



In collaboration with

CDM Smith

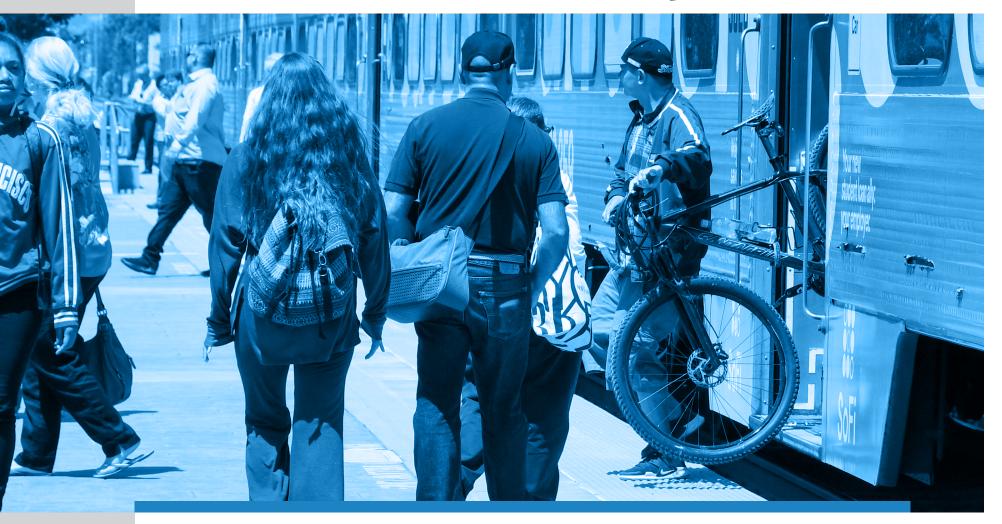
Bottomley Design & Planning

Wendy Silvani Consulting

This Executive Summary presents highlights of the Citywide Transportation Plan, known as RWCmoves, and focuses on the framework that the City will use to prioritize transportation projects and programs in Redwood City.



What is RWCmoves & Why Did We Do It?



Redwood City's General Plan, adopted in 2010, outlines a bold vision for transportation in Redwood City.

In the years following adoption of the General Plan, the City has undergone substantial change. Local and regional development growth and increases in population have worsened congestion and increasingly have affected neighborhoods. Caltrain ridership in Redwood City has

nearly doubled in the last 5 years. Bicycle travel in the City is also at an all-time high. In response to this, in late 2016, Redwood City began development of its first-ever Citywide Transportation Plan.

The purpose of RWCmoves is to establish a new vision and serve as a guiding document to improve transportation in Redwood City.
RWCmoves builds on the foundation of the General Plan and takes the next steps of

prioritizing individual transportation projects and programs to meet the City's mobility goals. To this end, the Plan proposes the following vision:

Promote the best travel experience possible for everyone in Redwood City by creating and maintaining a safe, multimodal, and accessible transportation network.



GOAL 1

Eliminate traffic fatalities and severe injuries for all modes by 2030



GOAL 2

Create a walking and bicyclingfriendly community that provides a safe, balanced, and convenient transportation system



GOAL 3

Provide seamless connections and improve street access to all areas within the City, but especially along mixed-use corridors designated in the General Plan and Citywide Transportation Plan



GOAL 4

Embrace innovation in all forms of emerging technologies, especially in ways to creatively manage congestion and the transportation system



GOAL 5

Reach over 50% of all trips being by non-driving modes by 2040; remaining automobile trips should be zero emission trips



GOAL 6

Invest in projects that support a resilient, equitable and sustainable transportation system



Transportation Today



Understanding Today's Transportation System

Since the start of the project, the project team worked with the community to develop an understanding of today's transportation system by gathering data and community input to identify the City's transportation opportunities, challenges and needs.

Data was collected from a variety of sources to establish existing conditions for all forms of transportation. Data was collected on:

- · How workers and residents get around
- Collision trends
- Locations with high levels of traffic congestion
- Locations where vehicle speeds are changing
- Parking needs and supply
- Bicycle, pedestrian, and transit routes
- Other on-going transportation efforts
- Transportation programs from cities similar to RWC

PLAN PROCESS

April 2017

Existing Conditions

0

COMMUNITY ENGAGEMENT

Existing Conditions, Listening, & Learning

- Distrubute Fact Sheet
- Community "Pop-Up" Events
- Interactive Online Mapping Tool

June 2017

Analysis Draft Plan Concepts



Project Analysis & Development

- Walking Audits
- Focus Groups
- Presentations to Interest Groups

November 2017

Draft Plan Review



Plan Review & Implementation

- Public Workshops
- Draft Plan Survey

July 2018

Final Plan

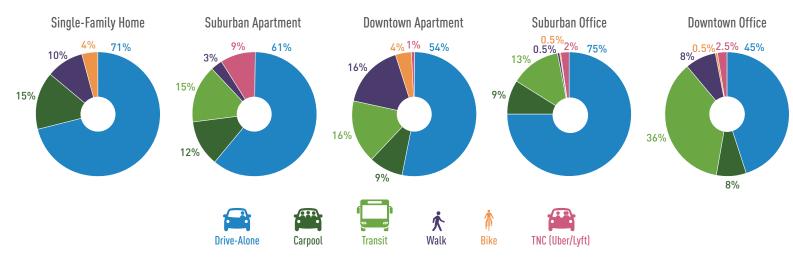


Traveling in Redwood City: walk, bike, transit, or drive?

Travelers in Redwood City use many different ways to travel. The proportion of people taking each form of transportation is referred to as "mode share". To better understand how current trip patterns are different between residential and office land uses, person counts were conducted at several residential housing and commercial developments located throughout Redwood City. The count results of existing Redwood

City land uses show that having higher densities, mixing land uses, and providing multimodal facilities influences how people choose to get around and overall reduces how many people drive alone.

Residential & Office Mode* Share



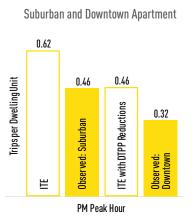
* "Mode" is a term used to distinguish between different ways of getting around. In this report, we focus on six modes - walking, biking, riding transit, carpooling, transportation network companies (like Uber & Lyft), and driving alone.

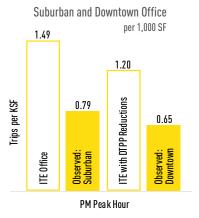
Traveling in Redwood City: Vehicle Trip Generation

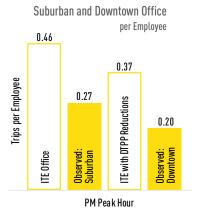
Similar to mode share counts, vehicle trip counts were collected to better understand how many vehicle trips are currently being generated at various land uses in Redwood City. A comparison of these counts with the assumptions used in the environmental document's for the City's General Plan and Downtown Precise Plan (DTPP), show that in almost all cases vehicle trips are overestimated compared to what is actually occurring.

Residential & Office Trip Generation











Engaging the Community



Effectively Engaging the Community to Develop the Plan

The project team sought input from the public through an extensive community engagement process to learn the needs and wishes of Redwood City residents, employees, and visitors, and to build awareness of RWCmoves.

During this outreach process, more than 800 people used an interactive web map to provide input on over 2,000 locations. Survey participants included a mix of female and male residents, employees, students, and visitors all ages from all ethnic backgrounds.

Highlights from the Survey



More comments were received in areas with higher land use densities (e.g. Downtown, along El Camino Real and Woodside Road) than in residential areas of the City

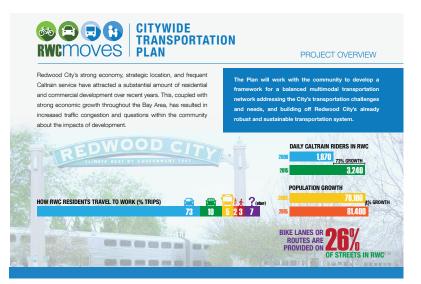


65% of the survey
participants live in Redwood
City, 30% work or go to
school in Redwood City,
and 3% were visitors



7% of the survey participants took the survey in Spanish





Project Fact Sheet Providing summary information to the community

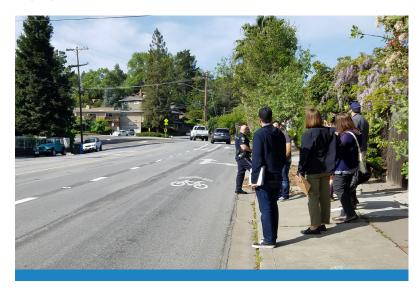


Flyers/ Business Cards Spreading the word



Community "Pop-Up" Events

mmunity Going out to the community



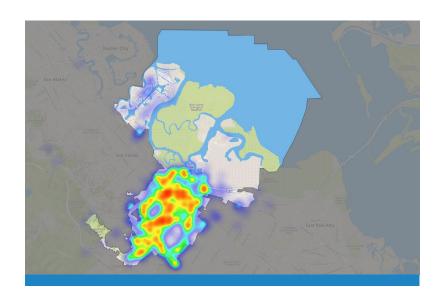
Walking Audits

Observing transportation challenges in Redwood City



Project Website

Keeping the community informed



Interactive Map Survey

Getting feedback from the community



Focus Groups Collecting a broader perspective from not well-represented community members



Interest Group
Presentations

Previous updates to the community



Making Decisions



Project Identification

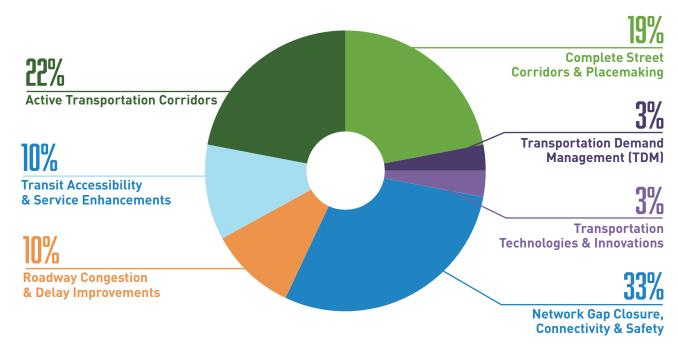
Findings from existing conditions and feedback from community outreach were used to develop a process to guide future transportation investments in the City.

RWCmoves evaluated a list of over 140 transportation projects and programs that were either in progress, previously identified, or emerged through the Plan development process.

Project Categories

Projects and programs are grouped into seven project categories shown below according to their primary characteristics.

Division of Project List by Category



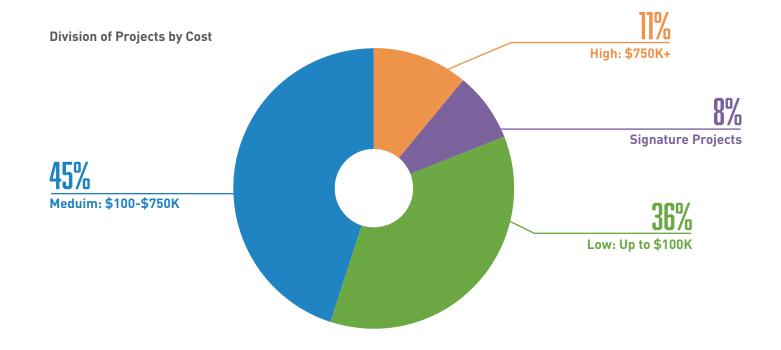
Project Costs

Estimated project costs are assigned to each project as low (up to \$100,000), medium (\$100,000 to \$750,000) or high (more than \$750,000), and "Signature Projects" that are major infrastructure projects.

Prioritization Process

RWCmoves developed the process that the City will follow to guide future transportation investments.

Projects were prioritized based on a twostep evaluation process. First, the projects were scored based on how they improve the performance of the transportation system through an assessment of eleven performance measures. Three of the performance measures received a "multiplier" to assign added weight to those measures. The weighted measures help to ensure that community values on safety, multi-modal transportation, and congestion relief were emphasized in the prioritization process.



Prioritization Process Step One Performance Measures & Prioritization Process



Project Sources

- General Plan
- Precise Plans
- Ongoing Transportation Planning Projects
- RWCmoves Existing Conditions
- RWCmoves Community Outreach



140+ Projects



Project Costs

- Low (up to \$100k)
- Medium (\$100k to \$750k)
- High (more than \$750k)
- Signature Projects



Project Categories

- Active Transportation Corridors
- Complete Street Corridors and Placemaking
- Transit Accessibility and Service Enhancements
- Roadway Congestion and Delay Improvements
- Network Gap Closure. Connectivity and Safety
- Transportation Technologies and Innovations
- Transportation Demand Management (TDM)



Performance Measure and Performance Criteria

- Increases safety for all travel modes
- ★ Improves overall public health and minimizes environmental impacts
- ★ Promotes attractive, well-designed streets through placemaking, public art, and improved landscaping
- ★ Improves pedestrian facilities and street quality
- ★ Improves bicycle facilities and street quality
- ★ Improves access to transit and enhances multimodal connectivity
- ★★ Increases the share of people who walk, bike and take transit
- ★★ Increases person throughput and proactively manages traffic congestion
 - ★ Accommodates all users, including people with disabilities, low-income, and the young and elderly, with equal access to goods and services.
- ★ Project applies current design standards and is feasible and constructible
- ★ Project has a positive return on investment



Total Evaluation Score



Draft Project List

Prioritization Process Step Two

Policy Feedback on Prioritization Process



Opportunity to provide input on Tier 1: Neighborhood Priority Projects finalize the prioritized list of projects.

Project Priorities

Based on this two-stage evaluation process, RWCmoves identifies "Tier 1" (top ranking projects) and Signature Projects (major infrastructure projects) that represent the community's values to improve mobility in Redwood City.



Top Scoring Projects

Projects that received the highest evaluation scores of all RWCmoves projects.

Early Investment Projects

Top scoring projects identified to be low in cost and feasible for construction.

Neighborhood Priority Projects

Key projects located outside of areas with a lot of activity. To help ensure a more equitable distribution of the City's investments, Neighborhood Priority Projects were evaluated separately within each of the City's neighborhoods.



Larger and more complex projects, such as railroad grade separations, redesigned interchanges, new transit services and stations, or any other projects that require major changes to infrastructure.

Grade Separation

Woodside/US 101 Interchange

Ferry Service

Streetcar

Transit Center

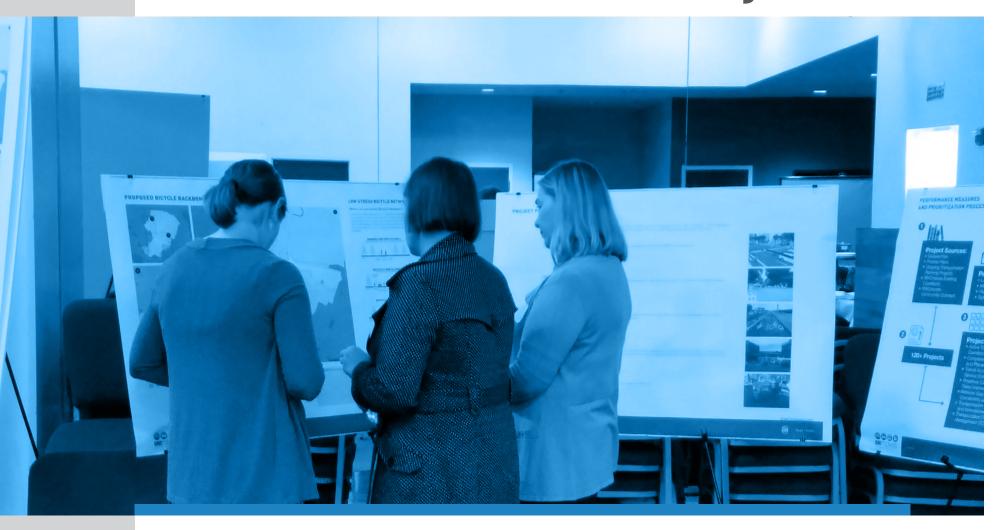


All projects not previously identified as Tier 1 or Signature Projects.

Remaining 95 Projects



Feedback from the Community



Effectively Engaging the Community to Finalize Plan

Following the release of the RWCmoves
Draft Plan, the project team went back to
the community to gather feedback. Specific
outreach actions included:

- Community Workshops
- Online Survey
- Stakeholder Presentations
- Presentations to the Planning Commission, the Complete Streets Advisory Committee, and City Council



Community Workshops



Stakeholder Presentations

Community Feedback on Draft Plan

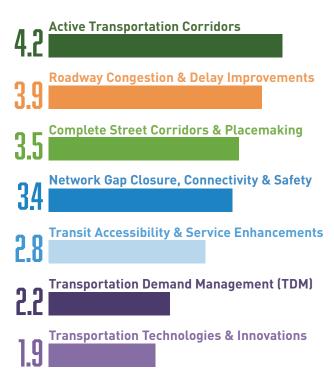
Over 150 people provided input on the Draft Plan through the online survey or one of the community workshops.

Survey findings:

- Favorite Tier 1 projects: El Camino Real Corridor Plan Implementation, Bicycle Master Plan, Permanent Theatre Way Closure, New Downtown Street Connections, Transit Access Improvements
- Favorite Signature projects: 101/84
 Interchange, Whipple Railroad Grade
 Separation, Redwood City Transit Center
 Improvements (short and long-term)

Based on feedback received, the Draft Plan was updated and released as a Final Plan in Summer 2018.

What Project Categories were Most Important to the Community?







Getting it Done



General Plan Policy and Program Updates

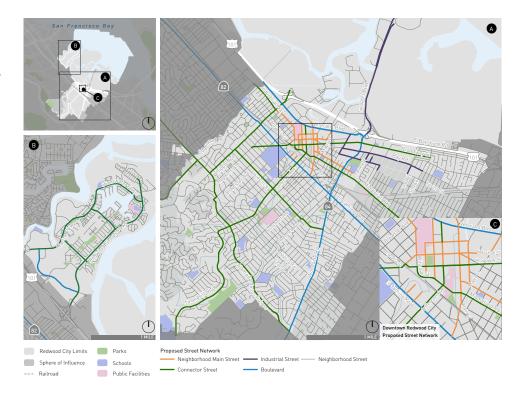
There are several updates to the City's General Plan transportation policies and programs that will need to be updated to support RWCmoves. These include refinements to existing policies and programs and a new mobility evaluation policy.

Street Typology Updates

To support RWCmoves' goal of "creating a walking and bicycling-friendly community that provides a safe, balanced, and convenient transportation system"

RWCmoves would implement the updated street typologies network shown.

The street network typologies would serve to guide future transportation studies and improvements, so that they consider relationships to surrounding land uses, appropriate travel speeds, and the need to accommodate multiple travel modes and various users.



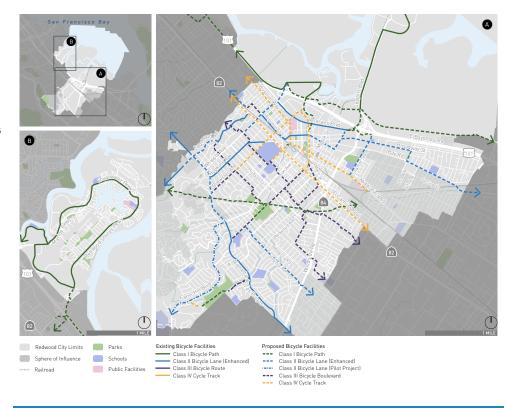
Proposed Street Typologies Network

Bicycle Backbone Network

The intent of a bicycle backbone network is to create a low-stress bicycle network that cyclists of all ages and abilities will be comfortable riding. The backbone network does not include every existing or proposed bicycle facility in the City but instead focuses on a priority network of low-stress streets that the City will seek to implement over time.

Monitoring Transportation Performance Going Forward

Evaluating the City's success in achieving the vision and goals outlined in RWCmoves will be done through bi-annual monitoring. Specifically, the City will establish a transportation system monitoring program that closely relates to the performance measures outlined in the project prioritization process.



Proposed Bicycle Backbone Network

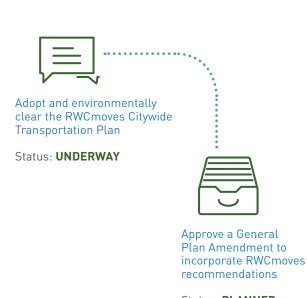
Redwood City Bi-Annual Transportation Monitoring Program Strategy

Monitoring Metric	Monitoring Data
Traffic Collisions	Number of collisions, collision severity and primary collision factors by mode
Vehicle Miles Traveled (VMT)	Average citywide VMT per employee and resident populations
Pedestrian Counts	Total morning and evening peak period pedestrian counts at 10 to 15 key intersections
Bicycle Counts	Total morning and evening peak period bicycle counts at 5 trail locations and 10 to 15 key intersections
Transit Ridership	Average weekday ridership at all stops/stations in Redwood City
Travel Mode Share	Percent of trips made by travel modes by land use (office or residential) and location (downtown or suburban)
Vehicle Congestion	Average vehicle speeds along major corridors during the evening commute

Implementation Actions

The Redwood City Council, with support from City staff, would need to take the following actions to implement the RWCmoves vision along with its supporting goals, policies, programs, and projects.

These implementation actions will allow the RWCmoves Plan to respond to the City's current transportation needs and opportunities, while at the same time recognizing the changing nature of the transportation system. By doing so, the City will be well-positioned to achieve its vision of creating a safe, multimodal, and accessible transportation network that provides the best travel experience possible for everyone in Redwood City.



Status: **PLANNED**



Update RWCmoves Project Priority List every two to three years to reflect additional project needs and priorities

Status: **ON-GOING**



Update multimodal Transportation Impact Fee (TIF) program to capture unfunded Tier 1 projects, select Tier 2 projects and expected locally-funded portions of Signature Projects

Status: **PLANNED**



Monitor performance of transportation system and investment levels bi-annually

Status: **ON-GOING**



Seek local, regional and state grant funding to advance Tier 1 projects to the planning and design stages

Status: **ON-GOING**



