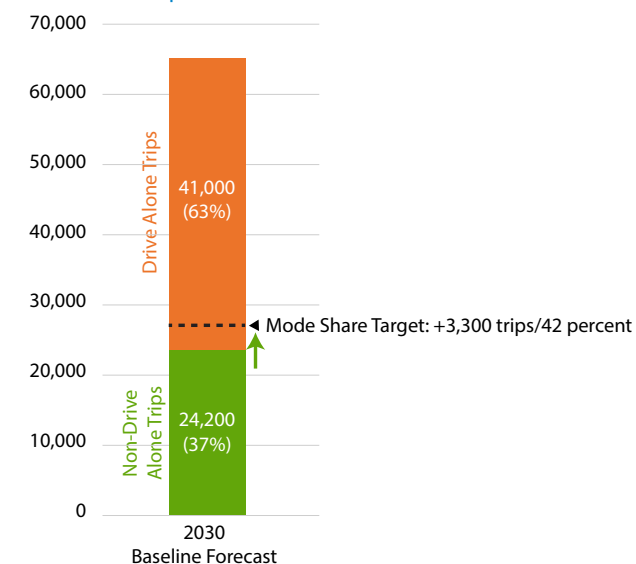


Figure 2: Weekday Daily Person Trips within Alameda Goal for Non-Drive Alone Trips





## EXISTING CONDITIONS

In terms of transportation, much has changed in Alameda over the past few years. Economic recovery has resulted in record traffic on Interstate-880. Job growth in the South Bay has resulted in increasing numbers of Alameda residents traveling south on Interstate-880. Younger commuters are opting for transportation options beyond traditional automobile purchases and recent changes in technology have made on-demand rideshare and carshare a popular option. This chapter describes existing transportation conditions as well as provides an overview of important factors that impact transportation conditions, such as housing, jobs, and travel behaviors.

The findings presented in this chapter describe the current conditions, and identify specific problems facing Alameda. More detail is provided in Chapter 2. In Chapter 3, priority strategies are presented that describe solutions to these problems and will help the City achieve its goals.

### Congestion Is Increasing

Delay from region wide congestion has increased 70 percent since 2010. This congestion has impacts on estuary crossings in Alameda with congestion on Park Street, the Webster/ Posey Tubes, as well as ridership increases on the ferries and transbay buses. Significant bottlenecks also form during morning and afternoon school drop-of and pick-up times, especially at local magnet and charter schools. While fluctuations in delay have occurred, the overall trajectory displays a steady increase in Bay Area delay over time. In 1998, the congested delay per worker was 1.7 minutes. In 2015, that number increased to 3.2 minutes.

### Housing and Jobs Are Growing

Alameda is experiencing moderate growth in housing and jobs, and is now back to pre-base closure housing levels. According to the 2015 Census, there are 76,733 residents living in 30,708 households. And as of 2014 there are 24,655 jobs in Alameda (LEHD, 2014). Over the next 10 years, approved and entitled developments in Alameda Point and the Northern Waterfront will account for 2,260 units (a 7 percent increase over 2015) and 7,909 jobs (a 30 percent increase over 2014).

## Commute Patterns Are Changing

Since 2010, there have been two notable trends in commute patterns in the Bay Area: One is that the percentage of auto commuters is declining and the other is that the percentage of transit commuters is increasing. This pattern reflects trends in Alameda with a drop in drive alone commuting between 2010 and 2015 from 64 percent to 60 percent and a related increase in transit use.

Another trend for Alameda is that there are more commuters leaving the island community for work, nearly 5,000 more compared to 2005. An increasing number of commuters head to San Francisco, South Bay and Peninsula each day. Over a nine-year period, Alameda residents commuting to Santa Mateo County increased from 1,613 in 2005 to 2,172 in 2014, to San Francisco the number increased from 4,667 to 7,189, and to Santa Clara County the number increased from 1,682 to 2,096. San Francisco and Oakland are the two highest destinations for Alameda residents commuting to work, but commute mode choice to these cities are very different. Only one out of every five Alamedans commuting to San Francisco drives alone. Nevertheless, for those commuting to Oakland, nearly four out of every five residents drive alone.

## Alameda is a Multimodal City

Alameda has many characteristics, existing policies and infrastructure that supports multimodal mobility. As of 2015, 40.1 percent of commuters travel by modes other than driving alone. These alternative modes to driving alone are described below.

**Transit:** The City of Alameda is served by multiple transit agencies and services, including five local bus routes, three transbay bus routes, three school routes, two ferry terminals providing service to Oakland and San Francisco, five nearby BART stations (within two miles of estuary crossings), a door-to-door paratransit service, a senior/paratransit fixed route shuttle, and three private shuttles connecting to BART. In the public opinion survey, web surveys and community workshops, suggested improvements to transit focused on three primary areas:

- Improving bus access to regional transit hubs, including ferry terminals and BART stations;



- Improving the frequency, speed and reliability of buses; and
- Providing more direct bus access to destinations within Alameda.

**Carpooling:** There are limited carpool programs in Alameda and residents looking to carpool are left on their own to find rides. Nevertheless, the City has recognized casual carpool pick-up locations used by residents to share rides into San Francisco. Carpool parking is not currently given preference at ferry terminals or other locations with limited parking.

**Walking:** Walking is a healthy and environmentally friendly means of getting to nearby destinations within Alameda and nearly all streets have sidewalks and most are separated from the street with a landscape strip with street trees, bike racks and other amenities. Issues related to walking are related to safe crossings, improving visibility, and calming traffic and speeding motorists. At estuary crossings into Oakland where pedestrian facilities are limited and intimidating to use, improvements are needed. This plan identifies streets where traffic calming and improvements to pedestrian amenities at sidewalks are needed.

**Bicycling:** Bicycling is a convenient option for people traveling within Alameda. A network of bikeways is provided throughout the City. Nevertheless, several gaps exist for bicycles. Also, speeding traffic can make bicycling feel unsafe on some streets. At estuary crossings into Oakland, where bicycle facilities are limited and intimidating to use, improvements are needed. This plan identifies the gaps in the network and makes suggestions on where to focus resources to better connect residents with key destinations, including shopping, jobs, and transit hubs.

### **TDM and Private Sector Participation**

The City requires new developments to mitigate their transportation impacts and increase transportation choices, which is referred to as transportation demand management (TDM). TDM strategies improve transportation efficiency by shifting drive alone trips to carpooling, walking, bicycling, and taking transit, among others. TDM requirements for new developments in Alameda have resulted in additional transit service, transit pass programs, a shuttle that connects to BART, and bicycle and pedestrian facilities at new developments.

The City has adopted several plans and policies governing transportation impacts over the past few years. The Transportation Element of the General Plan focused on policies for new residential and commercial development. The Transportation Element of the General Plan requires all new developments establish trip reduction goals as follows: 10 percent peak hour trip reduction for new residential developments and 30 percent peak hour trip reduction for new commercial development.

## PRIORITY STRATEGIES

Based on the findings in the Existing Conditions chapter, Alameda is expected to see more solo driving trips unless community members are provided with better transportation options and change their travel behavior. The Priority Strategies chapter focuses on what could be done to reduce the amount of expected drive alone trips at the estuary crossings and to increase the share of walking, bicycling and transit trips within Alameda in order to meet the City's goals. While long-term projects are discussed and explored, the plan focuses primarily on projects that can be implemented over the next 15 years, many of which are already underway.

The priority strategies (see Figure 3) include groups of projects focused on addressing specific issues impacting transportation, and are grouped by the goals of the plan.

Figure 3: Priority Strategies Overview



## EVALUATION

Projects and programs were evaluated based on their relative effectiveness related to mode shift, climate change, equity, safety, and cost. Each set of improvements is evaluated using the evaluation criteria to gauge if proposed improvements and strategies meet the goals and objectives.

- **Mode Shift:** Measure shift from drive alone to other modes
- **Climate Change:** Assess the impact on greenhouse gas emissions
- **Equity:** Assess the impact on ADA compliance, low income and minority populations
- **Safety:** Assess the impact on safety for all street users
- **Cost:** Assess planning-level operating and capital costs

The evaluation shows that targets to meet the goals can be met with implementation of the recommended strategies, including numerous projects and programs. Additionally, the projects and programs contribute to greenhouse gas reductions, provide an equitable distribution of improvements, and improve safety. Costs were also considered in the evaluation.

## Summary of Findings

Implementation of the strategies, including numerous projects and programs, would meet or exceed targets for the goals:

- **Goal 1 At Estuary Crossings:** An increase in non-drive alone person trips from 5,200 to 7,700 during the weekday AM peak hour, increasing non-drive alone mode share from 27 to 39 percent can be met by implementing the proposed strategy.
- **Goal 2 Within Alameda:** An increase in non-drive alone person trips from 24,200 to 27,500 during typical weekdays, increasing non-drive alone mode share to 37 to 42 percent can be met by implementing the proposed strategy.

The recommended improvements will also contribute to reductions in CO<sub>2</sub> emissions based on fewer drive alone trips and vehicle miles traveled (VMT) of those choosing to bicycle, walk, take transit, or carpool instead of driving alone.



- Annual reduction of between 5,900 and 14,000 metric tons of carbon dioxide, which represents 2.7 to 6.6 percent reduction from 2010 levels of carbon dioxide produced by transportation activities. The 2008 Climate Action Plan goal was to reduce the 2005 level of emissions by 25 percent by the year 2020. Fifty two percent of the total emissions come from transportation sources. With the implementation of the projects and programs in the Transportation Choices Plan, transportation emissions will be reduced incrementally throughout the life of the plan. By 2025, the Action Plan goal of a 25 percent reduction should be achieved.

As part of the evaluation process, proposed projects were analyzed for their potential impact on minority and low-income Alameda residents.

- 14 of 27 projects (52 percent) improve access for areas with higher concentrations of minority populations and/or concentrations of low-income populations.

Projects and programs were assessed to determine if they contribute to safety improvements for walking, bicycling, carpooling, or taking transit.

- 11 of 30 projects (37 percent) will include safety improvements and 100 percent of projects will adhere to best practices for safety in design standards.

## IMPLEMENTATION

With multiple lead agencies - the City, Caltrans, AC Transit, Water Emergency Transit Authority (WETA), Alameda CTC and the Transportation Management Associations (TMAs) - carrying out transportation improvements and effectively managing and monitoring transportation programs is a complex task that needs ongoing resources to address transportation issues and evaluate performance. Additionally, it takes dedicated staff resources to effectively implement projects from beginning to end, including planning, outreach, environmental review, design, and construction of transportation projects. This Plan is a "living document" that will evolve with future plans, funding and technologies, and will be reviewed to provide a progress report on the two-year benchmarks that are listed for each project as well as at an annual transportation workshop as part of a City Council meeting. Quarterly progress reports on the Transportation Choices Plan will be provided to the

Transportation Commission as part of the ongoing quarterly reports on all transportation-related plans and projects. Before implementation, all projects will go through a subsequent community outreach process, which could shift the projects as described in the Transportation Choices Plan. A better solution than the ones listed in the Plan could be discovered after more detailed project-level analysis, which would require staff to have a mid-course correction, including the potential removal of a project, and proceed with what best suits the community.

## Funding Programs

While some of the projects and programs in this plan are funded, the majority of them are not funded and in order for these unfunded projects to be implemented the dollars needed will have to be obtained by the City and its partners. There are a variety of funding programs for different types of projects, including operating, maintenance, or capital projects. Funding programs were sourced from Alameda CTC modal plans and MTC's Plan Bay Area, both of which provide an extensive list of programs. In order to qualify for funding, the City must provide the funding agencies with detailed applications and requests. The information in this plan document and the supporting technical studies can be used to support those funding requests, as appropriate. Also, the input received from the funding agencies on the viability of the projects for which funding is requested can help inform and update the priorities and time frames identified in this plan.

## Projects and Programs

Projects and programs were identified to support the priority strategies by increasing transportation choices and reducing drive alone trips.

Completion time frames and priority projects were identified to provide City staff with direction on which projects to focus on moving forward. Three time frames for completion are identified:

- Near-Term Completion: 1 to 3 Years
- Mid-Term Completion: 3 to 8 Years
- Long-Term Completion: 8 + Years

Each near-term and mid-term project was identified as either High Priority or Medium Priority (long-term projects will need further analysis for an assessment of priority). Projects with

higher than average scores were considered High Priority and projects with lower than average scores were identified as Medium Priority.

A summary of projects and programs is presented in Table 1, and includes a description of the time frame for completion and priority. The projects and programs are organized by completion time-frame and priority and presented in alphabetical order.

Table 1: Summary of Projects and Programs

Projects and Programs		Priority
<b>Near-Term Completion (1 - 3 years)</b>		
1	Alameda Shuttle Exploration	High
2	Bicycle Master Plan and Design Guidelines Update and Vision Zero Safety Policy/Plan	High
3	Bus Stop Improvements	High
4	EasyPass Expansion	High
5	Harbor Bay Ferry Terminal Access and Parking Management Improvement	High
6	Main Street Ferry Terminal Access and Parking Management Improvements	High
7	Parking Management	High
8	Parking Policies for New Development	High
9	Pedestrian Master Plan and Design Guidelines Update and Vision Zero Safety Policy/Plan	High
10	Transit Signal Priority	High
11	Transportation Awareness Campaign	High
12	Transportation Partnerships with Existing Businesses and Residences	High
13	Bike Share	Medium
14	Casual Carpool Additional Pickup Locations	Medium
15	Constitution Way Carpool Lane	Medium
16	Estuary Water Shuttle Crossing and WETA Ferries to Oakland	Medium
17	Westline Drive Bus Lane	Medium
18	Shared Ride Service for Seniors and People with Disabilities	Medium

Projects and Programs		Priority
<b>Mid-Term Completion (3 - 8 years)</b>		
19	Alameda Point Bus Rapid Transit Service	High
20	Bicycle and Pedestrian Corridor Improvements	High
21	Citywide Safe Routes to School Audits and Improvements	High
22	Crosstown Express Bus Service	High
23	Increase Frequency and Span of Service for Ferry Service	High
24	Increase Frequency and Span of Service for Local Bus Routes	High
25	Increase Frequency and Span of Service for Transbay Bus Service	High
26	Miller-Sweeney Multimodal Lifeline Bridge	High
27	New Seaplane Lagoon Ferry Terminal & Service	High
28	Regional Transit Hub Connector Bus Service	High
29	TDM Ordinance Update	High
30	Vision Zero Safety Improvements and Traffic Calming	High
31	Bikes in Buses through Webster/Posey Tubes	Medium
32	Citywide Transportation Management Association	Medium
33	Faster Line 51A Bus Service	Medium
34	New Technologies and Innovations	Medium
<b>Long-Term Completion (8+ years)</b>		
35	BART to Alameda	n/a
36	Comprehensive Congestion Management, (Citywide EasyPass Expansion, Increase Frequency to 15-minute Maximum for Local Bus Routes, Congestion Pricing)	n/a
37	New Transit/Bike/Pedestrian Lifeline Tube	n/a
38	Webster/Posey Multimodal Lifeline Tubes	n/a
39	West End Bicycle/Pedestrian Crossing	n/a



# CHAPTER 1



*Photo source: AC Transit*

## INTRODUCTION AND GOALS



# CHAPTER 1: INTRODUCTION AND GOALS

## PREFACE

It is important to understand the purpose and the intent of this Transportation Choices Plan and how it is to be used to guide future transportation decisions in the City of Alameda. First, the Transportation Choices Plan is intended to provide a framework for implementing future transit and Travel Demand Management (TDM) projects and programs in the City. The plan includes:

1. Current goals and objectives to allow the City to measure its performance in providing effective travel choices and reducing single occupant vehicle trips.
2. Quantification of existing and expected future travel characteristics in terms of cross estuary trips and trips within Alameda.
3. Identification of potential projects and programs that, if implemented, would move the City towards the achievement of the performance goals. These projects and programs have been categorized by their expected performance and by the time frame in which they could reasonably be implemented.

Secondly, this plan is intended to be a living document, which means it will be adapted and modified over time to better address the ever-changing nature of transportation and land use development within the City and in the region as a whole. It is expected that:

- The Transportation Commission “shall monitor, via quarterly staff reports, implementation of approved transportation plans and policies,” which includes the Transportation Choices Plan, as required in its bylaws.
- There will be an ongoing performance monitoring program with annual reports to the City Council on how the City is doing in terms of meeting the goals and objectives of the plan.
- The list and ranking of projects will change as further information is developed for each project and as there are changes in the City’s priorities and the desires of the community. This includes removing projects from the Plan, particularly should information be obtained that show insufficient or no demonstrable benefit in addressing City goals or impracticality due to high cost/benefit ratio.

- The goals and objectives also may be modified once the ability of the City to meet the performance standards becomes clearer and external factors such as the economy and funding availability are better understood.

Finally, acceptance of this plan does not constitute approval of the projects and programs that are identified. Each project and program will need to undergo additional levels of review, public comment involving community members and key stakeholders such as Caltrans, Alameda County, AC Transit and the City of Oakland, environmental study, and design development before an actual decision is made to move forward.

## BACKGROUND AND PURPOSE


































Transportation is fundamental to every aspect of Alameda's future: economic development, housing-jobs balance, quality of life, and its environmental footprint. As an island community, its connections to adjacent communities are uniquely limited and therefore, particularly sensitive. As an island community, access to Alameda is not just constrained by its existing bridges, tubes, and waterways, but by the challenges associated with expansion of current capacities or creation of new facilities. Access points to and from the main island and the Bay Farm Island peninsula are located only on the northern and eastern edges of the city, so many trips to and from Alameda require travel through the City, which also contributes to congestion. Alameda's unique geography immediately adjacent to Interstate-880, a major regional highway operating at or above capacity, further complicates vehicle access. Access to BART stations in Oakland, which provide access to jobs and amenities across the region, are relatively close, but require using the already congested crossings. Furthermore, ferry parking facilities are at capacity, and the ferry terminals also are located in the far extremes of Alameda.

A central planning theme is to grow more sustainably, to keep pace with demand for housing and commercial development and with the needs of Alameda's current community members, while reducing drive alone trips at the estuary crossings and within Alameda. Drive alone trips are the least efficient way to travel causing increased congestion, greenhouse gas emissions, travel time delays and parking shortages. For example, a full bus can fit up to 45 bus passengers and takes up the same space on the road as 2 automobiles averaging 2 to 5 people (see Figure 4). Other examples of more efficient ways of traveling include people carpooling, taking ferries, walking, bicycling, or taking ride-hailing services that provide shared rides, such as Scoop or LyftLine or UberPOOL.

The benefits of reducing drive alone trips to, from and within the City include:

- Increased number of community members who can travel on constrained street infrastructure
- Reduced congestion
- Reduced demand for parking

Figure 4: Number of Vehicles Needed to Carry 45 Passengers

Number of vehicles needed to carry 45 people	
Bus	
Vanpool	     
3-Person Carpool	       
2-Person Carpool	       
Single Occupant Automobile	         

## WHAT WILL THIS PLAN ACCOMPLISH?

Reduce drive alone trips to and from Alameda, and within the city which, in turn will:

- Increase the number of people who bicycle, walk, carpool, and take the bus or ferry
- Reduce the total number of vehicles on roadways
- Reduce congestion and travel time
- Reduce parking demand
- Reduce environmental impacts from transportation
- Mitigate impacts of new growth
- Improve safety and accessibility

Maintain and improve community-wide access for residents, employees and visitors:

- Residents - commute trips, local trips, school trips
- Employees - commute trips into Alameda
- Visitors - primarily coming from outside the city for shopping, school or entertainment

- Reduced environmental impacts such as reduced carbon footprint and improved air quality
- Improved travel times and reliability for 'internal' Alameda trips and for trips at the estuary crossings

*City of Alameda Transportation Choices Plan* focuses on creating more transportation options for Alamedans beyond solo driving. Chapter 2 of this plan describes the existing transportation options and how Alameda residents and visitors make their trips. Chapter 3 describes the priority strategies for improving transportation choices, and evaluates their ability to meet the drive alone reduction goals and the key objectives of equity, safety, and reductions of greenhouse gas emissions, among others. Chapter 4 describes implementation of the projects, programs, and actions to ensure high quality results and timely delivery.

## POLICY FRAMEWORK

The Transportation Choices Plan draws on a variety of policies that directed the plan recommendations. The City of Alameda's General Plan Transportation Element (adopted in 2009) provides targeted objectives and policies that seek to enhance the use of alternative modes of transportation, assist the development of an intermodal transportation system and reduce the overall drive alone mode share in Alameda. The four key goals are as follows:

- **Circulation Goal:** Plan, develop and maintain a safe, barrier-free and efficient transportation system to provide the community with adequate present and future mobility.
- **Livability Goal:** Balance the mobility needs of the community with the overall community objective of creating a livable human and natural environment. Coordinate the interaction of transportation systems development with land use planning activities.
- **Transportation Choices Goal:** Encourage the use of transportation modes, especially at peak-period, other than the single-occupant automobile in such a way as to allow all modes to be mutually supportive and to function together as one transportation system.
- **Implementation Goal:** Implement and maintain the planned transportation system in a coordinated and cost-effective manner.

The City of Alameda and its partner transportation agencies have prepared documents that support these General Plan goals and were used to guide the recommendations in the Transportation Choices Plan. These existing documents include:

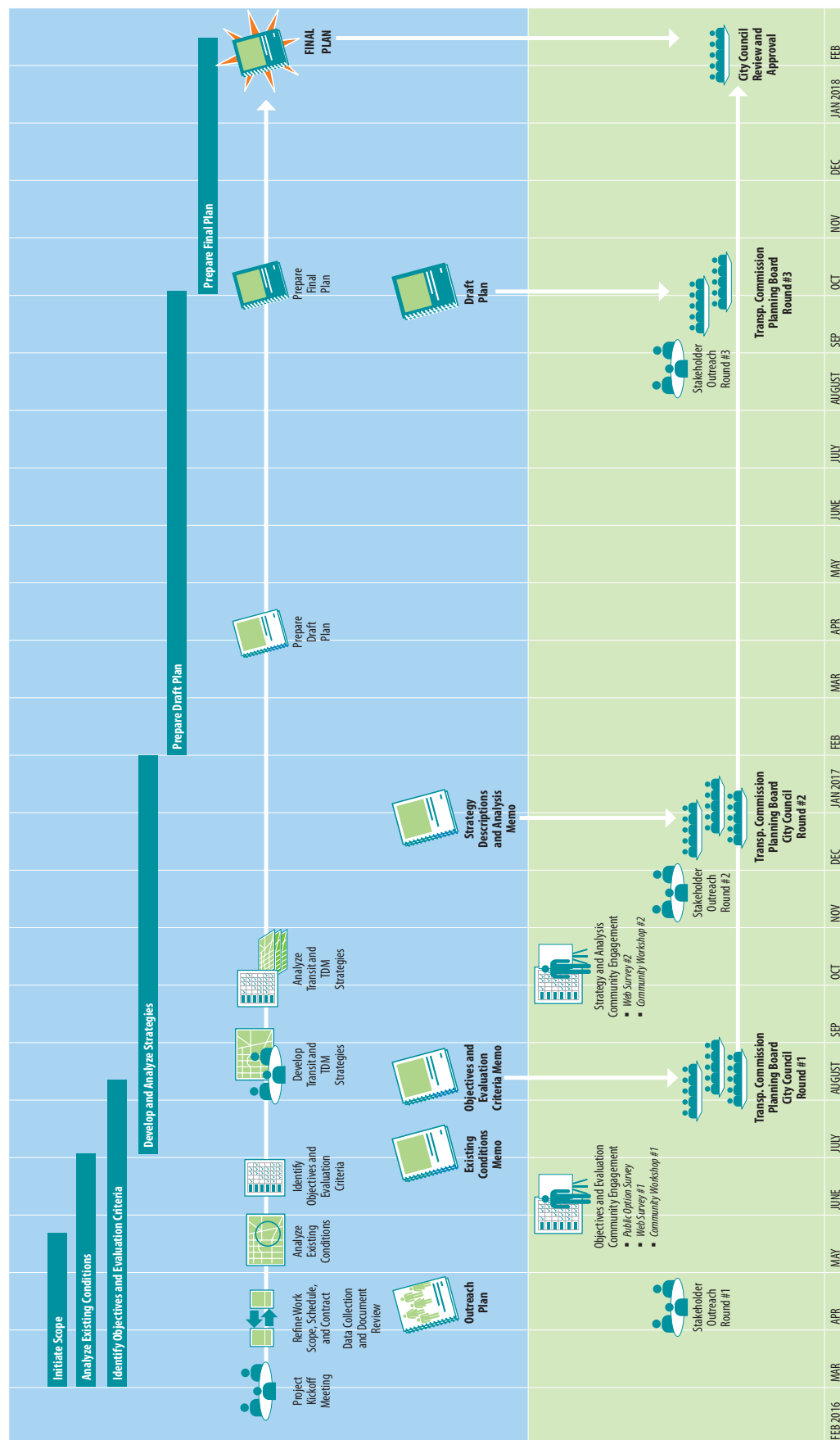
- AC Transit Major Corridor Study (2016)
- AC Transit Service Expansion Plan (SEP) (2016)
- Alameda County Transportation Commission (Alameda CTC) Countywide Transit Plan (2016), Countywide Multimodal Arterial Plan (2016), Countywide Bicycle and Pedestrian Plan (2012)
- Alameda Landing Transportation Demand Management (TDM) Program (2007)
- Alameda Point TDM Plan (2014)
- City of Alameda Bicycle Master Plan (2010)
- City of Alameda Estuary Crossing Study (2009)
- City of Alameda Parking Study (2014)
- City of Alameda Pedestrian Plan (2009)
- City of Alameda Regional Transit Access Study (2013)
- City of Alameda Transit Plan (2001)
- City of Alameda Draft Transportation Systems Management/TDM Plan (2012)
- City of Alameda Water Shuttle Feasibility Study (2013)
- Water Emergency Transportation Authority (WETA) System Expansion Policy, Short-Range Transit Plan (2016), and Strategic Plan (2016)

The City is a key stakeholder on the following ongoing transportation projects, and works to ensure that the City's priorities are carried forward in the below partner agency efforts:

- AC Transit Multimodal Corridor Guidelines
- AC Transit Transbay Tomorrow Study
- Alameda CTC Freeway Access Study (formerly the Broadway/Jackson Study) to address improved freeway access between west Alameda and the freeways
- City of Oakland Downtown Oakland Circulation Study
- Metropolitan Transportation Commission (MTC) Core Capacity Transit Study
- WETA Ferry Access Plans



Figure 5: City of Alameda Transportation Choices Plan Planning Process



## PLANNING PROCESS

The City of Alameda has taken a comprehensive approach to this planning effort that has involved community stakeholders, including the business community and transportation agencies. The planning process (see Figure 5) began in January 2016 and will continue through completion of the Transportation Choices Final Plan, when it is approved by the Transportation Commission, Commission on Disability Issues, Planning Board, and the City Council. The following key City Council actions have occurred during the planning process for this effort:

- On January 21, 2015, the City Council directed staff to begin efforts to conduct a holistic approach to transportation citywide.
- On April 1, 2015 and September 15, 2015, the City Council directed staff to move forward with a refined approach and a request for proposal for the citywide transportation planning effort.
- On January 19, 2016, the City Council approved the CDM Smith consulting team, which began this planning effort with data collection/review, existing conditions, goals/objectives and the first round of outreach.
- On September 6, 2016, the City Council reviewed the existing conditions, goals and objectives, and were briefed on the initial stages of the consulting team's effort to prepare draft strategies, projects and actions and the second round of outreach.
- On January 17, 2017, the City Council reviewed the draft strategies, projects and actions.
- Winter 2017-2018, the City Council was asked to approve the Draft Transportation Choices Plan.

## COMMUNITY ENGAGEMENT

The coordinated planning effort behind the City of Alameda Transportation Choices Plan includes a comprehensive community engagement process consisting of community workshops, organizational advisory group meetings, a public opinion survey, a webpage (<https://alamedaca.gov/transportation-choices-plan>), two web-based surveys, and Transportation Commission, Commission on Disability Issues, Planning Board, Mayor's Economic Development Advisory Panel and City Council meetings.

The following organizations were included in the planning process:

- Transit/Transportation Agencies
  - AC Transit
  - BART
  - Caltrans
  - WETA
- Developers / Transportation Management Associations (TMA) / Major Employers
  - Alameda Hospital
  - Alameda Landing - Catellus
  - Alameda Point Partners
  - College of Alameda
  - Harbor Bay Business Park Association
  - Marina Village - Brookfield Property Partners
  - Northern Waterfront developments
  - South Shore Center
  - West Alameda TMA
  - Wind River Systems
- Community Stakeholders
  - Alameda Housing Authority
  - Alameda Point Collaborative
  - Alameda Transit Advocates
  - Alameda Unified School District
  - ACLC Charter School
  - Academy Charter School
  - Bike East Bay
  - Bike Walk Alameda
  - Chamber of Commerce
  - Commission on Disability Issues
  - Community Action for a Sustainable Alameda
  - Downtown Alameda Business Association
  - Greater Alameda Business Association
  - Jean Sweeney Open Space Park Fund
  - Mastick Senior Center
  - Homeowner Associations
  - SPUR
  - West Alameda Business Association



## Organizational Advisory Meetings

Organizational advisory meetings were held to present preliminary findings at each stage of the planning process. The City and consultant team used the input received from key agency and community stakeholders to refine the draft materials for subsequent community workshops. Organizational advisory meetings were held on the following dates:

- Wednesday, April 20, 2016
- Thursday, October 13, 2016

## Community Workshops

Members of the consultant team presented local economic and transportation trends, key concepts and supporting data, best practices and technologies guiding the planning effort, and their recommended strategies to address the issues faced by Alameda. Following each presentation, the participants discussed the materials in small groups facilitated by City staff or consultant team members. The small groups discussed the issues, reviewed recommendations made by the consultant team, and ranked the different strategies presented.

Community workshops were held on the following dates:

- Thursday, May 5, 2016
- Wednesday, October 19, 2016

## Public Opinion and Web Surveys

An extensive outreach effort was initiated beyond the advisory meetings and community workshops. A statistically valid, public opinion survey was conducted between August and September 2016 to gather information on Alameda residents travel behaviors, their attitudes, and to provide insight on some potential projects. Five hundred interviews were conducted over the telephone with access to both landlines and cell phone numbers in English, Spanish, and Cantonese. The margin of error for the public opinion survey is +/-4.3 percent. Two different web-surveys were administered between June 2016 and August 2016 and between September 2016 and November 2016. The first web-survey garnered 246 responses and although it was not statistically valid, it helped provide City staff and consultants with more public input on existing transportation issues and potential strategies. The second web survey with 309 responses asked many of the same questions as the public opinion survey, and ultimately helped confirm the results of the public opinion survey.

## VISION, GOALS, AND OBJECTIVES

The purpose of the City of Alameda Transportation Choices Plan is to help ensure that the city sustains its high quality of life during a time of anticipated population and employment growth. The City has identified goals and objectives that will help it achieve that outcome. The goals and objectives are derived from outreach efforts and conversations with City staff, commissions/boards, and the City Council.

### Vision

Sustain a high quality of life in Alameda by improving mobility for all over the next 15 years and beyond.

### Goals

The goals of this plan are devised to provide two overarching measures for decreasing drive alone trips and increasing walking, bicycling, transit, carpooling and other non-drive alone trips in the city of Alameda. One goal relates to estuary crossings to/from Alameda and the other relates to trips within the City.

- **Goal 1 Estuary Crossings:** Decrease drive alone trips at estuary crossings, especially in the peak period. Increase non-drive alone person trips across the estuary in the morning peak by twelve percentage points from 27 percent to 39 percent.
- **Goal 2 Alameda Trips:** Increase the share of walking, bicycling, transit, and carpooling trips within Alameda. Increase non-drive alone person trips within Alameda by five percentage points from 37 percent to 42 percent.

#### Goal 1

Estuary crossings are all person trips leaving Alameda including those by automobile, bus, ferry, biking or walking. This goal states there is to be a decrease in drive alone trips at island crossings, especially in the peak period. When this goal was originally conceived it was assumed that the baseline would be year 2015 conditions, the year when the data for this plan was collected. However, the Planning Board recommended setting a higher goal and this was confirmed by the Transportation Commission and the City Council. A new "stretch goal," which represented the high-end of the forecast performance for the projects and programs in the plan, was recommended. This revised goal represents year 2010 conditions which was before the current economic



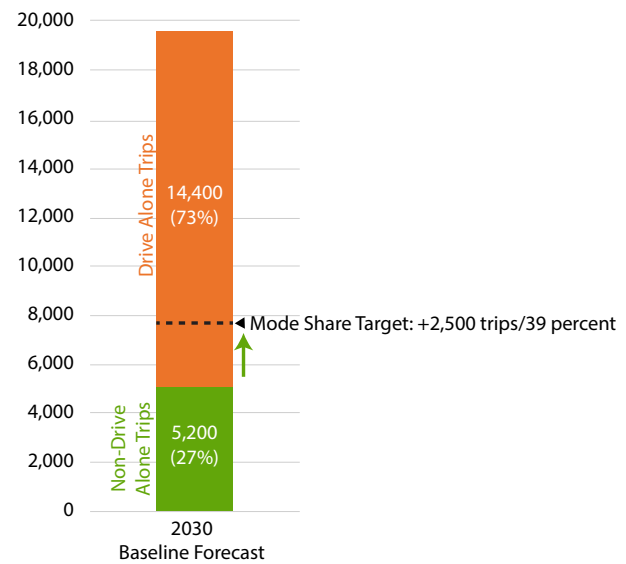
boom and related congestion growth. Baseline and future 2030 conditions were analyzed to determine AM peak hour and daily mode shift targets to meet this goal. The data show that an increase of 2,500 walking, bicycling, transit, and carpool morning peak hour person trips at estuary crossings is necessary to meet the goal in 2030. This relates to a mode shift of twelve percentage points from 27 percent to 39 percent (see Table 2 and Figure 6).

Table 2: AM Peak Hour Estuary Crossings

Mode	AM Peak Hour Person Trips		
	2015 Baseline Conditions	2030 Future Baseline Conditions [5]	2030 Future Conditions with No New Drive Alone Estuary Crossing Trips [6]
Drive Alone [1]	12,700	14,400	11,900
Non-Drive Alone (Carpool, Bike, Walk, Transit) [2][3][4]	4,700	5,200	7,700
Total Estuary Crossing Trips	17,400	19,600	19,600
<b>Non-Drive Alone Mode Share</b>	<b>27%</b>	<b>27%</b>	<b>39%</b>

Notes: [1] Webster Posey tube data uses 2015/2016 average daily traffic data collected by City of Alameda Public Works. Park Street Bridge, Miller-Sweeney Bridge, High Street Bridge, and Bay Farm Island Bridge use 2011 and 2017 counts to determine 2015 baseline conditions. Data was confirmed with 2015 StreetLight Insight data. Future trips confirmed by Alameda Point EIR Forecasts. [2] Existing carpool trips assigned based on percentage of carpool commute trips from the U.S. Census American Community Survey (2015) and the Census Transportation Planning Products (2010). [3] Estimated 1.5% of trips are walk/bike based on Census Transportation Planning Products and data from the Public Opinion Survey. [4] Transit trips estimated based on boardings and alightings data from AC Transit and WETA San Francisco Bay Ferry. [5] Future conditions is based on ABAG projected growth in 2040 and adjusted to 2030 (this relates to 4,440 new households and 7,760 jobs). Growth in number of estuary crossing trips assumes the same number of trips per household and jobs that exists today. [6] Figures calculated by retaining 2015 drive alone trips and proportionally reallocating trips to other modes. These represent the high-end of the forecast potential drive alone trip reductions as explained in Chapter 3.

Figure 6: AM Peak Hour Estuary Crossings Goal for Non-Drive Alone Trips





## Goal 2

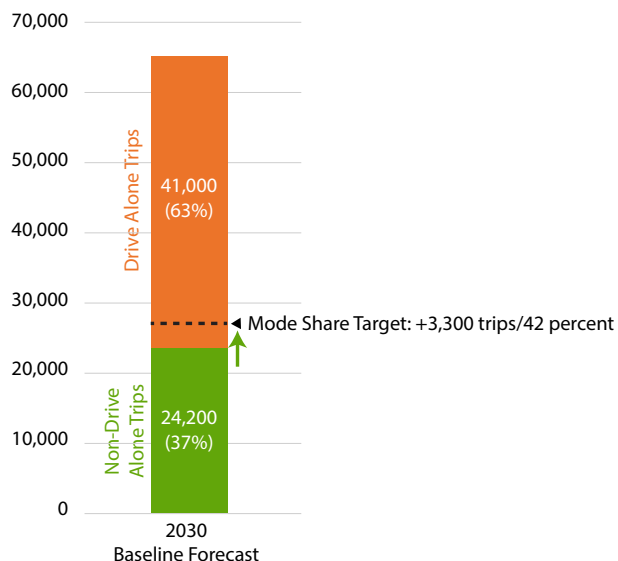
Goal #2 states there is to be an increase in walking, bicycling, bus and carpool trips within Alameda. The data show that an increase of 3,300 walking, bicycling, transit, and carpool morning average daily person trips within Alameda is necessary to meet goal in 2030. This relates to a mode shift of five percentage points from 37 percent to 42 percent (see Table 3 and Figure 7). The baseline year for this analysis is 2015.

Table 3: Weekday Daily Person Trips within Alameda

Weekday Daily Person Trips			
Mode	2015 Baseline Conditions	2030 Future Baseline Conditions [5]	2030 Future Conditions with No New Drive Alone Estuary Crossing Trips [6]
Drive Alone [1]	36,100	41,000	37,700
Non-Drive Alone (Carpool, Bike, Walk, Transit) [2][3][4]	21,310	24,200	27,500
Total Trips within Alameda	57,410	65,200	65,200
<b>Non-Drive Alone Mode Share</b>	<b>37%</b>	<b>37%</b>	<b>42%</b>

Notes: [1] Daily trips based on StreetLight InSight data. [2] Existing carpool trips assigned based on National Household Travel Survey average weekday persons per vehicle (2009). [3] Estimated 18% of trips are walk/bike based on Census Transportation Planning Products. [4] Transit trips estimated based on boardings and alightings data from AC Transit. [5] Future conditions estimate is based on ABAG projected growth in 2040 and adjusted to 2030 (this relates to 4,440 new households and 7,760 jobs). This growth assumed the same number of trips within Alameda per household and jobs that exists today.

Figure 7: Weekday Daily Person Trips within Alameda Goal for Non-Drive Alone Trips



## Objectives

The objectives were developed to define specific outcomes and guiding principles that relate to the goals. Some of the objectives relate directly to the evaluation criteria.

- **Access:** Improve access to transportation facilities including BART stations, ferry terminals and bus stops.
- **Climate Change:** Provide programs and strategies that reduce greenhouse gas emissions.
- **Equity:** Ensure transportation improvements are applied equitably for all users including seniors, low income, people with disabilities and minorities, and are compliant with the Americans with Disabilities Act (ADA) requirements and guidelines. In general, improved transportation options created by this plan will make it possible to reduce car ownership and driving, which is the most costly form of transportation; therefore, improving transportation equity.
- **Land Use:** Integrate land use changes and transportation improvements.
- **Parking:** Use parking management strategies to reduce incentives to driving.
- **Partnerships:** Maintain positive partnerships with transit operators, adjacent jurisdictions, the private sector and other key stakeholders to leverage monies and expertise.
- **Prioritize:** Elevate the priority of transit, bicycling, walking, carsharing and ridesharing, especially for youth and for first-mile/last-mile transportation choices.
- **Public Awareness:** Increase public, employee/employer and residential association awareness of transportation options.
- **Safety:** Emphasize safety in the planning, design and implementation of all transportation improvements.
- **Transit Frequency/Reliability:** Improve transit frequency, reliability and times, especially in the peak period.