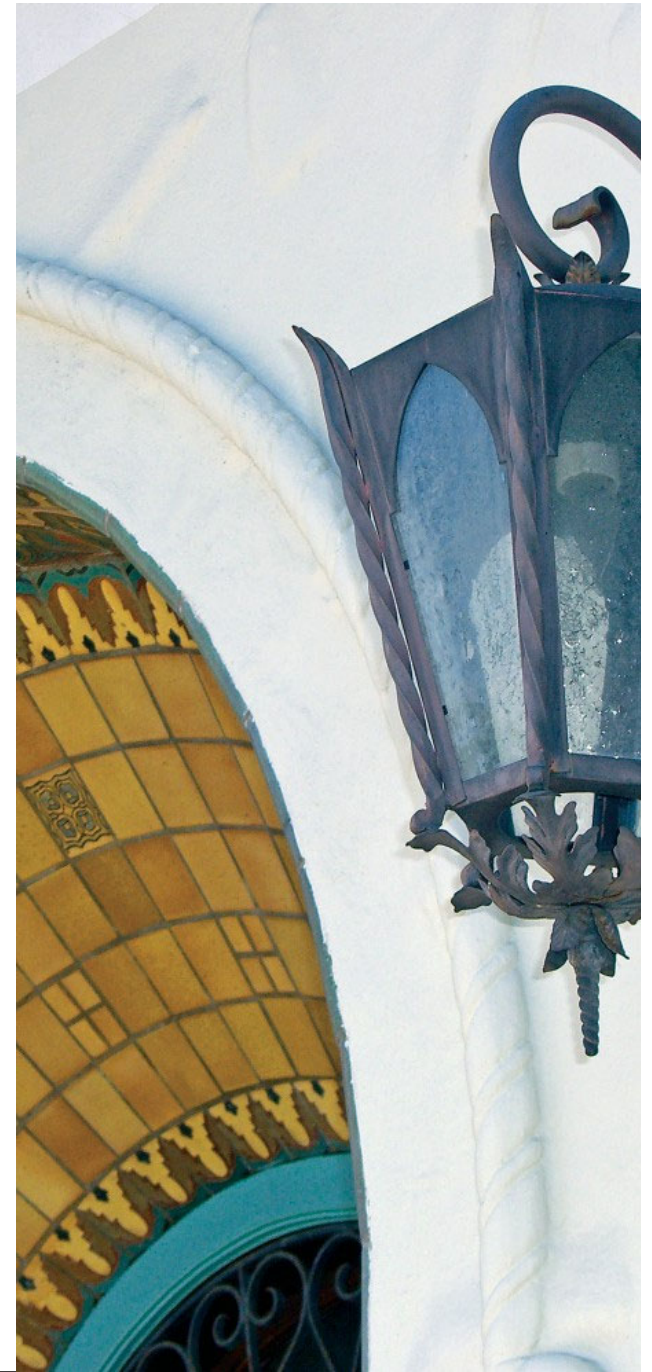


San Carlos 2030 General Plan

Adopted October 12, 2009 (Resolution No. 2009-078)

Amended January 23, 2023 (Resolution No. 2023-009)

Amended (Date, Year) (Resolution No. 2025-xxx)



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Land Acknowledgement

The City of San Carlos acknowledges that our lands are located on the ancestral homeland of the Ramaytush Ohlone peoples, and that, as the original stewards of this land, the Ramaytush Ohlone understood the interconnectedness of all things and maintained harmony with nature for millennia.

Introduction 1



1 INTRODUCTION



The General Plan establishes a framework for how the City will grow and change over the next two decades. It establishes goals, policies and actions that will guide growth, conservation, and enhancement in San Carlos over the next 20 years.

Contents

- 2 Purpose
- 3 General Plan Contents
- 6 The City and Its Planning Area
- 9 San Carlos Today
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Purpose

In California, General Plans serve as the “Constitution” for all future development in cities. The General Plan provides the fundamental basis for the City’s land use and development policy, and represents the basic community values, ideals and aspirations to govern a shared environment over the life of the General Plan. The General Plan addresses all aspects of development including land use, environmental management and sustainability, traffic and circulation, housing, parks and recreation and other topics. The General Plan’s policies are implemented through the Municipal Code, which includes the Zoning Code, Building and Construction Code, Subdivision Ordinance and other City regulations. Further, the General Plan’s policies also impact the goals, objectives and strategies of the Redevelopment Agency’s Redevelopment Implementation Plan. City staff in all departments will implement the actions detailed in the plan.

California Government Code Section 65300 requires that the General Plan be comprehensive, internally consistent and long-term. Although it is required to address the issues specified by State law, the General Plan may be ultimately organized in a way that best suits San Carlos. The Plan should be clearly written, available to all those concerned with the community's development and easy to administer. This document supersedes the previous General Plan, adopted in 1992, the East Side Specific Plan adopted in 1991 and the West Side Specific Plan adopted in 1994 and all amendments to these Plans.

The overall role of the General Plan is to:

- Define a realistic vision of what the City desires to be in 20 years.
- Express policy direction in regard to the physical, social, economic, cultural and environmental character of the city.
- Serve as a comprehensive guide for making decisions about land use, circulation, environmental management, parks and recreation, housing, noise public health and safety.
- Provide the legal foundation for zoning, subdivision and public facilities ordinances, other adopted Citywide plans, compliance with the

California Environmental Quality Act (CEQA) decision and projects decisions and projects, all of which must be consistent with the General Plan.

- Present a clear and easy to understand format that encourages public participation and understanding.

General Plan Contents

The General Plan is divided into seven elements:

- **Land Use Element.** The Land Use Element designates where lands can be developed for specific uses such as residential, commercial, industrial, open space, public facilities and mixed uses. It also provides development regulations for each land use designation and overall land use policies.
- **Housing Element.** The Housing Element is intended to provide for the maintenance and development of housing for City residents. It is completed pursuant to Government Code Section 65588, which requires the Housing Element be updated every five-eight years. It analyzes existing housing stock, analyzes existing and projected housing needs, and quantifies the number of

1 INTRODUCTION



housing units that may be developed, preserved and **improved** through its policies and actions. The Housing Element covers the Planning period ~~2009~~ 2023 to ~~2031~~ 2044.

- **Circulation and Scenic Highways Element.** The Circulation and Scenic Highways Element specifies the general location and extent of existing major streets and other transportation facilities. This Element, as updated in May 2005 and amended in 2008, is carried forward.
- **Environmental Management Element.** The Environmental Management Element focuses on the protection, preservation and enhancement of natural resources in San Carlos. To achieve this, it combines two elements required under State law: the Open Space Element and the Conservation Element. It provides for the protection of open space, conservation of biological resources, protection of water and air quality and adaptation strategies and reduction measures for greenhouse gas emissions and reduction of solid waste.
- **Parks and Recreation Element.** The Parks and Recreation Element provides for parks, open space, trails and recreational activities for San Carlos.

- **Environmental Safety and Public Services Element.** The Environmental Safety and Public Services Element is intended to help prepare the community for risks associated with natural and artificial hazards. This Element also describes the public services available to residents of San Carlos.
- **Noise Element.** The Noise Element identifies sources of noise and provides for reduction of noise that negatively impacts the community.



San Carlos Train Station

Each element of this General Plan contains background information, guiding principles, and a series of goals, policies and actions.

- **Guiding Principle.** A guiding principle is an overarching choice or direction which becomes a touchstone leading the creation of all the goals, policies, and actions.
- **Goals:** A goal is a description of the general desired result that the City seeks to create through the implementation of its General Plan.
- **Policies:** A policy is a specific statement that guides decision-making as the City works to achieve a goal. Such policies, once adopted, represent statements of City regulation and require no further implementation. The General Plan's policies set out the standards that will be used by City staff, the Planning Commission and City Council in their review of land development projects and in decision-making processes.
- **Actions.** An action is a program, implementation measure, procedure, or technique intended to help achieve a specified goal. The City must take additional steps to implement each action in the General Plan.

These principles, goals, policies and actions provide guidance to the City on how to direct change and manage its resources over the next 20 years. These may not all be fully realized during the planning period due to fiscal constraints.

Figure 1-1 illustrates that policies and actions are at the same level of importance, and are both intended to implement goals. In most cases, goals have both implementing policies and actions. In some cases a goal may be implemented exclusively through either policies or actions.

FIGURE 1-1 **GENERAL PLAN COMPONENTS**



Using the General Plan

The General Plan is a document intended to be used by a variety of people. Some of the key groups that will use the General Plan include elected and appointed City officials, City staff, City residents and individuals proposing new development projects. For all of these users, the General Plan identifies the context and expectations for how San Carlos will grow and change.

This General Plan is written and designed to communicate information in a clear and accessible manner.

The City and its Planning Area

San Carlos is located on the San Francisco Peninsula, between Belmont and Redwood City as shown in Figure 1-2. The city limit extends to the City of Belmont to the northwest, the San Francisco Bay to the northeast, the City of Redwood City to the southeast and unincorporated San Mateo County to the southwest. Since the surrounding communities that border San Carlos are largely built out, the Planning Area includes only the city limit and the Sphere of Influence (SOI). The city limit and SOI are shown in Figure 1-3 (Revised October, 2024).

Government Code Section 56076 defines a SOI as a “plan for the probable physical boundaries and service area of a local agency, as determined by the commission.” The term “commission” refers to the Local Agency Formation Commission (LAFCo). A SOI is an area within which a city may expand its boundaries and services through the process of annexation. The purpose of a SOI is to encourage “logical and orderly development and coordination of local governmental agencies so as to advantageously provide for the present and future needs of the county and its communities.”

San Carlos’ SOI includes three areas of San Mateo County. Devonshire Area, which includes an island referred to as Devonshire Canyon located within the city limit and nearby 17-acre Devonshire area adjacent to Club Drive, Cranfield Avenue and the City of Belmont; Palomar Park, a neighborhood which lies to the south of the city limit; and Pulgas Ridge (formally designated as Hassler Area by LAFCo), an area that includes Pulgas Ridge Open Space Preserve and several San Mateo County institutional facilities.

FIGURE 1-2
Regional Location

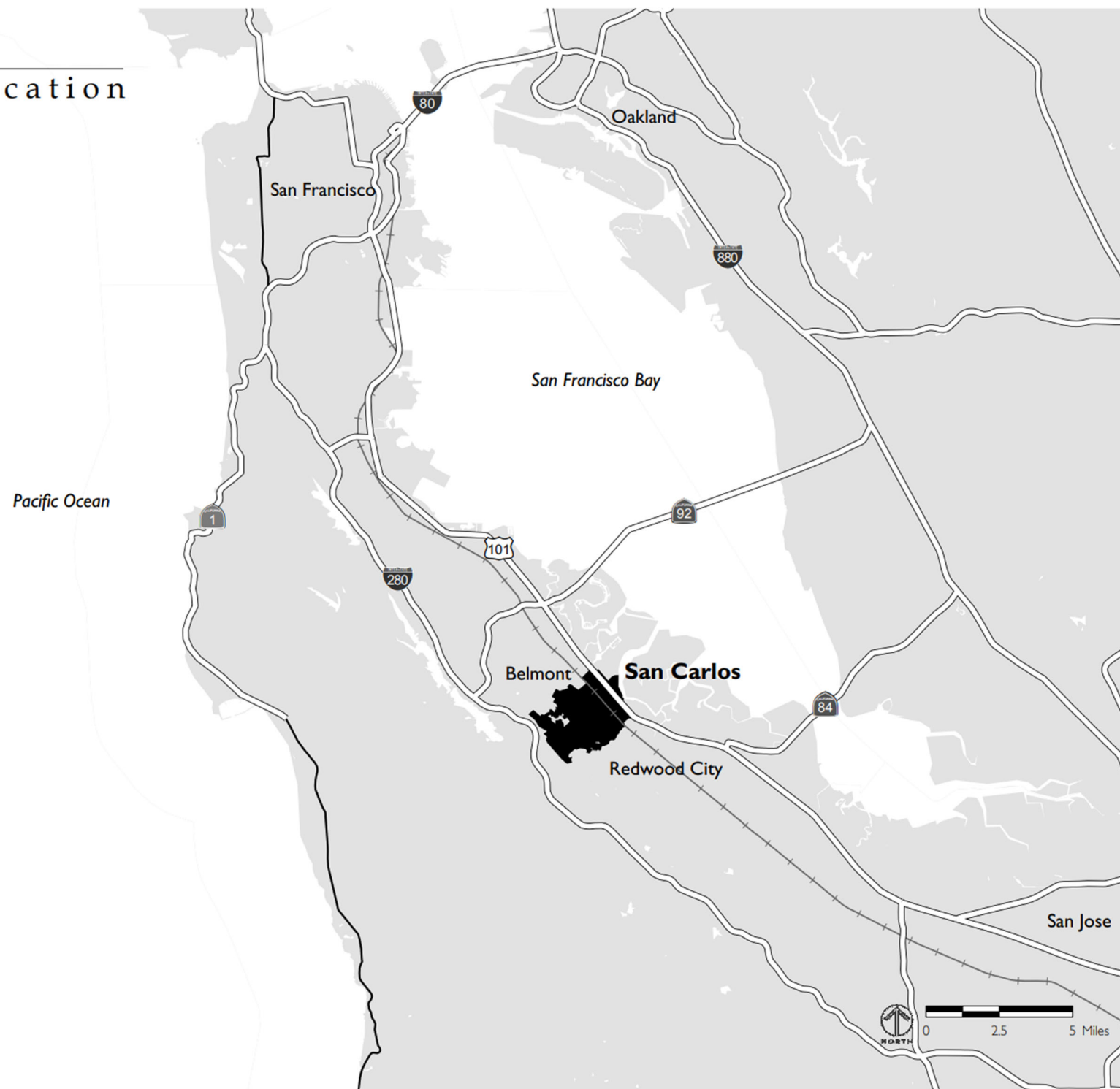


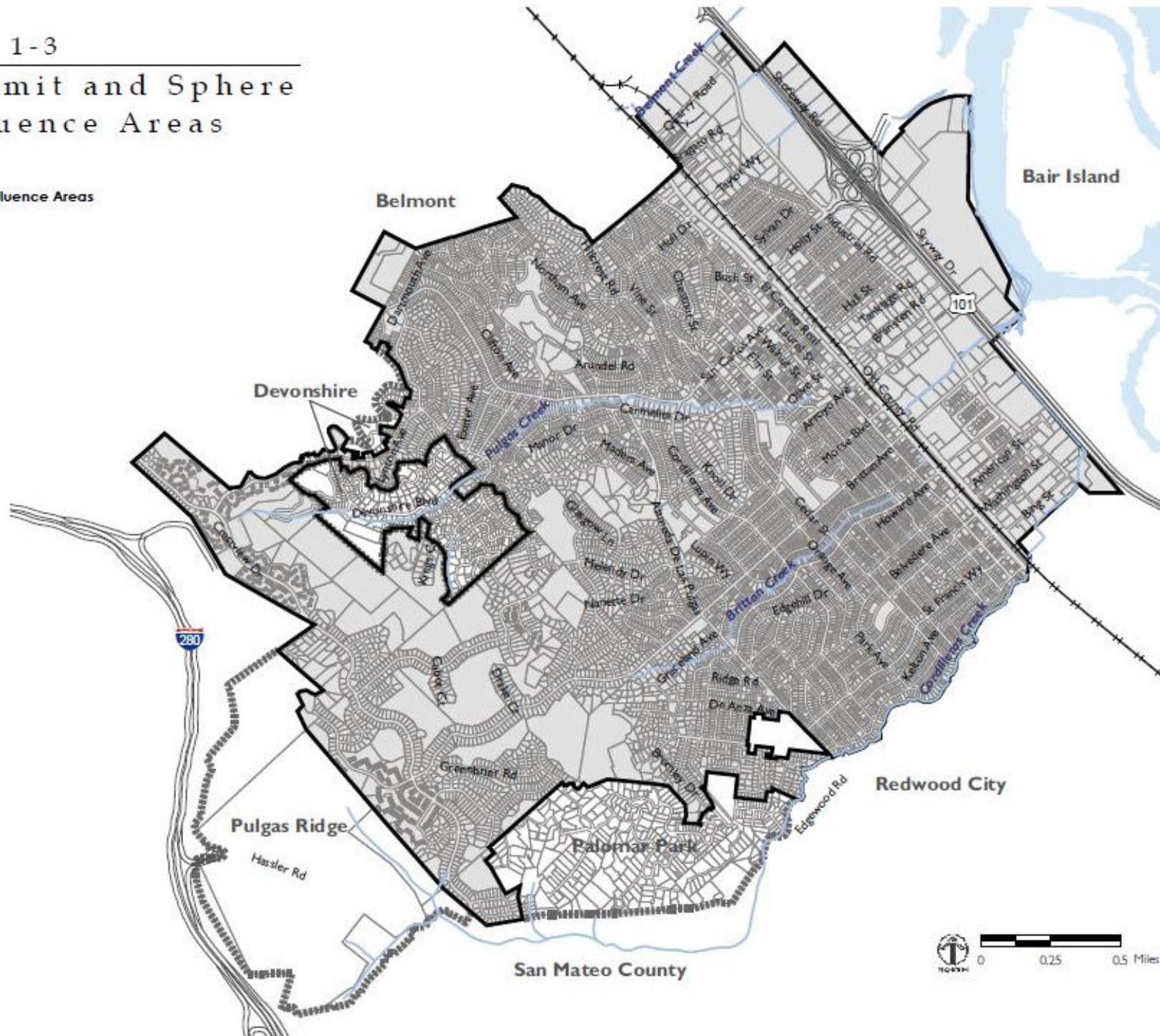


FIGURE 1-3
City Limit and Sphere
of Influence Areas

 City Limit
 Sphere of Influence Areas



San Carlos Today

San Carlos is a community with a strong sense of place and a distinct village feel. This section briefly discusses the City's history, population and housing and the opportunities and constraints they present for this General Plan.

Brief History

The first known human inhabitants of the San Carlos area were the Ohlone, who were also known as the Costanoans. Historians believe that two sub-tribes existed in and around San Carlos, the Salson to the north of Belmont Creek and Lhamshin around the greater San Carlos area. Spanish settlement of the area, beginning in 1769, led to the dispersal of the tribes to the Spanish missions and eventually the disappearance of the Ohlone as a cultural group.

Colonization of the San Francisco Bay Area accelerated in 1776 with the establishment of the Mission San Francisco de Asis. By the 1790s, the mission and other San Francisco establishments were being supported by small farms as far south as San Mateo. To encourage further settlement of the area, the Spanish government granted land to retired soldiers and men of influence.

Don Jose Dario Arguello, commandante of the Presidio at San Francisco and later governor of Alta California received a 35,000-acre land grant that encompassed what would later become Atherton, Belmont, Menlo Park, Redwood City, San Carlos and part of San Mateo.

Early attempts to develop San Carlos began in the late 1800s. These early efforts were generally not successful until 1917, when the Mercantile Trust Company hired Fred Hugh Drake, a prominent real estate and business promoter to oversee the development of the city. Drake expanded infrastructure, established a chamber of commerce, encouraged the development of housing and gave the city the motto "The City of Good Living."

The Devonshire Hills subdivision was one of the first neighborhoods in San Carlos and was established by Drake in 1924, one year before the City's incorporation in 1925. This subdivision used principles from the Garden City urban planning movement, establishing dog-leg cul-de-sacs and pass-through walkways.

Commercial development followed soon after the establishment of residential neighborhoods. Support businesses, such as gas stations, grocery stores and a pharmacy were established by 1926 along El Camino Real. Industrial activity also came to San Carlos at this time when Fred Hugh Drake helped to bring about a Southern

1 INTRODUCTION



Pacific spur track between San Francisco and Sunnyvale. This rail connection led to the creation of the city's first industrial area, located east of the railroad.

After World War II, the population in San Carlos rapidly expanded, especially after the establishment of the Dalmo Victor and Eitel McCullough electronics plants in 1944. The population quadrupled between 1940 and 1950, largely due to the presence of these two electronics plants. The electronics industry grew and by 1958 it comprised a substantial portion of the industrial area. Also in the late 1940s, the San Carlos Airport moved from its former location between Brittan and San Carlos Avenues to its present site, east of Highway 101. Additional residential development in areas east of El Camino Real and north and south of Holly Street also occurred at this time.

As the city grew in the 1950s, residential growth was focused in the western hills, above Arguello Park and west of both Alameda de las Pulgas and San Carlos Avenue. In 1956, the City annexed 500 acres west of the Alameda so that the area could be subdivided to provide an additional 1,300 homes, including apartments. In the East Side of San Carlos, growth in the service, supply and electronics industries fueled the

City's economic development. More recently, high-tech and biotechnology firms have contributed to economic growth and transformation in San Carlos. Another recent trend has been the redevelopment of infill parcels with mixed-use and multi-family family housing in areas near Downtown and the El Camino Real transit corridor.

Population and Housing

The City of San Carlos has grown at a constant pace since its incorporation in 1925 and is expected to continue to grow in the future. The California Department of Finance estimated that the San Carlos population was 29,420 ~~28,857~~ in 2024~~08~~. ~~The Association of Bay Area Governments (ABAG) projects that the population in San Carlos will grow to 33,700 by 2030, representing a 16 percent increase from 2005. San Carlos' predicted growth rate is slightly higher than San Mateo County's (14 percent growth by 2030).~~

There are a variety of housing types in San Carlos, but single-family ~~detached~~ homes constitute approximately 72~~75~~ percent of San Carlos' housing

supply. However, multi-family housing is projected to be the~~the~~ fastest growing housing type in San Carlos. Between 2024~~00~~ and 2045~~08~~, multi-family housing units are projected to increase~~d~~ by over 7~~200~~ percent, compared to zero projected increase for single-family housing. The percentage of multi-family housing units is expected to increase due to infill

development. About 70~~5~~ percent of San Carlos residents own their houses, which is a greater percent—age than ~~other parts of~~ San Mateo County as a whole, and the Bay Area.

Key Issues for the General Plan

This General Plan provides policy direction on the key issues facing San Carlos over the next 20 years. These key issues were identified through an extensive public participation process described in Section E below. Some of the key issues addressed in this General Plan include:

- **Environmental Sustainability.** How can San Carlos most effectively protect its valuable natural resources and meet present needs without compromising the ability of future generations to meet their needs?
- **Community Identity.** How can new development enhance San Carlos' unique sense of place and respect existing residential neighborhoods?
- **Housing.** How can San Carlos become a more inclusive city with affordable housing available to all residents?
- **Economic Development.** What are the best ways for San Carlos to expand the local economy while protecting existing businesses that are important to the community?

- **Parks and Open Space.** How should San Carlos provide for the recreational needs of residents and support open space preservation?

Goals and policies in this General Plan address these and other questions that are important to the San Carlos community. The General Plan Vision Statement, included in Chapter 2, also identifies key values and aspirations held by the community.

The General Plan Update Process

The General Plan update process began in 2007 and continued through 2009. During this period, a range of public input opportunities occurred to ensure that an updated General Plan reflects the community's vision for San Carlos. ~~The following outreach efforts were undertaken to involve San Carlos residents in the process.~~ The sections that follow describe civic engagement efforts for the 2009 General Plan Update, the 2023 Focused General Plan Update, and the 2045 General Plan Reset.

General Plan Advisory Committee (2009 Update)

The General Plan Advisory Committee (GPAC) was formed and was comprised of 15 members appointed by the City Council. GPAC included individuals from

various City Commissions and Committees, as well as members from the residential and business community at-large. The GPAC's charge was to examine the various issues that contributed to the General Plan update, provide direction through collaboration and create a forum that effectively and efficiently implemented their charge. The GPAC helped to guide the development of the land use alternatives, goals, policies and actions and the preparation of a preferred General Plan. GPAC meetings were open to the public and allowed all interested community members to voice their opinions regarding the content and direction of the General Plan. In total, there were 26 GPAC meetings. There were also three subcommittees: the Climate Action Plan Subcommittee, the Housing Sub-committee and the Specific Plan Subcommittee. The Climate Action Plan Subcommittee worked to prepare the Climate Action Plan which helped inform policies and actions in the General Plan. The Housing Sub-committee focused on the Housing Element, ensuring that it contains all State-mandated information. The Specific Plan Subcommittee reviewed the former West Side and East Side Specific Plans and other development policies and recommended inclusion of appropriate policies into the General Plan update.

Public Workshops (2009 Update)

The following workshops took place to foster community participation in the General Plan Update process.

- **Building Community Meeting.** City staff, in conjunction with the former citizens group San Carlos Building Community Task Force, held a forum to present information about what a general plan is, to describe the process of updating it and to have break-out groups for people to brainstorm ideas.
- **Visioning Workshop.** The Visioning Workshop helped to formulate a vision for San Carlos' future and to identify issues that need to be addressed in the General Plan.
- **Youth Workshop.** The Youth Workshop identified planning issues that were important to San Carlos youth and their vision of the future of the city.

Land Use and Policy Alternatives Workshop. The public reviewed and commented on land use and policy alternatives for the General Plan Update in this public workshop. The information gathered at the workshop was utilized to prepare the preferred land use map and policy alternatives which were presented during City Council and Planning Commission Study Sessions.

- **Housing Workshops.** Two community workshops on housing issues were conducted to inform the draft of the Housing Element.
- **Climate Action Plan Workshop.** One community workshop was held to elicit community ideas on reduction goals and supporting measures for reducing greenhouse gas emissions resulting from energy consumption, transportation, land use and solid waste production.

GPAC, Planning Commission and City Council Study Sessions (2009 Update)

Based on the GPAC discussion of the Study Areas, three citywide land use alternatives were developed for the City of San Carlos. The GPAC discussed the alternatives at two meetings. The result was three unique alternatives for the future of San Carlos. Alternative 1 focused on a minimal amount of change to existing land uses. Alternative 2 focused future development on the east and west sides of the city with moderate job growth on the east side. Alternative 3 focused housing on the west side of the city and job growth on the east side of the city. The Planning Commission and City Council reviewed and commented on the alternatives. The GPAC then prepared a draft preferred land use alternative for review by the Planning Commission, who provided a

recommendation to the City Council. The City Council provided final direction to create the preferred land use alternative for inclusion in this plan.

Public Review Period and Adoption (2009 Update)

The following drafts and adoption procedures were a part of the General Plan Update process:

- **Preliminary Draft General Plan.** A preliminary draft of the General Plan was released for public review on May 1, 2009. The public was invited to comment on this document at a General Plan Advisory Committee (GPAC) meeting on May 13 and 14, 2009.
- **Draft General Plan.** The Public Review Draft General Plan and Environmental Impact Report (EIR) was published in June 2009. The EIR was prepared pursuant to the California Environmental Quality Act (CEQA) to disclose the potential environmental consequences of implementation of this plan. Public comment on these documents was received at Planning Commission and City Council meetings in July and August 2009.
- **Final General Plan and EIR Adoption.** The public had an opportunity to comment on the Final General Plan and EIR during public hearings with

the Planning Commission and City Council. These hearings occurred in September and October 2009.

2023 Focused General Plan Update

The 2023 Focused General Plan Update concentrated on the 2023-2030 Housing Element, Environmental Safety and Public Services Element, and other elements as necessary for consistency with the Housing and Environmental Safety and Public Services Elements' update. A series of community engagement events including but not limited to community-wide public workshops, online surveys, special needs housing service providers focus group, newsletters and social media news or "e-blasts", and study sessions with the Housing Subcommittee, the Planning Commission, and the City Council.

The community engagement and technical planning/analyses phases began in 2020 and continued through 2021 and 2022. The Focused General Plan Update was completed in January 2023 with the certification of an EIR; the adoption of the updated Housing, Environmental Safety and Public Services, Land Use, Circulation and Scenic Highways, Noise and Environmental Management elements; and the adoption of a Zoning Ordinance and Zoning Map Amendment.

2024 General Plan Reset

The General Plan Reset was initiated in 2024 to amend the buildout capacity of the 2030 General Plan. As part of the 2045 General Plan Reset, concurrent long range planning initiatives were considered into the citywide buildout capacity. Ongoing initiatives within San Carlos included the Northeast Area Specific Plan and the Downtown Specific Plan. The 2045 General Plan Reset was more focused than a complete General Plan Update and did not include any changes to General Plan land use designations or major policy changes; instead the focus was to adjust development projections to the year 2045. The community was informed and engaged in the project through updates on the City website, newsletters, e-news, stakeholder meetings, and study sessions and public hearings at City Council and Planning and Transportation Commission.



Fountain at Laurel Park

Vision Statement 2



SAN CARLOS
GENERAL PLAN



2 GENERAL PLAN VISION



The Vision Statement is a description of what San Carlos wants to become through the implementation of the General Plan. The Vision Statement provides a sense of the purpose and mission for the General Plan and sets the tone for the Plan's guiding principles, goals, policies and actions.

Contents

- 16 Background of the Vision Statement
- 17 San Carlos General Plan Vision Statement



Background of the Vision Statement

On January 8, 2008, the City of San Carlos held two Visioning Workshops, the first public workshops for the General Plan Update. Approximately 60 youth attended the Youth Workshop and 67 citizens attended the Visioning Workshop. Individuals attending both workshops were asked to describe San Carlos as they would like it to be in the year 2030. The workshops started the process for establishing a vision for the future of San Carlos. After the workshops, a draft vision statement was prepared and presented to the GPAC, the Planning Commission and the City Council in public meetings in February 2008. The City Council endorsed the Vision Statement on February 11, 2008.

San Carlos General Plan Vision Statement (2009 Update)

In 2030 San Carlos is a safe, beautiful, vibrant and livable community with tree-lined streets, open space, public art, high-quality architecture and state-of-the-art infrastructure. We enjoy a balance of residential, schools, retail, commercial and industrial uses and services that enhance our quality of life, support the fiscal health of the City and sustain a robust local economy. Downtown San Carlos is the heart of the community – a place to experience and savor the joys of daily life while enjoying a mix of stores and services.

Housing in San Carlos meets the needs of a diverse community. People who work in San Carlos can afford to live here. San Carlans are also able to work for employers located within the community. The City pursues creative solutions to economic development objectives and encourages innovative environmentally sustainable industries and businesses to locate and remain in San Carlos.

San Carlos is committed to sustainability. Sustainability promotes the use of resources in the present in a manner that does not compromise the choices and quality of life of future generations.

Mobility is part of the San Carlos way of life. It is precious to us, and we value our collective ability to freely and efficiently move about the city and region. The airport remains a unique part of our transportation system. Sidewalks, paths and bikeways connect residential neighborhoods to all commercial areas, schools, parks and open space. Destinations and places in San Carlos are accessible using all forms of transportation.

Quality educational opportunities, at all levels, are available to the entire community. Our outstanding educational system, providing both formal and informal learning opportunities, enhances our quality of life.

Public service, charitable giving, volunteerism and citizen participation are integrated into public, non-profit and educational services offered.

Community care services are inclusive for seniors and citizens with mental and physical disabilities.

San Carlans enjoy a wide variety of private and public community venues, including parks, trails, community centers, arts, museums, cultural centers and clubs, faith-based places of worship and congregation, recreational facilities, sports and other civic and cultural events. We enjoy access to affordable and high-quality health services. The City's government contributes to our distinctive community identity and sense of civic pride.

2 GENERAL PLAN VISION

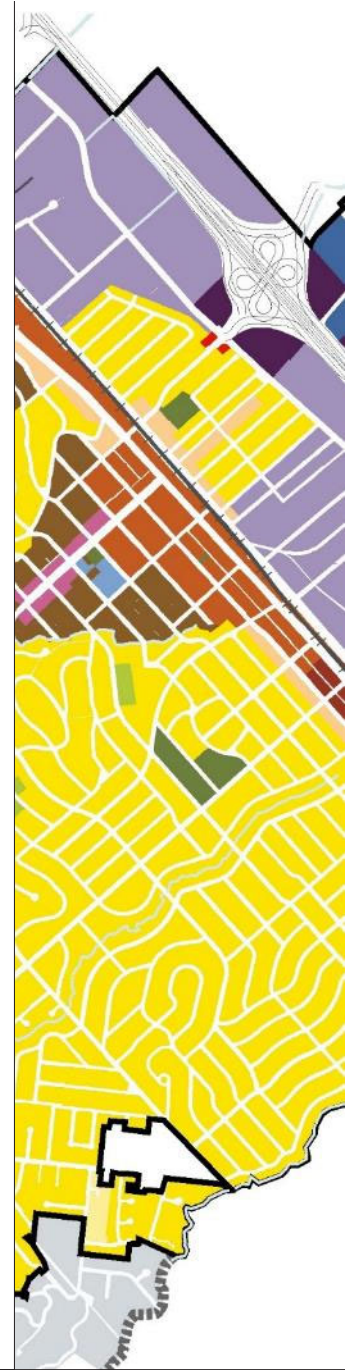


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Land Use 3



SAN CARLOS
GENERAL PLAN



The purpose of the Land Use Element is to shape the potential physical development of the City and to preserve, protect and enhance the community's current quality of life consistent with the City's Vision. The Land Use Element is not designed to discourage or promote development as allowed in this General Plan, but rather describes the manner in which development should be managed in the event that it does occur. The Land Use Element is the central chapter of the General Plan.

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21 Land Use Regulations

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77 Cultural and Historical Resources



Introduction

As required by California Government Code Section 65302(a) and Public Resources Code Section 2762(a), the Land Use Element of the General Plan addresses the following issues:

- Distribution, location and extent of the uses of land for housing, business, industry, open space, natural resources, recreation, and enjoyment of scenic beauty, education, public buildings and grounds and other categories of public and private uses of land.
- Standards of population density and building intensity for the land use designations.

The Land Use Element focuses on development that could potentially occur both within the existing city limit and the city's Sphere of Influence (SOI). The SOI

3 LAND USE ELEMENT



is the area adjacent to or an island within the city limit that is planned for the probable physical boundary and service area of the City.

The Land Use Element also addresses issues related to economic development, urban design and cultural resources. For each of these topics, including land use, background information is provided followed by goals, policies and actions. This Element also includes a statement of Guiding Principles relating to land use in San Carlos.

Land Use Regulations

Existing Land Use in San Carlos

Details on existing land use in San Carlos are included to document the current development pattern and to provide background for the land use goals, policies and actions.

The City is largely a residential community characterized by a traditional Downtown area with multi-family housing immediately adjacent and by mainly single-family residential neighborhoods east and west of

The Land Use Element is divided into three basic sections, which cover:

- **Land Use Regulation:** This section includes background information about existing land use and annexation protocol, 2030 General Plan land use designations, and goals, policies, and actions related to land use.
- **Community Character and Urban Design:** This section includes background information about the community character of San Carlos and goals, policies, and actions related to community character and urban design.
- **Cultural Resources:** This section includes background information about cultural and historic resources in San Carlos and related goals, policies, and actions.

Downtown and extending to the western hills. San Carlos also has a substantial industrial area and retail centers, located east of El Camino Real.

Table 3-1 quantifies the amount of different types of land uses in San Carlos based on 2007 data from the San Mateo County Assessor's Office. In terms of acreage, single-family residential is the most common land use, representing 60 percent of the total land in San Carlos. The second largest land use category is industrial, representing 12 percent of the total land in San Carlos. The following land use categories were created to describe the existing pattern of development in San Carlos and are not the General Plan land use designations which are identified later in this Element.


Single-Family Residential. Single-family residential development is the largest land use in San Carlos, comprising 60 percent of the city's land. Most parcels designated as single-family contain detached units. Single-family neighborhoods are generally located west of Downtown, though there are two small single-family neighborhoods in the East Side area. ~~The existing single-family neighborhoods will likely experience the least amount of change during the 20-year planning horizon of this General Plan.~~

TABLE 3-1 EXISTING LAND USE IN SAN CARLOS, 2007

Land Use Category	Acres	Percent of Total Acres
Single-Family Residential	1,473	60%
Multiple-Family Residential	199	8%
Commercial	121	5%
Office	54	2%
Industrial	291	12%
Airport	19	1%
Public/Quasi-Public	97	4%
Park/Open Space	57	2%
Vacant	157	6%
Total	2,469	100%

Source: San Mateo County Assessor's Office, 2007.

3 LAND USE ELEMENT



San Carlos East Side Area

The Land Use Element frequently refers to an area known as the “East Side” area. The East Side area includes all areas of San Carlos east of the Caltrain right-of-way. Included in the East Side area are a diversity of land uses, including the Laureola residential neighborhood, the San Carlos airport, businesses serving the building industry, light industrial businesses, and retail uses. Three Landmark Sites in the East Side area were designated for redevelopment at major entries to the city. One of the Landmark Sites, located at the south end of the city on Industrial Road, has been redeveloped as office and hotel. Recently, the Palo Alto Medical Foundation hospital, was approved for development on Industrial Road. The East Side area also has seen recent growth in regional- serving retail uses. The San Carlos Marketplace project, located on Industrial Road at Howard Avenue, added over 100,000 square feet of additional retail and commercial space to the area. Key issues for the East Side area that are addressed in this General Plan include: preserving existing residential neighborhoods; maintaining existing industrial uses, promoting “green” businesses; redeveloping the two remaining Landmark Sites on Industrial Road, north and south of Holly Street and adjacent to Highway 101; and encouraging additional retail development along Highway 101 to generate additional sales tax revenue for the City.

The Harbor Industrial area (HIA) is also located in the East Side area of the City. This subarea comprises large manufacturing businesses, biotechnical and biomedical firms and light and heavy industrial uses. The majority of the area (from Belmont Creek to north of Holly Street) was annexed in 1997 after a petition for annexation was received from over 80 percent of the property owners in the HIA.

The balance of the HIA to the north remains unincorporated under a compromise known as “ABC” reached between the Cities of San Carlos and Belmont and the HIA property owners in 1997. The ABC Compromise requires San Carlos or Belmont to meet certain conditions in order to annex the remaining unincorporated portions of the HIA. The portion of the HIA that was annexed to San Carlos conforms to both County and City industrial zoning regulations. Existing land use regulations strongly discourage housing, commercial, retail and non-industrial uses in this area.



Downtown

The Land Use Element often mentions the City’s Downtown area. The Downtown is generally defined as Laurel Street from Holly Street to Arroyo Street, including properties west to the predominantly multi-family Walnut Street and the Civic Center on Elm Street. This area is commercial in nature and marked by numerous restaurants, personal service uses, and small retail shops. The Downtown Urban Design Guidelines were developed for this area of the City in order to retain and enhance the vitality of the Downtown as a central point for social interaction and commercial activity.

Note: The City is currently preparing two new specific plans for the downtown and northeast areas which are both on schedule to be adopted by the end of May, 2025.

Multiple Family Residential. Multi-family housing accounts for 8 percent of land in the city. Multi-family residential includes those parcels containing more than one housing unit, such as duplexes, triplexes, fourplexes, townhomes, condominiums and apartment buildings. In recent years, an increasing amount of infill multi-family housing development has occurred in and around Downtown. In addition to the Downtown area, Laurel Street and El Camino Real corridor north of Holly Street and south of Arroyo Street, multifamily housing is also found along the southern edge of the Devonshire Area and along the western boundary of the city.

Commercial. Commercial land refers to parcels that contain a number of business types including retail, services, restaurants, offices and medical facilities. Commercial uses account for approximately 5 percent of land in San Carlos. Much of the commercial land in San Carlos is located Downtown, along Laurel Street and along El Camino Real. Other commercial uses are located in the East Side area along Old County Road, Brittan Avenue and Industrial Road.

Office. Office refers to parcels that contain business, professional and medical services. Office uses occupy 2 percent of San Carlos' area. Most office uses are located in Downtown San Carlos and in the East Side area.

Industrial. Industrial development refers to parcels used for production and manufacturing and also includes uses such as warehouses, services and supplies, self-storage facilities, automobile repair garages, re- search and development uses. Approximately 12 percent of San Carlos' land is developed as industrial. Industrial uses are concentrated in the East Side area and include large manufacturing businesses, biotechnical and biomedical firms and light and heavy industrial uses.

Public/Quasi-Public. Public and Quasi-Public land uses represent 4 percent of the city's acreage, and include schools, libraries, City offices and utilities. These uses are scattered throughout the city.

Park. Parks and open space account for 2 percent of San Carlos' land and include existing City parks.

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Airport. The San Carlos Airport, occupying 1 percent of the city’s area, is located in the eastern corner of the city on land owned by San Mateo County.

Vacant. Parcels that are void of any structures are classified as vacant. Approximately 6 percent of San Carlos’ land is vacant.

Planning Areas

During the 2009 General Plan Update process, the City identified areas that had ~~the~~ the greatest potential to experience land use changes to 2030. ~~over the next 20 years.~~—This General Plan refers to these areas as “Planning Areas.” Figure 3-1 shows the location of the nine General Plan Planning Areas. The Planning Areas are distinctive places in San Carlos and, as such, have specific policies and programs targeted towards them. These areas are referenced throughout this General Plan.

Airport Land Use Compatibility

In addition to the General Plan, there are other plans and regulations used by the City to guide development in specific areas of San Carlos. To foster land use compatibility surrounding the San Carlos Airport, the City

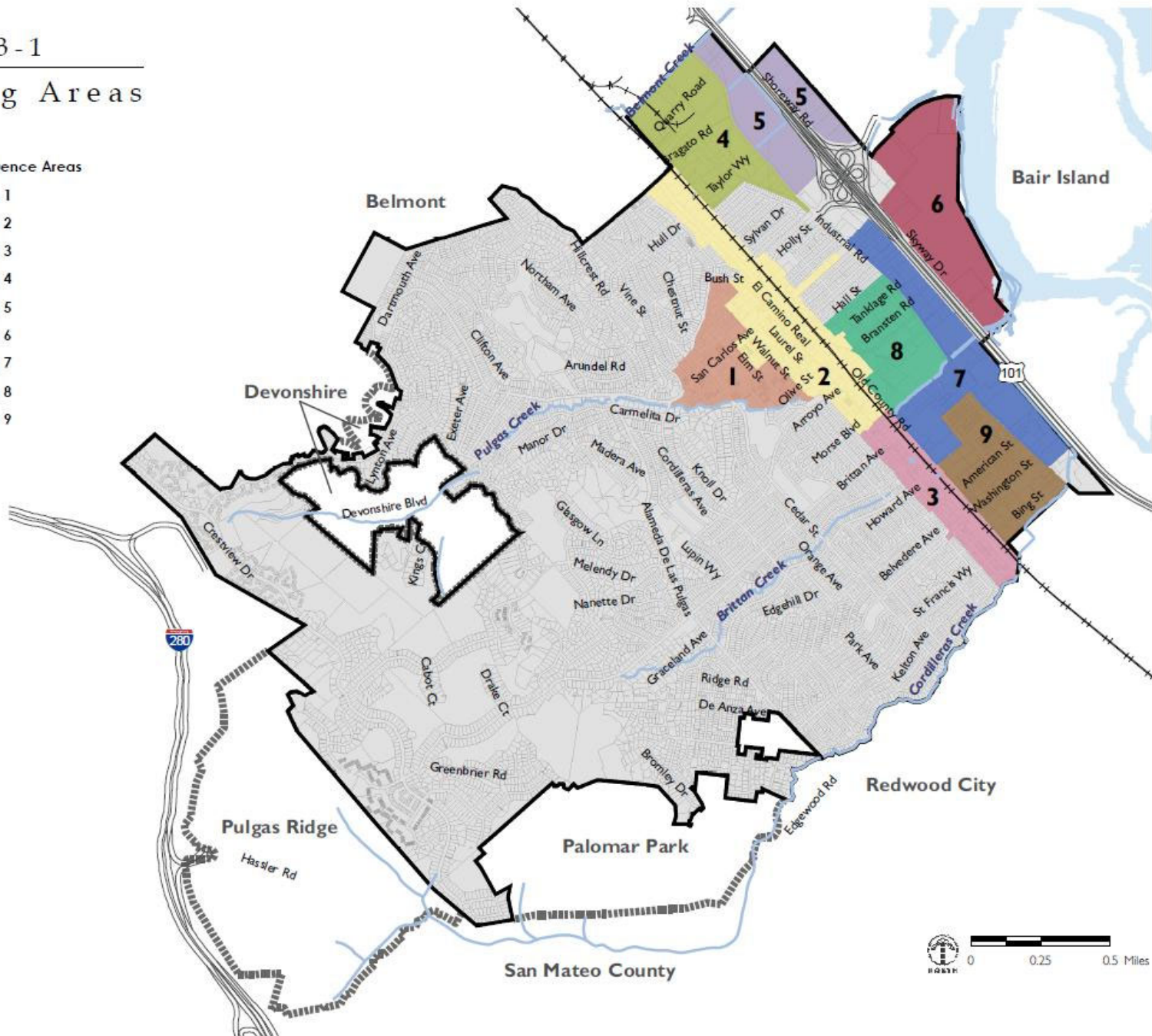
refers to the ~~San Mateo County~~ Comprehensive Airport ~~Land Use Compatibility Plan~~ for the Environs of San Carlos Airport (ALUCPCLUP). The ~~ALUCP CLUP~~ is developed and updated by Airport Land Use Commission of the San Mateo City/County Association of Governments (C/CAG), ~~—~~and was most recently adopted in in October 2015 with subsequent amendments in October 2022 ~~November 1996~~. The main goal of the ~~ALUCP CLUP~~ is to minimize public exposure to excessive noise and safety hazards associated with the airport. Public Utilities Code Section 21676 requires San Carlos’ and San Mateo County’s General Plan land use ~~designations—and planning documents~~ to be in conformance with the land use plans and policies of the ~~ALUCP CLUP~~.

Sphere of Influence and Annexation

The City and San Mateo Local Agency Formation Commission (LAFCo) have established a SOI for San Carlos. The SOI represents the area that the City may consider for annexation during the next 20 years. The SOI of San Carlos includes three distinct unincorporated areas. The Devonshire Area contains Devonshire Canyon, an island within the city limit and a 17-acre Devonshire area adjacent to Club Drive and the City of Belmont; Palomar Park, a neighborhood which lies to the south of the city limit; and Pulgas Ridge (named Hassler Area by LAFCo) which contains the Pulgas

FIGURE 3-1
Planning Areas

-  City Limit
-  Sphere of Influence Areas
-  Planning Area 1
-  Planning Area 2
-  Planning Area 3
-  Planning Area 4
-  Planning Area 5
-  Planning Area 6
-  Planning Area 7
-  Planning Area 8
-  Planning Area 9



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Ridge Open Space Preserve and several San Mateo County institutional facilities. These three unincorporated areas are illustrated in Figure 3-1 and on all maps herein described as Devonshire, Pulgas Ridge (formerly Hassler), and Palomar Park.

LAFCo oversees and adopts the SOI for each city in San Mateo County and must approve the annexation of land outside city boundaries. Landowners wishing to apply for annexation into San Carlos must submit an annexation application to the San Mateo LAFCo in coordination with the City of San Carlos. For an annexation application to be approved, the project must comply with the City's Adopted Annexation Policies, which are described below.

Residential Annexation Policies

The City of San Carlos has adopted residential annexation policies that apply to all residential annexations within the city's SOI. These policies are designed to regulate annexation in an efficient and orderly manner and to ensure that areas annexed into the city are compatible with all City policies. Most significantly, the policies are designed to retain the neighborhood char-

acter of the annexed area and the existing city neighborhoods.

Consistency with the San Mateo County General Plan

San Mateo County has jurisdiction over land outside of San Carlos' city limit but within the SOI. The San Mateo County General Plan is the ultimate land use regulation in these unincorporated areas. County land use designations for the Palomar Park area include Low Density Residential (0.3-2.3 DUs/Ac), Medium Low Density Residential (2.4-6.0 DUs/Ac) and Institutional. ~~The~~ County land use designations for the Hassler Area/Pulgas Ridge Open Space Preserve include is Public Recreation, Open Space, and Very Low Density Residential (approximately or slightly less than 0.2 DUs/Ac) and Institutional. Lastly, ~~the~~ County land use designations for the Devonshire Area include Medium Low Density Residential (2.4 - 6.0 DUs/Ac) and is Medium Density Residential (6.1-8.7 DUs/Ac).

General Plan Land Use Designation

This section outlines land use designations for land within the city limit and the SOI. All new development in the city and the SOI, as it annexes into San Carlos, must conform to these designations.

This General Plan defines various land use designations by their allowable uses and maximum densities and intensities. The 19 different land use designations in this Element establish a range of densities and intensities of use in order to provide flexibility for development while still maintaining San Carlos' existing character. The development levels listed here do not create entitlements to a specific number of dwelling units or amount of floor area ratio. Densities on individual parcels may be lower due to site constraints or other City regulations. Table 3-2 (Revised as part of 2045 General Plan Reset) summarizes these designations and provides acreage for each land use designation and Figure 3-2 maps these designations.

The goals, policies and actions contained in this Element provide direction on how the various land use designations should be developed to contribute to the overall character of San Carlos.

The following describes the proposed land use designations for the General Plan Update:

- **Single-Family, 3 du/ac** permits single-family homes at densities of up to three dwelling units per acre.

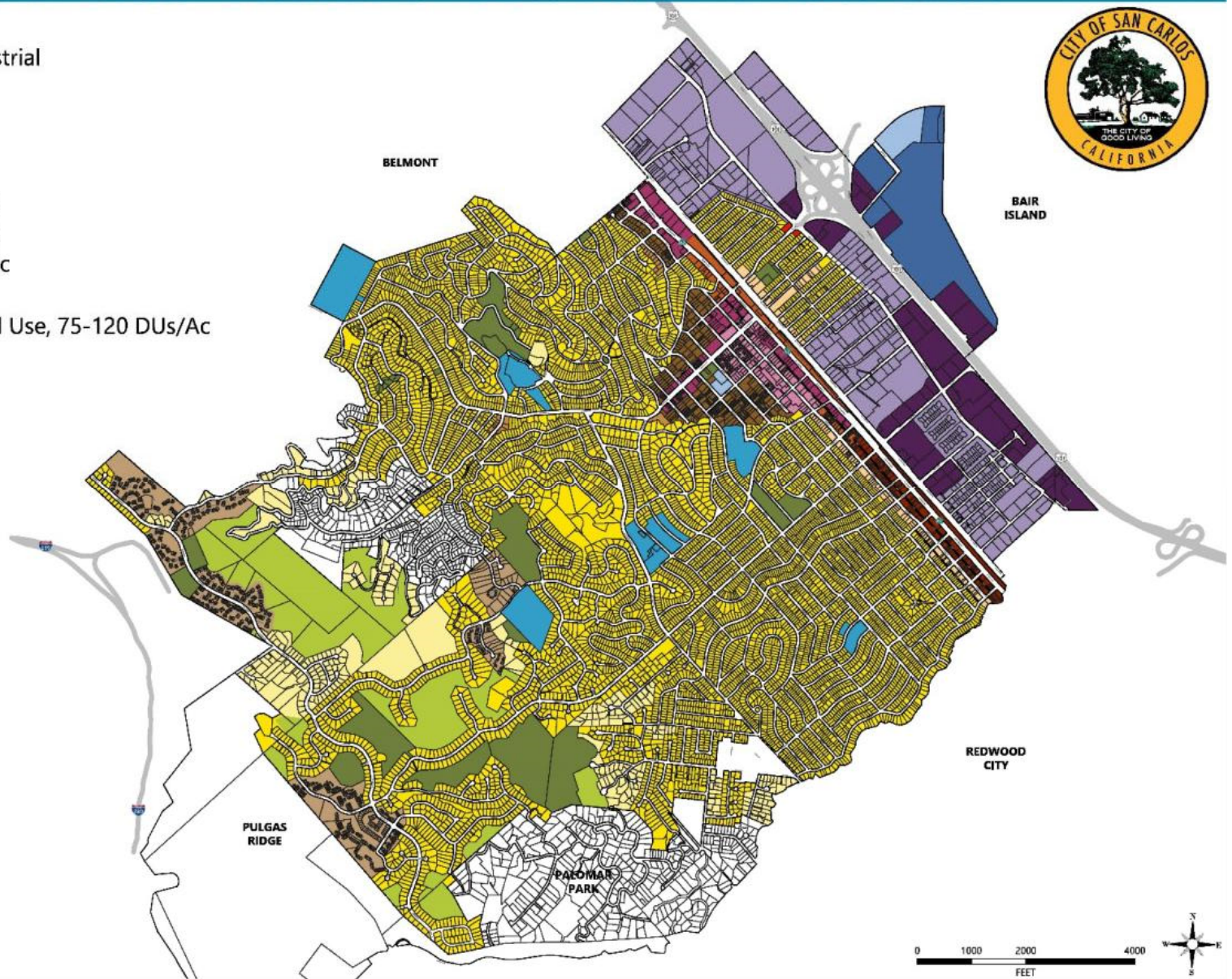
TABLE 3-2 GENERAL PLAN LAND USE DESIGNATIONS WITHIN THE CITY LIMIT

Designation	Acres	Percent
Single Family, 3 du/ac	<u>161.02</u> 158.3	5.7%
Single Family, 6 du/ac	<u>1416.75</u> 1,416.4	<u>50.25%</u> 50.6%
Multiple-Family, 15-20 du/ac	<u>136.06</u> 126.8	<u>4.83%</u> 4.5%
Multiple-Family, 46-59 du/ac	<u>4.49</u> 7.1	Less than 1%
Multiple-Family, 75-100 du/ac	<u>50.88</u> 42.1	<u>1.8%</u> 1.5%
Mixed Use, 30-40 du/ac	<u>20.4</u> 20.6	Less than 1%
Mixed Use, 38-50 du/ac	<u>19.89</u> 18.1	Less than 1%
Mixed Use, 75-100 du/ac	<u>28.26</u> 32.6	<u>1%</u> 1.2%
Mixed Use, 90-120 du/ac	<u>34.29</u> 43.1	<u>1.22%</u> 1.5%
Neighborhood Retail & Mixed Use, 75-100 du/ac	<u>24.32</u> 6.1	Less than 1%
Neighborhood Retail	<u>0.77</u> 0.8	Less than 1%
Planned Industrial	<u>306.68</u> 307.1	<u>10.88</u> 11%
General Commercial – Industrial	<u>118.32</u> 118.7	4.2%
Public	<u>13.47</u> 13.6	Less than 1%
Park	<u>145.51</u> 143.3	<u>5.16%</u> Less than 1%
Open Space	<u>180.36</u> 186.1	<u>6.4%</u> 6.7%
Open Space – Schools	<u>70.98</u> 71.0	2.52%
Airport	<u>87.2</u> 85.4	3.1%
Total¹	<u>2819.65</u> 2,799	100%

May exceed 100% due to rounding.
Source: MIG, 2022 (Revised October, 2024)

CITY OF SAN CARLOS GENERAL PLAN MAP

- Airport
- General Commercial - Industrial
- Mixed Use, 30-40 DUs/Ac
- Mixed Use, 38-50 DUs/Ac
- Mixed Use, 75-100 DUs/Ac
- Mixed Use, 90-120 DUs/Ac
- Multi-Family, 15-20 DUs/Ac
- Multi-Family, 45-59 DUs/Ac
- Multi-Family, 75-100 DUs/Ac
- Neighborhood Retail
- Neighborhood Retail/Mixed Use, 75-120 DUs/Ac
- Open Space
- Open Space - Schools
- Park
- Planned Industrial
- Public
- Single Family, 6 DUs/Ac
- Single Family, 3 DUs/Ac
- City Boundary



JANUARY 2023
Source: City of San Carlos, 2023; CALCAD, 2023



- **Single-Family, 6 du/ac** permits single-family homes at densities of up to six dwelling units per acre.
- **Multiple-Family, 15-20 du/ac** permits multi-family dwellings at densities of 15 to 20 dwelling units per acre.
- **Multiple-Family, 44-59 du/ac** permits multi-family dwellings at densities of 44 to 59 dwelling units per acre.
- **Multiple-Family, 75-100 du/ac** permits multi-family dwellings at densities of 75 to 100 dwelling units per acre.
- **Mixed Use, 30-40 du/ac** permits both commercial and multifamily residential uses at residential densities of 30-40 dwellings units per acre.
- **Mixed Use, 38-50 du/ac** permits both commercial and multi-family residential uses at residential densities of 38-50 dwellings units per acre.
- **Mixed Use, 75-100 du/ac** permits both commercial and multi-family residential uses at residential densities of 75-100 dwellings units per acre.
- **Mixed Use, 90-120 du/ac** permits both commercial and multi-family residential uses at residential densities of 90-120 dwellings units per acre.
- **Neighborhood Retail/Mixed Use, 75-120** permits both commercial and multi-family residential uses at densities of 75 and up to 120 dwelling units per acre. Neighborhood retail without a mixed-use component is permitted under this designation.
- **Neighborhood Retail** permits resident-serving retail and services.
- **Planned Industrial** permits research and development, biotech, light industrial, flex, warehousing and related uses.
- **General Commercial/Industrial** allows all retail, service, office, research and development and industrial uses. This designation offers maximum flexibility to allow the market to determine the mixture of non-residential uses.
- **Public** permits city facilities, utilities, and other public and quasi-public uses.
- **Park** allows for active and passive public parks. Park lands are for outdoor and indoor recreation including playing fields, playgrounds, community centers and other appropriate recreational uses.
- **Open Space** applies to undeveloped park lands, visually significant open lands, water areas and wild-life habitat. Land designated as open space is intended to remain undeveloped in the future. Trails, trail heads and agricultural uses such as 4H are appropriate uses.

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- **Open Space/Schools** applies to public and private schools with a primary planned use of these sites to remain a joint use for school and associated recreation purposes.
- **Airport** applies to the San Carlos Airport and allows airport and aviation-related uses.
- **County Land** includes land outside the city limit, but within the SOI. All County Land is subject to standards and regulations in the San Mateo County General Plan and Zoning Ordinance.

Examples of Permitted Residential Densities

Single Family, Low Density (3 DUs/Ac)



Single Family, (6 DUs/Ac)



Multiple Family, Low Density (10-20 DUs/Ac)



Multiple Family, Medium Density (21-59 DUs/Ac)



Mixed Use, Low Density (10-20 DUs/Ac)



Mixed Use, Medium Density (21-50 DUs/Ac)



Mixed Use, Medium High Density (21-59 DUs/Ac)



What Does Density Look Like?



One of the functions of the land use designations is to establish maximum densities for residential and mixed-use development. Residential densities are typically described as the maximum number of dwelling units per acre. The land use designations in this General Plan allow for residential densities ranging from three dwelling units per acre to 120 dwelling units per acre. To illustrate what development at these densities looks like, photographs of residential and mixed-use buildings at varying densities are provided on this page to the left. It should be noted, however, that building size and shape is constrained by height limits, setbacks, and open space requirements, *not* density. The same size building might have a range of density depending on the number of studios versus 3- to 4-bedroom units, for example.


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San Carlos Economic Development Plan

The City of San Carlos has and will continue to implement the City's Economic Development Plan to guide investments in economic initiatives. This plan is updated approximately every three years. The plan focuses on enhancing the local business climate, improving infrastructure, and fostering public/private partnerships. It also includes land use recommendations, targeting development in areas like Downtown, El Camino Real, and the East Side. All projects under the plan must align with the City's General Plan to ensure consistency.


~~The City developed the 2007 Economic Development Plan to guide the investment in economic development initiatives. The plan aims to enhance the business climate of the city. Some recommendations in the Plan call for the City to focus available funding on infrastructure improvements to increase traffic capacity, attract large to mid plate retail, and improve public/private partnerships. The Plan also includes strategies to channel development in specific areas of town. Land use recommendations of the Economic Development Plan are incorporated in the Land Use Map and goals, policies, and actions for Downtown, El Camino Real, and the East Side area. The Plan is reviewed and updated annually. All projects and activities must be consistent with the adopted General Plan.~~

FOCUS Priority Development Areas (PDAs)



The San Carlos General Plan was prepared with regional land use planning efforts in mind. One of these regional planning efforts is the Association of Bay Area Governments (ABAG) Focus program. The FOCUS program encourages infill development near transit in urban areas throughout the Bay Area. An area with a minimum size of 100 acres, near transit and that have the potential to increase housing and enhance the pedestrian environment are eligible to become a Priority Development Area (PDA). PDAs are eligible for planning grants and technical assistance from the regional agencies. The Railroad Area Corridor, near the Caltrain station along El Camino Real consisting of Planning Areas 1 and 2, is one of 11 designated PDAs in San Mateo County.

Housing Successor Agency



The City of San Carlos is the housing successor agency to the former San Carlos Redevelopment Agency. The majority of City's housing assets were transferred from the former Agency when it dissolved pursuant to the Dissolution Act in 2012 (enacted by Assembly Bills XI 26 and subsequent legislation).

Redevelopment Plan and Planning Areas

~~In accordance with California State Law, each redevelopment agency has a geographically defined "Project Area." A portion of the property taxes from the properties within the Project Area goes to support the activities of the Redevelopment Agency. These redevelopment activities, with some limited exceptions for housing funds, must also occur within the Project~~

~~Area. In 1986, the Agency adopted the Redevelopment Plan for the Project Area. The Project Area is composed of approximately 450 acres of commercial and industrial land uses and is shown in Figure 3-3. Though no residential land uses were present in the Project Area~~

~~and activities must be consistent with the adopted General Plan.~~

East and West Side Specific Plans

Cities and counties in California often prepare "specific plans" to establish detailed policies and standards for a particular geographic area. Prior to the adoption of this General Plan, San Carlos had two specific plans: the West Side Specific Plan and the 1991 East Side Specific Plan. During the General Plan Update process, the contents of these specific plans were reviewed and incorporated into the General Plan as appropriate. This General Plan also includes new policies for these areas. The West Side Specific Plan (which addressed current Planning Areas 1-3) and the East Side Specific Plan (which addressed current portions of Planning Areas 2-3 and all of Areas 4-9) have been officially "retired" from use as City policy documents. This General Plan replaces these specific plans as the policy document to guide growth, conservation and enhancement in these two important areas of San Carlos.

Note: In 2022, the City initiated the development of two specific plans, one in the northeast area and one in the downtown; both of which will be adopted in 2025.

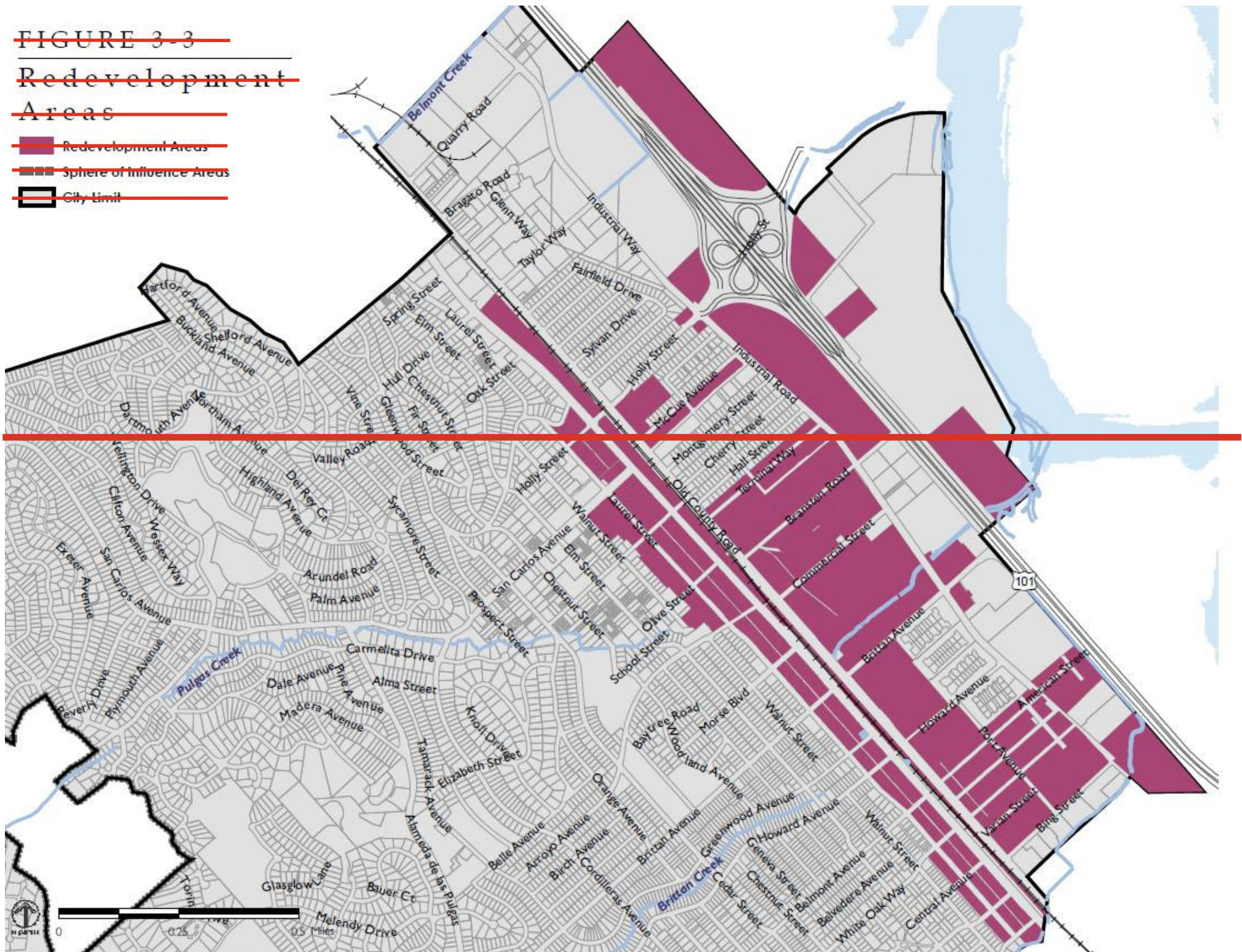
~~at the time it was adopted, some housing has subsequently been developed. The Plan presents the goals and objectives that will guide redevelopment and affordable housing implementation activities in the Project Area; the specific programs, projects and expenditures for the five-year term (2004-05 through 2008-09); an explanation of how the projects will eliminate blight in the Project Area; and an explanation of how the Agency's affordable housing projects and expenditures will implement the low and moderate income housing requirements of the Law. All projects~~



Pedestrian-oriented retail on Laurel Street.

FIGURE 3-3
Redevelopment
Areas

- Redevelopment Areas
- Sphere of Influence Areas
- City Limit





Guiding Principles

The Guiding Principles for the Land Use Element establish a framework for the basic intent of this Element and are a broad statement of overall community value relating to land use in San Carlos. The Guiding Principles are to:

- Provide for land use patterns that promote economic, social and environmental sustainability and enhance the livability and high quality of life for residents, workers and visitors of San Carlos.
- Increase community connections throughout San Carlos through a diversity of measures both physical and social.
- Protect, preserve and enhance natural resources.
- Enhance a unique sense of place and community character with excellent design.
- Provide for a vibrant, diverse and sustainable economy that provides a range of employment and generates sufficient revenue to maintain high quality City services.

Goals, Policies and Actions



GOAL LU-1

Ensure a sustainable land use pattern.

POLICIES

POLICY LU-1.1



Recognize Planning Areas 1, 2, and 3 as the city's Transit Oriented Development (TOD) corridor.

POLICY LU-1.2



Encourage development of higher density housing and support additional job growth within the TOD corridor while being sensitive to surrounding uses.

POLICY LU-1.3







Ensure that development within the TOD corridor maintains and improves the mobility of people and vehicles along and across the corridor.





Denotes synergy with Climate Action Plan


Note: The Climate Action Plan adopted in 2009 was replaced by a new Climate Mitigation and Adaptation Plan (CMAP) adopted on September 27, 2021 (Resolution No. 2021 – 094). The CMAP calls for reducing emissions 40 percent below 1990 levels by 2030 and 80 percent below 1990 levels by 2050.


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- POLICY LU-1.4**  Establish and support the El Camino Real/Caltrain multimodal TOD corridor for the purpose of the mobility of people and vehicles along and across the corridor.
- POLICY LU-1.5**  Support land use patterns in the TOD corridor that will attract and serve riders of public transit.
- POLICY LU-1.6**  Consider reduced parking requirements for multi-family residential and mixed-use projects within the TOD corridor.
- POLICY LU-1.7** Encourage mitigation of parking conflicts between different land uses.
- POLICY LU-1.8**  As San Carlos' Climate Action Plan is updated over time, continue to include land use goals and measures in the


Plan that contributes to a reduction in greenhouse gas emissions.

- POLICY LU-1.9**  To the extent possible, retain the channels, floodplains, riparian corridors (including suitable setbacks from top of bank) and closely associated upland areas of Cordilleras, Brittan and Pulgas Creeks and their tributaries as significant open space areas. These areas should be maintained in their natural state to function as appropriate open space areas, greenbelt and to support a riparian habitat.
- POLICY LU-1.10**  Require that development within the Pulgas, Brittan and Cordilleras Creek watersheds shall preserve watershed integrity, including natural vegetation, soil and slope stability, water quality, scenic values, and potential archaeological resources.
- POLICY LU-1.11** Preserve existing open space by supporting urban infill.


POLICY LU-1.12  Promote the development of publicly accessible urban trails throughout the city to provide access to the natural Environment and facilitate nonmotorized transportation options.


POLICY LU-1.13  Permit shared parking arrangements for commercial and industrial uses in which a single parking area serves different uses that generate peak parking demand at different hours of the day.


POLICY LU-1.14  Support creative, innovative and flexible approaches to parking standards and the provision of parking facilities.


POLICY LU-1.15  Measures of impact to traffic from development may include Level of Service (LOS), Vehicle Miles Traveled (VMT), pedestrian delay, or other measures.

ACTIONS

ACTION LU-1.1  Continue to evaluate the Transportation Demand Management Ordinance to encourage mode shift to reduce vehicular trip generation from new development. ~~Amend the Zoning Ordinance to create a Transportation Demand Management Ordinance that contains strategies to enhance travel patterns and to reduce vehicular trip generation from new development by 20 percent.~~


ACTION LU-1.2  Include in the Transportation Demand Management Ordinance a requirement that new office development over a certain size include showers and safe and secure bike racks to encourage employees to bicycle to work.


ACTION LU-1.3  Adopt and regularly maintain a Climate Action Plan.

ACTION LU-1.4  Consider the adoption of programs to incentivize the establishment of green businesses.

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ACTION LU-1.5 Consider adoption of a lighting ordinance that restricts the type, intensity, and placement of outdoor lighting fixtures in development. New lighting should illuminate properties appropriately and help keep them safe and secure but shall not cause glare or spillover into surrounding properties or negatively affect the night sky.

ACTION LU-1.6  Amend the Zoning Ordinance to address methods to increase shade in surface parking lots, require a standard for tree coverage in new development and promote water efficient landscaping.

ACTION LU-1.7  Encourage redevelopment of current **u r b a n** pathways and as appropriate reacquire urban pathways ceded to residents/owners.

ACTION LU-1.8 Amend the Zoning Ordinance to address the new multiple family and mixed-use designations as part of the 2023 Focused General Plan Update.



GOAL LU-2 Preserve and strengthen Downtown as the civic, cultural and social heart of the city.

POLICIES

POLICY LU-2.1 The downtown is generally defined as Laurel Street from Holly Street to Arroyo Street, including properties west to Walnut Street and the Civic Center.

POLICY LU-2.2 Strive to maintain the character of the historic Downtown core, which is centered at the 1100 and 1200 blocks of San Carlos Avenue and the 600, 700 and 800 blocks of Laurel Street.

POLICY LU-2.3 Encourage development that respects the character of the historic Downtown core.


POLICY LU-2.4 Encourage uses that enhance the vitality of Laurel Street south of the Down- town area.

POLICY LU-2.5 Maintain a mixture of businesses that support the economic viability of Downtown.


POLICY LU-2.6 Support active ground floor uses such as retail, restaurants and services and, on Laurel Street between Holly Street and Eaton Avenue, limit residential uses to upper floors.


POLICY LU-2.7 Encourage residential and other uses in the Downtown Laurel Street area that contribute to the Downtown's vibrancy and activity.

POLICY LU-2.8 Maintain all alleys for public use. Permit exceptions only if doing so will result in a demonstrably superior development project.

POLICY LU-2.9  Continue to allow shared parking between commercial and residential uses.


POLICY LU-2.10 Improve connections between El Camino Real, Old County Road, Industrial Road and Laurel Street to attract additional visitors into the Down- town.


POLICY LU-2.11  Ensure convenient bicycle and pedestrian access to Downtown from surrounding areas and the TOD corridor.

POLICY LU-2.12  Provide for bicycle and pedestrian safety Downtown.

POLICY LU-2.13 Maintain Downtown and Burton Park as the city's central gathering places.

POLICY LU-2.14 Continue to support Downtown community events and civic activities.

POLICY LU-2.15  Provide for and encourage the development of parks and public gathering places in and near Downtown.

POLICY LU-2.16  Ensure adequate accessibility to the Downtown, which may include expanding automobile parking, bicycle parking and public transit.

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POLICY LU-2.17 Within the Downtown, encourage the private assemblage of land parcels.



POLICY LU-2.18 Consider innovative and flexible approaches to parking in the Downtown area.



POLICY LU-2.19 Encourage opportunities for pedestrian linkages from the parking plazas to the streets.



POLICY LU-2.20 Facilitate expansion of public parking in conjunction with the redevelopment of consolidated parcels.



ACTIONS

ACTION LU-2.1 Review the Zoning Ordinance to ensure standards support a vibrant and diverse Downtown.

ACTION LU-2.2 Amend the Zoning Ordinance as necessary to maintain and enhance the character of Laurel Street.

ACTION LU-2.3 Establish a strategy to attract quality retail establishments and mixed-use residential development to Downtown San Carlos.

ACTION LU-2.4 Develop a Civic Center Area Master Plan to program long term uses in the area, such as establishing spaces for community events, programs and gathering, which is consistent and complementary to the Parks Master Plan.

ACTION LU-2.5 Work with the Chamber of Commerce and other business organizations to enhance the success of Downtown businesses.

ACTION LU-2.6 Review Downtown parking standards and amend as necessary to encourage and support a pedestrian-oriented environment while minimizing impacts on adjacent neighborhoods.



ACTION LU-2.7 Evaluate options to increase safe and convenient bicycle access and parking in the Downtown area.



ACTION LU-2.8 Study existing alleys within the Downtown area to define the use of the alley prior to consideration of removal.

ACTION LU-2.9 Examine incentives for private assemblage of parcels within the Downtown area.

ACTION LU-2.10 Examine the viability of converting the 600, 700 and/or 800 blocks of Laurel Street to a more pedestrian-friendly environment.



San Carlos Wine and Art Faire



GOAL LU-3

Promote connectivity and provide retail and services within walking distance of homes and employment areas.

POLICIES

POLICY LU-3.1 Encourage the establishment of “Neighborhood Hubs” within existing residential neighborhoods.






POLICY LU-3.2 Require land use designation and zoning amendments for approval of each new “Neighborhood Hub” proposal.




POLICY LU-3.3 Encourage neighborhood-serving small-scale retail and service uses that promote community health, interaction and socialization of neighborhoods within Neighborhood Hubs such as small stores selling fresh and




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- locally grown produce and basic daily goods, cafés and delicatessens.
- POLICY LU-3.4** Prohibit uses within Neighborhood Hubs that would adversely impact adjacent properties.
- POLICY LU-3.5**  Design Neighborhood Hubs for easy access by bicyclists and pedestrians.
- POLICY LU-3.6**  Locate Neighborhood Hubs in areas ½-mile or greater from existing neighborhood-serving retail and/or another Neighborhood Hub.
- POLICY LU-3.7** Require the design of Neighborhood Hub structures to complement the residential character of its immediate surroundings.
- POLICY LU-3.8**  Require neighborhood design to provide a sense of place, promote casual interaction and enhance overall wellbeing.

Neighborhood Hubs



This Land Use Element includes policies encouraging the development of “Neighborhood Hubs.” Neighborhood Hubs are envisioned as nodes or focal points that offer neighborhood-serving retail and amenities within a reasonable walking distance from adjoining residential areas. These hubs would increase the accessibility of goods and services within existing residential neighborhoods, particularly for the benefit of senior citizens and those with limited mobility. Development within Neighborhood Hubs uses would be subject to clear restrictions to ensure that new commercial development is compatible with surrounding residential neighborhoods. Neighborhood Hubs are only envisioned in the area beyond a ½-mile radius from the Downtown, west of El Camino Real. To establish a Neighborhood Hub, a project applicant would need to obtain approval of General Plan and Zoning Ordinance amendments.

- POLICY LU-3.9** Promote development opportunities for regular physical activity by locating residential developments near services.
- POLICY LU-3.10**  Encourage the creation of safe, walkable environments that include elements such as wide, smooth sidewalks, good lighting, safe crosswalks, clear signage, curb bulbouts, curb cuts, street furniture and trees and traffic-calming measures which allow

people of all ages and abilities to exercise and safely access public transportation, community centers and schools and goods and services.

POLICY LU-3.11 In addition to public sidewalks require internal linkages in between retail developments.



POLICY LU-3.12 Increase the ability for workers in the East Side to walk or ride a bike to retail and service uses by supporting ancillary uses, such as retail and restaurants, in industrial areas.



POLICY LU-3.13 Provide for safe and convenient pedestrian and bicycle connections between residential and commercial areas throughout San Carlos.



POLICY LU-3.14 Require sidewalks, or deferred improvement agreements, for all new and substantially renovated commercial properties on the East Side.



ACTIONS

ACTION LU-3.1 Amend the Zoning Ordinance to establish a Neighborhood Hubs overlay district and standards for structures and uses located within Neighborhood Hubs. Ensure that any potential adverse impacts to neighboring properties are mitigated.

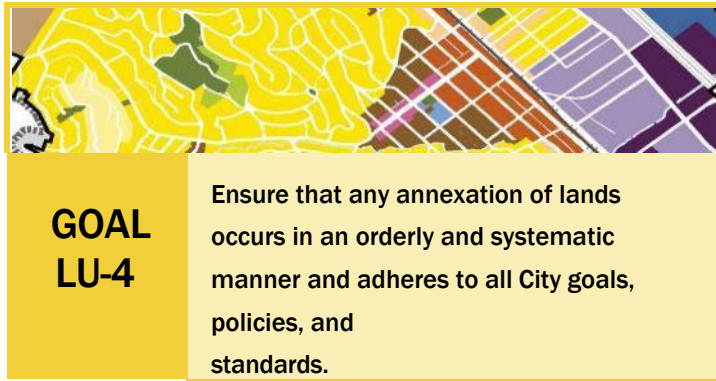
ACTION LU-3.2 Consider development of a Complete Streets policy, setting performance standards and prioritizing implementation steps.

ACTION LU-3.3 Work with SamTrans and other public agencies to provide a public mass transit stop accessible to every home and business in San Carlos.



ACTION LU-3.4 Encourage prominent and secure onsite bicycle parking at retail and service uses.

3 LAND USE ELEMENT



POLICIES

POLICY LU-4.1 To the extent not inconsistent with this General Plan and until such time as the City approves an Annexation Ordinance, the annexation policies of the 1992 General Plan as amended by the August 13, 2001 (Resolution 2001-115, Exhibit B) Amendment to the San Carlos General Plan, shall apply to annexation requests. Policies 4.2 through 4.10 below are the Policy intent for the Annexation Ordinance.

POLICY LU-4.2 Annexation of all or portions of unincorporated residential areas shall

only be permitted when public services and facilities meeting City standards are available to the lands proposed for inclusion in the city. All streets, sewage and drainage systems and police and fire protection must meet City standards. In no case shall the city taxpayer be burdened with paying for additional services for newly annexed lands. Funds for these services shall be generated through property tax revenue, the establishment of special assessment districts or they shall be paid for by the developer/property owner.

POLICY LU-4.3 Annexation of undeveloped parcels shall be in substantial compliance with the following criteria:

- a. The parcels are contiguous to parcels located in the City of San Carlos and contiguous or provisions have been made to become contiguous to city streets.

- b. Require minimum lot size in hillside areas considered for subdivision or annexation to be larger than lots on flat areas to minimize slope instability, erosion and drainage impacts. Lots shall meet, or shall be merged to meet, the minimum lot size established in the subdivision ordinance.
- c. Parcels with development potential of five or more lots shall cluster single-family detached homes ~~utilizing the Planned Community PC zone~~ to the degree feasible. In such cases the density may not exceed the density permitted by the lot size standards of the San Carlos Subdivision Ordinance. Further, the provisions related to portions of the development which must remain ungraded shall apply. Only the lot size requirements may vary. In such cases, the minimum lot size shall be 10,000 square feet.

POLICY LU-4.4 Substandard, undeveloped parcels which do not meet the lot size standards of the City's Subdivision Ordinance will not be supported for annexation to the city.

POLICY LU-4.5 Annexation of developed parcels shall be in substantial compliance with the following criteria:

- a. The parcels are contiguous to parcels located in the City of San Carlos and contiguous to city streets.
- b. The parcels are connected to the city's sanitary sewer system or can be connected to the city's sewer to the satisfaction of the City Engineer.
- c. The structures on the parcels shall comply with the Building Codes in effect at the time the structures were constructed. A Code Compliance evaluation prepared by a licensed Civil Engineering or Architect shall be submitted to the San Carlos Building Department for review and approval prior to annexation.

3 LAND USE ELEMENT



POLICY LU-4.6 Parcels proposed for annexation to the City shall be prezoned.

- a. Undeveloped Residential Parcels.
Parcels with development potential of five or more lots shall be zoned to Planned Development with minimum RS-3 development standards ~~Community (with minimum R-1-LD Development Standards)~~ prior to approval of a Tentative Subdivision Map.
Parcels with development potential of less than five lots shall be prezoned RS-3.
- b. Developed residential parcels and parcels with development potential for nonresidential use shall be prezoned consistent with surrounding and/or like zoning district classifications which represent uses intended for the property. ~~Other parcels proposed for annexation shall be prezoned R-1-LD Low-Density, Single-Family Residential District.~~

POLICY LU-4.7 Prior to annexation of parcels, public services and facilities meeting City standards shall be installed or

provisions for their installation shall have been made to the satisfaction of the City Engineer. Public services and utilities include:

- a. Construction and acceptance of improvements shall be completed prior to issuance of Building Permits or sewer connections.
- b. Construction of streets meeting City subdivision street standards from the terminus of city streets currently meeting City standards to and throughout the subdivision. Where possible and appropriate and subject to environmental, health and safety considerations, rural road standards shall apply. Assessment districts may be used by the developer for installation of portions of the street which is the responsibility of the owner of abutting unimproved lands at the time their development.

POLICY LU-4.8



Annexation of parcels shall be in compliance with City General Plan policies.

POLICY LU-4.9 An environmental analysis under the provisions of the California Environmental Quality Act and a fiscal impact analysis shall be conducted.



POLICY LU-4.10 Allow single existing developed properties which meet all annexation policies, with the exception of minimum lot size requirements, to be considered for annexation and in no circumstances shall such properties be allowed to further subdivide.

ACTIONS

ACTION LU-4.1 Amend the Municipal Code to codify annexation standards for residential, commercial/industrial and other uses.



The Drake Building at El Camino Real and San Carlos Avenue



GOAL LU-5

Support and maintain land uses that contribute to a vibrant and resilient local economy and support the fiscal well being of the City.

POLICIES


POLICY LU-5.1 Maintain a diversity of land uses while achieving the desired transportation level of service.



POLICY LU-5.2 Implement the City's adopted Economic Development Plan, which is updated annually as it relates to supporting the local economy.

POLICY LU-5.3 Support and encourage businesses and land uses that contribute to the City's financial viability.

3 LAND USE ELEMENT

POLICY LU-5.4  Support independent local businesses that serve city residents and visitors that contribute to San Carlos' character.

POLICY LU-5.5 Support organizations that offer lifelong education and workforce-training geared to emerging economic sectors.

POLICY LU-5.6 Strive for a balanced ratio of jobs and housing units.

POLICY LU-5.7 Support high-wage industries that provide quality jobs for workers at all education levels.

POLICY LU-5.8 Encourage retail uses along Laurel Street south of the Downtown to extend and increase the area's economic vitality and support surrounding uses.

POLICY LU-5.9 Encourage new commercial development on parcels fronting Highway 101 to expand the City's tax base and to be of high-quality design.

POLICY LU-5.10 Work with the appropriate business community organizations to identify common goals for strengthening the economy in the city.

POLICY LU-5.11 Continue to require developers to pay their fair share of the capital cost of public facilities through appropriate development impact and utility connection fees.

POLICY LU-5.12 Encourage expediting new business registration applications.

POLICY LU-5.13 Consider use of multiple level parking facilities to provide increased space where available land is limited.

POLICY LU-5.14 Where feasible, ensure that no net loss occurs in the availability of public parking facilities as a result of new development.

POLICY LU-5.15 Promote economic revitalization on underutilized parcels designated for higher intensity land uses.

POLICY LU-5.16 Identify, develop, and implement ~~Redevelopment Agency-sponsored~~ programs and other public/private partnership developments to help facilitate economic development.

POLICY LU-5.17 Encourage the development as well as improvements to the ingress and egress on the following public parking lots~~plazas~~: South Plaza, Williams Plaza, Wheeler Plaza and Clark Plaza. Encourage the consolidation and acquisition of parcels when opportunities become available to expand the public parking lots~~plazas~~, provide improved ingress and egress and improve the efficiency of design.

ACTIONS

ACTION LU-5.1 Continue to review, update and implement the Economic Development Plan as needed to ensure that the City's economic development strategies reflect current market conditions and future projections.

ACTION LU-5.2 Continually monitor the supply of land available for commercial development to support the City's economic development goals.

ACTION LU-5.3 Review impact fees for new development to ensure that fees are appropriate to contribute to the cost of providing public facilities and services.

ACTION LU-5.4 Ensure that new development is not a financial burden on municipal service levels by evaluating the fiscal impact of all new projects and establishing preferences for projects that generate sufficient revenue to offset increased operation and maintenance costs, consistent with other local, state and federal regulations.

ACTION LU-5.5 Routinely review the jobs to housing balance and make recommendations to correct imbalances.

3 LAND USE ELEMENT

ACTION LU-5.6 Study ways for San Carlos to actively attract and retain businesses. Potential methods may include:

- a. Expediting permit approvals.
- b. Providing incentives for property maintenance.
- c. Providing financial and non-financial incentives for businesses to remain in the city.



Commercial development in East Side area



GOAL LU-6

Strengthen the economic vitality of the East Side of the city by encouraging a diversity of commercial uses while protecting and preserving existing industrial uses.

POLICIES

POLICY LU-6.1 Support commercial/ industrial activity and businesses on the East Side.

POLICY LU-6.2 Prohibit the conversion of property designated for industrial/commercial land on the East Side to non-industrial/commercial uses.

- a. Ensure proposed new uses in the East Side do not introduce land use conflicts that would adversely impact industrial/commercial activities.

- POLICY LU-6.3** Support the expansion of key growth industries while maintaining the overall diversity of land uses within East Side employment areas.
- POLICY LU-6.4** Encourage the development of the Landmark sites at the intersection of Industrial Road and Holly Street.
- POLICY LU-6.5** Work with San Mateo County to maintain and enhance the San Carlos Air- port general aviation facility as an eco- nomically significant facility of countywide importance.
- POLICY LU-6.6** Encourage new development on the East Side to feature high quality architecture that reinforces the character of the area.
- POLICY LU-6.7** Maintain and strengthen industrial uses in the inner core of the East Side area.
- POLICY LU-6.8** Strongly discourage the land subdivision of large, existing industrial parcels in the East Side area.

ACTIONS

- ACTION LU-6.1** Study ways for San Carlos to actively attract and retain commercial/ industrial uses on the East Side. Potential methods may include:
- a. Expediting permit approvals.
 - b. Providing incentives for property maintenance.
 - c. Providing financial and non-financial incentives for commercial/ industrial businesses to remain in the city.
- ACTION LU-6.2** Consider providing incentives where appropriate, such as an increased floor area ratio to large-scale industrial development projects that assemble parcels totaling at least 1 acre in area.
- ACTION LU-6.3** Create and implement an ongoing monitoring system to track economic vitality, identify changing conditions and respond rapidly to new economic development opportunities.

3 LAND USE ELEMENT



ACTION LU-6.4 Amend the Zoning Ordinance and develop criteria for the evaluation of new commercial/ industrial condominiums and condominium conversions.

Future Development

This section quantifies the growth that is likely to occur under this General Plan.

Residential Growth

The majority of new housing in San Carlos is expected on infill parcels near Downtown, along the El Camino Real corridor and along Old County Road between Holly Street and Terminal Avenue and along East San Carlos Avenue. These units will mostly be multiple family residences, such as apartments, townhouses, or condominiums. ~~New single-family detached residences will likely occur on vacant parcels, as accessory dwelling units (ADUs), and as rebuilt or remodeled homes in existing single family neighborhoods.~~

An estimate of total housing units, population, and jobs in San Carlos by 2045~~30~~ is shown in Table 3-3. These projections assume densities that are probable given allowable densities, economic forces and likely

development patterns. The General Plan has the potential to result in approximately 8,060 ~~4,900~~ additional residential units to be built within San Carlos' city limit between 2045~~30~~-2045~~31~~

TABLE 3-3 HOUSING, POPULATION AND JOB GROWTH UNDER THE GENERAL PLAN

	Existing 20 <u>40</u> 8	Increase By 20 <u>30</u> 20 <u>45</u>	Total 20 <u>30</u> 20 <u>45</u>
Housing Units	<u>12,700</u> 12,318	<u>8,060</u> 4,900	<u>20,770</u> 17,218
Population	<u>29,350</u> 28,857	<u>15,620</u> 3,446	<u>44,510</u> 32,303
Jobs	<u>28,930</u> 19,288	<u>18,010</u> 9,165	<u>46,950</u> 28,453

Source: ~~Department of Finance, Economics Research Associates and DC&E. Housing and Population Updated: 2022, City of San Carlos, Department of Finance, and MIG. PlaceWorks, 2024.~~

Non-Residential Growth

The General Plan will also accommodate growth in commercial, office, ~~mixed-use, research and development,~~ and industrial land uses. Table 3-4 shows the projected gross square footage ~~increase-change~~ in commercial, office, ~~mixed-use, research and development,~~ and industrial uses from 2024 to 2045 ~~2008 to 2030~~ for this General Plan. Most of the commercial ~~office~~ growth is expected to occur in the Downtown area ~~and~~

along El Camino Real, Old County Road, Brittan Avenue and Industrial Road. Most of the office growth is expected in the Downtown and Northeast areas. Industrial Research and development growth would be primarily located limited to the East Side area of San Carlos east of El Camino Real.

TABLE 3-4 COMMERCIAL, OFFICE, RESEARCH AND DEVELOPMENT, AND INDUSTRIAL GROWTH UNDER THE GENERAL PLAN

	Existing Conditions 20240	Projected Growth 2045 General Plan 2030	Percent Change 20240- 204530
Commercial*	772,800 2,084,557	959,500 2,808,587	24 6%
Office	1,462,500 904,423	1,806,200 1,476,429	24 39%
Research & Development	5,647,900	10,576,000	87%
Industrial	4,580,800 6,192,078	5,361,800 8,333,255	17 26%

Community Character and Urban Design

This section includes an overview of San Carlos' existing urban design characteristics. It also includes goals, policies and actions to guide new development as the city continues

to evolve over time. By examining the built environment in San Carlos, one can better understand the ways in which the city has developed as well as the opportunities that are present to guide future development. This understanding will help direct future improvements to the city's character and built form.

City Identity

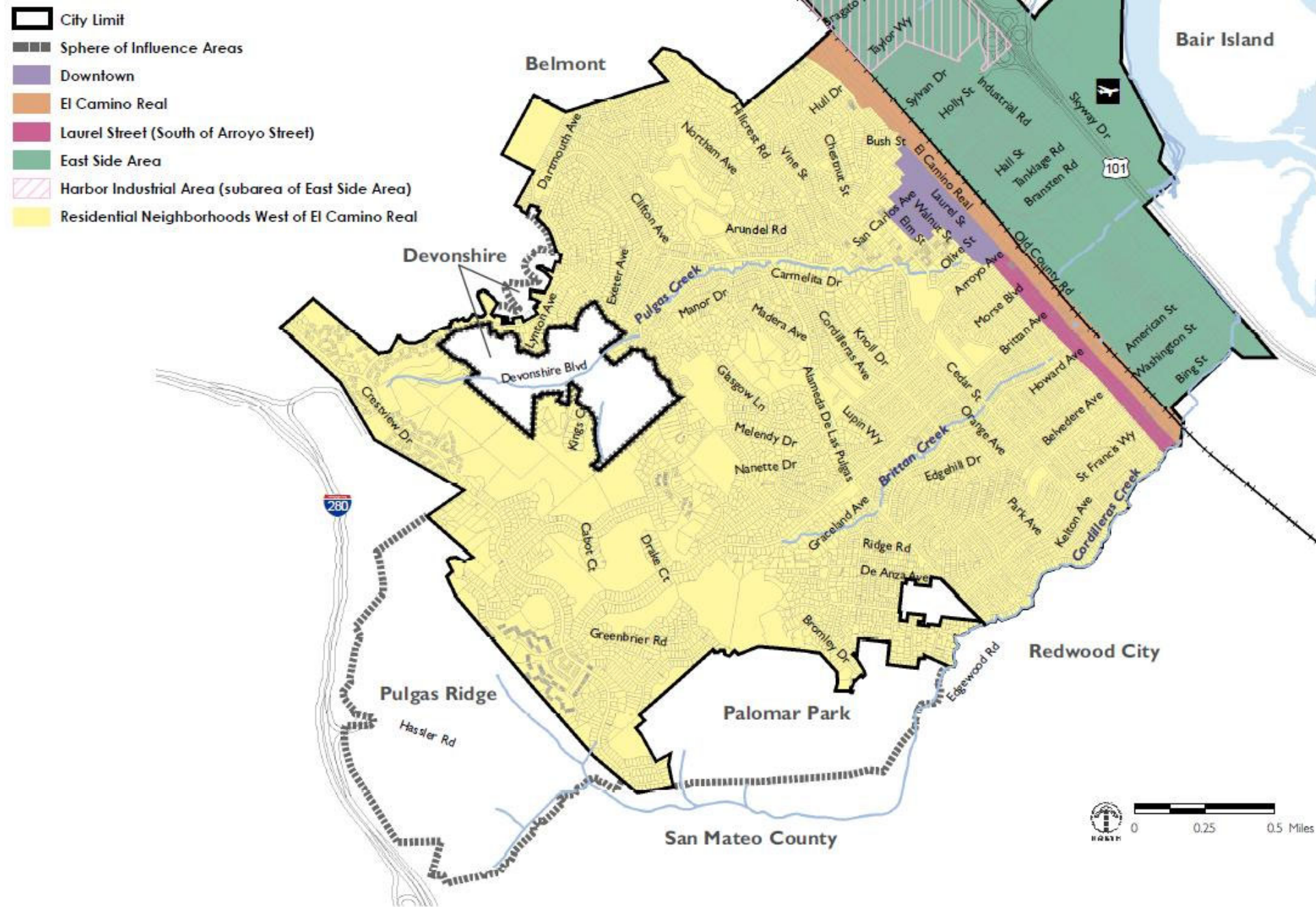
San Carlos is a community with a strong sense of place and a distinct hometown feel. These characteristics are due in part to the mixture of uses in the city – the residential neighborhoods, commercial districts, industrial areas and parks and open space. All of these areas possess their own unique identities but also interact in ways that make San Carlos a vibrant and dynamic place to live, work and visit.

Major Key District Characteristics Developed Areas in San Carlos

The city has been divided into a series of five geographic areas because each area has a unique character and a distinctive land use pattern. These areas, illustrated in Figure 3-43, include the major developed areas in San Carlos as described below.

FIGURE 3-3

Major Developed Areas in San Carlos



Downtown and Historic Downtown Core Area

Downtown is defined as Laurel Street from Holly Street to Arroyo Street including properties west to Walnut Street and the Civic Center. The historic Downtown Core Area is centered at the 1100 and 1200 blocks of San Carlos Avenue and the 600, 700 and 800 blocks of Laurel Street. Laurel Street is a pleasant pedestrian environment with a grid street pattern, pedestrian amenities and attractive landscaping. Laurel Street Park is centrally located in the Downtown area and offers people a place to gather and visit. The street width supports a pedestrian environment and is in scale with the surrounding buildings. The alley between Laurel Street and El Camino Real minimizes curb cuts along Laurel Street and allows service vehicles to access businesses from the rear of the buildings.

Buildings of varying heights, typically one to two stories, with traditional storefronts are generally built to the sidewalk and address the street. The picturesque Downtown is an important visual resource for residents, workers and visitors in San Carlos.

Laurel Street (South of Arroyo Street)

Laurel Street, south of Arroyo Street to Eaton Avenue, differs from the Downtown. Although the buildings are of similar height, one to two stories, storefronts along this portion of Laurel Street are broken up by mixed-use residential and residential buildings. Storefronts are mostly active along the street with the presence of ground floor retail, however the residential units interspersed along the street interrupt the continuity of these active uses. As in the Downtown portion of Laurel Street, an almost continuous alley between Laurel Street and El Camino Real reduces curb cuts along Laurel Street and provides access for service vehicles at the rear of buildings. Parking is mostly limited to parallel and diagonal parking along Laurel Street, though there are a few parking lots behind buildings and fronting Laurel Street.

Development on the east side of Laurel Street, between Belmont Avenue and White Oak Way, is oriented towards El Camino Real. Key building facades fronting Laurel Street have no windows or entrances which creates a block of blank walls with little visual interest.

3 LAND USE ELEMENT



South Laurel Street has limited spaces to gather and has no public open space such as a plaza or pocket park. Trees and landscaping are intermittent along this portion of the street. The corridor has few curb cuts and a relatively narrow street which helps create a pedestrian environment. However, more active street fronts and street amenities such as benches could enhance the walkability of the area. This area includes many important community, business and personal support services and convenience uses. Uses include retail, restaurants and offices as well as multi-family residential uses.

El Camino Real

The El Camino Real corridor is a linear commercial area with a diverse range of uses including auto- related businesses, lodging, restaurants and miscellaneous small businesses. Although it is a regional transit corridor serving the San Mateo Peninsula, El Camino Real is largely automobile oriented. The visual quality of the area is dominated by automobiles and businesses catering to automobile drivers. Parking lots, large signs and single-story buildings predominately define the visual character of the corridor, although there are a few older, multi-store buildings

built to the sidewalk. The train tracks also run parallel to El Camino and the majority of the land between the tracks and the road is vacant. The elevated railroad tracks present a physical barrier and obstruct views on the east side of El Camino Real. Landscaping is minimal and there are few pedestrian amenities along the corridor. However, recent development activity on El Camino Real demonstrates the potential for this corridor as a ~~transit-oriented~~multi-modal area suitable for increased residential and mixed-use development. The Grand Boulevard Initiative, which is a collaboration of other cities and agencies in San Mateo and Santa Clara counties, serves to guide development on El Camino Real to improve mobility along the corridor.

East Side Area

The East Side area includes 600 acres of land in the eastern portion of the city. The area is defined by the city limit to the north, east and south and the railroad tracks to the west. Initially, this area was the site of small industrial firms including manufacturing, repair—ing, building supply uses, service businesses and housing which arose after World War II. In the 1990s, the uses in the East Side area began to transition and new uses including research and development space, computer hardware and software, telecommunications, medical research and biotechnology firms moved to the area,

reflecting San Carlos' location in the northern portion of Silicon Valley. Many of the businesses were established along American, Central and Washington Streets. Additional businesses, such as Lucky Grocery Store, Home Depot and Hollywood Video later developed along the western edge of the East Side area.

The East Side area is bisected by Highway 101. The area east of Highway 101 includes the San Carlos Air- port, SamTrans bus storage facility, the Hiller Aviation Museum, two-story office buildings, limited freeway-oriented lodging and restaurant buildings and a solid waste transfer station and recycling facility. Large parking areas separate uses. The automobile is the dominant mode of transportation in the area.

Since 2015, the City of San Carlos has experienced an unprecedented amount of private sector investment, including business and employment growth in the life sciences and biotechnology sectors in the area of East Side defined by Holly Street, Brittan Avenue, Old County Road, and Highway 101. To plan for these changes, the City Council adopted the East Side Innovation District Vision Plan in October 2021. A Specific Plan is currently underway for the San Carlos Northeast Area, near the border of Belmont and the City of San Carlos.

Harbor Industrial Area

The Harbor Industrial area (HIA), located between the city limit to the north, Highway 101 to the east, Old

County Road to the west and as far south as Holly Street on the eastern edge, is a subarea within the East Side area (Figure 3-4). This subarea comprises large manufacturing businesses, biotechnical and biomedical firms and light and heavy industrial uses. The majority of the area (from Belmont Creek to north of Holly Street) was annexed in 1997 after a petition for annexation was received from over 80 percent of the property owners in the HIA. The balance of the HIA to the north remains unincorporated under a compromise known as "ABC" reached between the Cities of San Carlos and Belmont and the HIA property owners in 1997. The ABC compromise requires San Carlos or Belmont to meet certain conditions in order to annex the remaining unincorporated portions of the HIA. The portion of the HIA that was annexed to San Carlos conforms to both County and City industrial zoning regulations. Existing land use regulations strongly discourage housing, commercial, retail and non- industrial uses in this area.

San Carlos Airport

The East Side area is the site of the 160-acre San Carlos Airport, located east of Highway 101, along the bay shoreline. The San Carlos Airport is located on land owned by the County of San Mateo and managed by the County Public Works Department. Private planes are

3 LAND USE ELEMENT



the primary users of the airport and are utilized for both business and recreation. The airport also allows private jets under 12,500 pounds to land and take off at any time, but certain activities such as student training are voluntarily limited to daytime to meet noise abatement requirements. The airport houses around 500 aircraft and is the place of business for over 25 aviation-related businesses. Other airport services include emergency response functions such as Air-Ambulance, Medivac flights and law enforcement patrols.

The San Carlos Airport is also the home of the Hiller Aviation Museum. The museum was founded by helicopter pioneer Stanley Hiller Jr. in 1998. The museum includes a large collection of aviation history spanning the past 30 years and is an exciting destination for adults and children.

Residential Neighborhoods East of El Camino Real

There are two residential neighborhoods in the East Side area, between Old County Road and Industrial Road, both north and south of Holly Street. The neighborhoods are predominantly comprised of one- or two-story single-family homes set back from the narrow residential streets. These neighborhoods have abundant street trees and a strong sense of neighborhood.

Laureola Park is a major focal point of one of the residential neighborhoods.

Residential Neighborhoods West of El Camino Real

The character of residential neighborhoods in San Carlos is diverse. Adjacent to Downtown and Laurel Street are older residential areas with traditional grid street patterns, higher densities, historic homes and a mixture of housing types. Relatively old and established street trees, pre-World War II buildings and attractive streetscapes create the visual character in this neighborhood.

Residential areas on the south end of the city (adjacent to Redwood City) are characterized by one- and two-story single-family homes with tree-lined streets. Homes are set back from an elongated, suburban street grid pattern and are a mix of one and two stories.

The western portions of San Carlos, west of Alameda de las Pulgas, contain residential neighborhoods that are integrated into picturesque and often dramatic hill-side terrain. In these areas, streets follow the contours of the hills, with many multi-story hillside homes appearing as single-story residences from the street. The far western portion of the city, near Brittan and Crest- view Avenues, features single-family homes and condominiums with commanding views of the San

Francisco Bay and the East Bay. Much of the development of this far western portion of the city occurred by clustering residential sites and large areas of private open space which add to its rural character.

Devonshire Canyon

Located in the western part of the city, Devonshire Canyon is unincorporated land under the jurisdiction of San Mateo County, surrounded on all sides by San Carlos. Devonshire Canyon is characterized by single-family homes located within exceptionally scenic hilly terrain. Most houses are located in flatter canyon floor areas, with the steeper areas largely but not completely undeveloped. Roads in Devonshire Canyon are extremely narrow and winding and generally do not have sidewalks. Upper branches of Pulgas Creek are also located in this area and provide scenic riparian corridors.

Commercial/Residential Interfaces

A key goal of the Land Use Element is to ensure that new development is designed to be sensitive to adjacent uses, particularly residential neighborhoods. One way to achieve this goal is to design the sides of new building projects that front residential neighborhoods to be compatible with the ~~scale and~~ character of existing well-established neighborhoods in accordance with the City's Objective Design Standards.

~~The illustration below shows how a conceptual downtown mixed-use project could be designed to be compatible with an adjacent single-family neighborhood. In this example, retail uses, upper level residential flats and the majority of the building mass are fronting the Downtown street. The portion of the building adjacent to single family homes on the residential street features lower density, lower heights and architectural details that are more residential in character. Portions of the building fronting single family homes could also feature rowhouse style units with stoops and individual entries fronting the residential street.~~

Views

San Carlos has varied topography which ranges from land at sea level to the hilly western portion of the city with elevations up to 900 feet. The hillsides and ridgelines that comprise the city's diverse landscape provide a rich array of scenic resources and afford numerous vantage points from which scenic vistas can be enjoyed.

Views of the surrounding open space and San Francisco Bay can be accessed in many areas west of Alameda de las Pulgas, including City parks and open space and existing residential neighborhoods.

Gateways

Creating aesthetically pleasing gateways is an important component of land use planning and community design that contributes to a city's character and sense of place. Gateways are locations that announce to a visitor or resident that they are entering the city or a unique neighborhood within the city. Features associated with gateways can include signs, structural elements such as towers or fences or walls, landscaping, architecturally significant buildings and natural features such as a row of trees. Gateways often feature Landmark structures. A Landmark is an element by which people orient themselves and can help create a unique identity for an area. Examples of visual landmarks include statues, major works of public art, historic buildings, water towers, significant landscaping or landforms and other easily identifiable features.

Gateways in San Carlos have been classified into two categories: primary and secondary. Primary gateways are the major regional entry points into the city on roadways or transportation routes. Secondary gateways are more local entry points into the city from nearby cities including Belmont and Redwood City. The best example of a primary gateway is at San Carlos Avenue and El Camino Real. This gateway is

characterized by the Caltrain transit hub and historic Train Depot and the architecturally unique and historic Drake Building. This gateway has a prominent architectural signage feature that indicates the entrance to Downtown San Carlos. Combined, these features give the visitor a sense of arrival into Downtown.

However, the majority of primary and secondary gateways do little to announce arrival to a unique area. Holly Street at US Highway 101 and Industrial Road is the primary access route from Highway 101 to San Carlos.

High traffic volumes and a mixture of land uses, including residential, industrial and commercial, do not effectively announce to visitors their entrance to San Carlos even though a small monument feature is installed. The primary and secondary gateways are identified in Table 3-5. The location of each gateway is shown in Figure 3-~~54~~.

TABLE 3-5 PRIMARY AND SECONDARY GATEWAYS IN SAN CARLOS

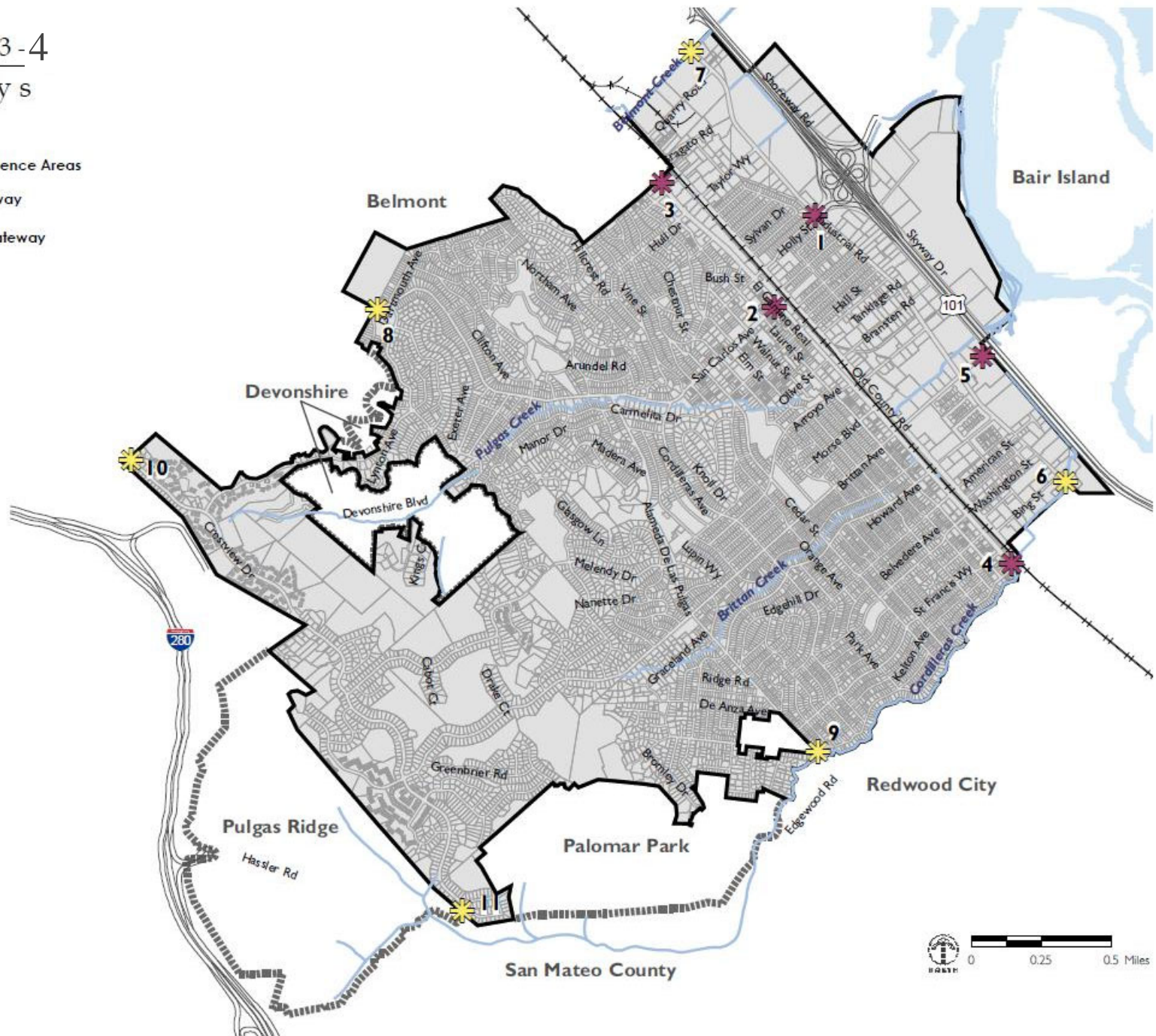
Map ID	Gateway
Primary Gateways	
1	Holly Street east of El Camino Real
2	San Carlos Avenue at El Camino Real
3	North El Camino Real
4	South El Camino Real
5	Brittan Avenue at Highway 101
Secondary Gateways	
6	Industrial Road at the San Carlos/Redwood City city limit
7	Industrial Road at the San Carlos/Belmont city limit
8	North Alameda de las Pulgas
9	South Alameda de las Pulgas
10	North Crestview Drive
11	South Crestview Drive



Hillside residential development

FIGURE 3-4
Gateways

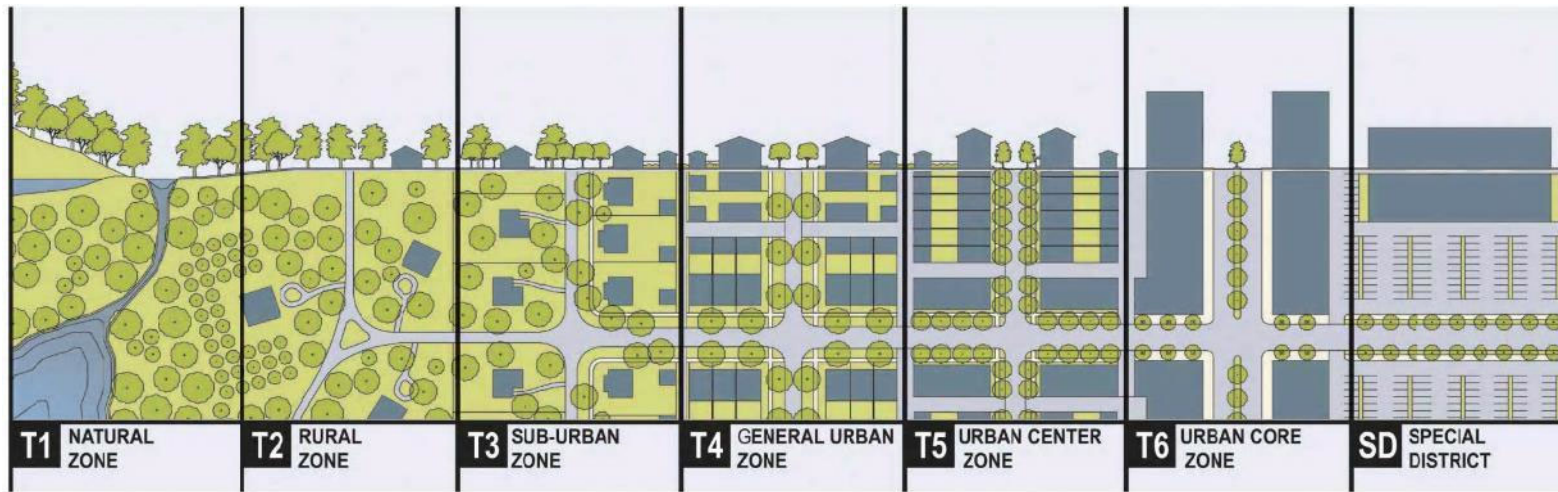
-  City Limit
-  Sphere of Influence Areas
-  Primary Gateway
-  Secondary Gateway



Form-Based Codes and the Urban to Rural Transect

Action 8.1 calls for San Carlos to prepare a form-based code as a tool to implement urban design-related policies in this General Plan. Form-based codes are different from conventional zoning ordinances in that they focus primarily on the physical form and character of development and de-emphasize use regulations. Form-based codes also include development standards that graphically illustrate required massing and placement of buildings. Form-based codes are an effective tool to create mixed-use, walkable and compact development that is sensitive to existing development and supports a vibrant, pedestrian-oriented community.

Form-based codes are typically based upon an urban planning concept known as the rural-to-urban transect (“transect”). At its essence, the transect concept features a series of zones transitioning from natural open space to a dense urban core. The transect concept maintains that only certain types of streets, building types, building forms and civic spaces are appropriate in each zone. In San Carlos, distinct transect zones might range from a Downtown zone (most dense) to low density single-family and open space zones (least dense). The diagram below illustrates the concept of the transect.




Source: Duany Plater-Zyberk & Company, 2009

Goals, Policies and Actions

These goals, policies and actions address the visual appearance and character of the built environment and are intended to maintain and enhance San Carlos' sense of place and the quality of life of its residents. These urban design principles should be applied to individual buildings and to larger development projects, to new development as well as the redevelopment of existing areas.




Laurel Street with hillside homes in background



**GOAL
LU-7**


Promote the community character of San Carlos, including the unique village character of Downtown.

POLICIES

- POLICY LU-7.1**  Support development and improvements to infrastructure that increase physical and social connections between the neighborhoods of the city.
- POLICY LU-7.2** Actively encourages and promote a balanced development pattern that provides opportunities for community connections and social interaction.
- POLICY LU-7.3** Provide for a downtown scale of development that is compatible with San Carlos' unique village character.

- POLICY LU-7.4** Respect the visual prominence of important city landmarks, gateways and destinations.
- POLICY LU-7.5** Consider the inclusion of public art as part of development projects.
- POLICY LU-7.6** Encourage and support meaningful public involvement in San Carlos City government where active nongovernmental organizations can thrive.
- POLICY LU-7.7** Support the arts and encourage the development of cultural amenities that may enrich San Carlos.

ACTIONS

- ACTION LU-7.1**  Continue to implement the City's adopted Bicycle and Pedestrian Master Plan adopted on June 9th, 2020 and update the Master Plan as needed. Prepare a community study to seek new ways to enhance walkability and connect all areas of the community. The current Bicycle Transportation Plan could be

~~expanded to be a Bicycle and Pedestrian Transportation Plan.~~

- ACTION LU-7.2** Revise the Zoning Ordinance to address the importance of public and private open space opportunities as part of all new development review, considering scale, size, location and context of the development.
- ACTION LU-7.3** Revise the Zoning Ordinance to establish a zoning district for existing parks and open space lands and amend the zoning map accordingly.
- ACTION LU-7.4** Study methods to establish diverse, reliable and stable funding sources for public art.
- ACTION LU-7.5** Encourage new and existing commercial development to incorporate accessible roof gardens, public plazas, public courtyards and passageways, landscaping, public art and other desired public amenities beyond those specified during the normal City review process.

3 LAND USE ELEMENT



POLICIES

POLICY LU-8.1 Require all development to feature high quality design that enhances the visual character of San Carlos.

POLICY LU-8.2 Ensure that new development sensitively transitions to the character of adjacent structures and the immediate neighborhood.

POLICY LU-8.3 Encourage design features and amenities in new development and redevelopment, including, but not limited to:



- a. Interconnected street layout.
- b. Clustering of buildings.

- c. Landscaping on each lot.
- d. Visual buffers.
- e. Facilitation of pedestrian activity.
- f. Distinctiveness and variety in architectural design.

POLICY LU-8.4 Promote pedestrian-scaled design through site planning, building design, finish details and landscaping for all types of development by requiring height and locational transitions between buildings of varied levels that are sensitive to the interrelationships of surrounding uses and structures, especially residential.

POLICY LU-8.5 Optimize architectural quality by encouraging the use of quality materials, particularly as accents and authentic detailing, such as balconies and window trims.

POLICY LU-8.6 Encourage new commercial development to provide outdoor areas and landscaping and tree canopy to enhance the surroundings.



POLICY LU-8.7 Require new residential development to provide outdoor areas and landscaping or native vegetation, or tree canopy to enhance the surroundings.



POLICY LU-8.8 Encourage design of convenient pedestrian walkways with shade and minimal tripping hazards, preferably with landscape buffers between roadways and walkways.



POLICY LU-8.9 Encourage the design of attractive outdoor pedestrian spaces that encourage impromptu public gathering places with features such as plazas, interior walkways and paseos, ornamental gates, trellises, lighting, trees and landscaping, seating and fountains.

POLICY LU-8.10 On all sides of buildings, require the incorporation of quality architectural

design elements for all building façades and stepping back upper floors in order to reduce bulk and mass and to break up monotonous wall lines.

POLICY LU-8.11 Discourage abrupt changes in building scale. A gradual transition between low-rise to mid-rise buildings should be achieved by using the low-rise buildings at the edge of the project site. Consider the relationship of buildings to the street, to one another and to adjacent structures and land uses, especially single-family residential.

POLICY LU-8.12 Require residential building entrances to be related to the street.

POLICY LU-8.13 Require parking areas associated with development to be located and designed to minimize visual impact to the greatest extent feasible. This may include locating parking behind buildings street frontage, below grade, or screening through the use of natural landscaping.

POLICY LU-8.14 Encourage construction of parking areas with permeable materials where appropriate.

POLICY LU-8.15 Require the undergrounding of all utilities, or a deferred improvement agreement, in conjunction with new construction and encourage the undergrounding of existing utilities where feasible.

POLICY LU-8.16 Require high quality signage through design, use of materials and colors compatible with and complementary to the architectural character of the building(s) and surroundings.

POLICY LU-8.17 Require telecommunications and utility facilities to be sensitively placed, shielded, screened or lessened from view to the greatest extent possible through design review.

POLICY LU-8.18 Encourage “green building” practices in new development and redevelopment, such as those that make a building more energy efficient



and reduces its effect on human health and the environment through better siting, design, construction, maintenance, and operation.

POLICY LU-8.19 Residential and mixed-use structures shall be designed to be compatible with existing structures in the vicinity, minimize obstructing views from adjacent structures or views of community importance, minimize interference with the right or ability to use solar energy and be consistent with the Objective Design Standard~~community design principles~~.

POLICY LU-8.20 Require all new residential multi-family residential, commercial and industrial projects subject to design review by the appropriate decision-making body for compliance with site planning, architecture, signing and landscaping criteria prior to approval, as permitted by State law.

POLICY LU-8.21 Utilize railroad corridor development and design guidelines¹ unless an action conflicts with other parts of the General Plan.

ACTIONS

ACTION LU-8.1 Adopt a form-based zoning code to emphasize building placement, the framing of public space and promoting a pedestrian-oriented environment.

ACTION LU-8.2 Review and amend existing residential design guidelines and create commercial design guidelines as needed.

ACTION LU-8.3 Amend the Zoning Ordinance to limit the height of building walls at the street-facing property line to two stories on the 600, 700 and 800 blocks of Laurel Street. Additional stories may be permitted if they are stepped back a

minimum distance from the ground-level building wall.

ACTION LU-8.4 Review and amend the Sign Ordinance as needed.

ACTION LU-8.5 Develop objective design standards consistent with State law and amend the Zoning Ordinance and create a Planning Division application submittal checklist to require information and materials that accurately and sufficiently demonstrate a project's compliance with new objective design standards.

ACTION LU-8.6 Research and consider the adoption of a new outdoor lighting ordinance. A lighting ordinance would restrict the type, intensity and placement of outdoor lighting fixtures of development. A lighting ordinance would permit appropriate illumination, improve security, would limit glare or spillover into surrounding properties and would protect the night sky.

¹ In accordance with Sections 4.800-4.933 of Resolution Number 2003-79.

3 LAND USE ELEMENT



**GOAL
LU-9**

Protect and enhance all residential neighborhoods.

POLICIES

- POLICY LU-9.1** Maintain and enhance neighborhoods to be safe and attractive.
- POLICY LU-9.2** Support resident-driven neighborhood efforts that strengthen identity and protect and/or enhance neighborhood character and complement the principles, goals, policies and actions of the General Plan.
- POLICY LU-9.3** Assure that redevelopment, public or private, mitigates any negative traffic and parking impacts on or adjacent to residential neighborhoods.

- POLICY LU-9.4** Mitigation measures shall be utilized to the greatest extent feasible for neighborhoods surrounding new proposed development.
- POLICY LU-9.5** Require buffering, screening, transitional standards, or other measures for new and expanded multi-family residential, mixed use, and/or commercial/industrial developments adjacent to single-family residential neighborhoods to minimize impacts and compatibility conflicts.
- POLICY LU-9.6** Encourage the location of support facilities such as schools, parks and churches within or near residential neighborhoods.
- POLICY LU-9.7** Encourage the development of community gardens to provide opportunity for interactions and increase residents' access to healthy foods.
- POLICY LU-9.8** Encourage developers of new or expanded multi-family residential projects to include gardening spaces for

residents of the development as part of the landscaping requirement.

POLICY LU-9.9 Encourage the design of development to minimize the obstruction of significant views of the San Francisco Bay, the western hills, or other significant natural vistas to the greatest extent possible.

POLICY LU-9.10 On school and formerly school sites, allow low and moderate income rental housing units made available to local educational employees, local public employees, and then general public at densities and development standards in accordance with AB2295, 2022.

POLICY LU-9.11 Require and monitor adequate parking and/or parking alternatives for new schools, parks and other public uses within residential neighborhoods.

POLICY LU-9.12 Ensure that development in residential areas is compatible with neighborhood character.

POLICY LU-9.13 Require appropriate transitions of building scale, massing and height to adjacent single-family homes.

POLICY LU-9.14 Legally nonconforming multi-family residential structures located within multi-family residential zoning districts may be replaced, restored, or rebuilt and used consistent with the Zoning Ordinance in effect at the time of the replacement, restoring, or rebuilding.

POLICY LU-9.15 In prioritizing uses for in-kind benefits or bonuses offered by a project developer, uses benefiting the neighborhood in which the development is occurring shall be considered.

POLICY LU-9.16 Require a contribution of parkland and/or fees in-lieu of land dedication as a condition of approval of all new residential subdivisions.

3 LAND USE ELEMENT



POLICY LU-9.17 Require exterior building materials to be non-combustible in areas of potential high fire hazard.

POLICY LU-9.18 Continue the City's program of joint use of school recreation facilities as a means of providing adequate recreation space for San Carlos citizens.

POLICY LU-9.19 As lands are subdivided, encourage dedication of trail and path easements where appropriate to expand the City and County's trail and path system.



POLICY LU-9.20 Conversion of existing rental housing stock to condominiums shall be permitted only when it can be shown that:

- The vacancy rate in rental units in the city is in excess of 5 percent.
- Adequate provisions are made for the protection of tenants including relocation assistance.

POLICY LU-9.21 Consider allowing public school districts and local private schools to provide affordable housing units on school or school-related sites concurrent with continued school operations.

ACTIONS

ACTION LU-9.1 Update development standards and use regulations in the Zoning Ordinance for consistency with the General Plan.

ACTION LU-9.2 Amend the Zoning Ordinance to include objective design standards, transitional design standards for multi-family residential buildings and commercial uses adjacent to single-family homes, as appropriate.

ACTION LU-9.3 Update development standards to allow single-family attached, multiple-family detached, and/or multiple-family attached affordable housing units to be constructed and maintained concurrent with school operations on school or school-related sites.



POLICIES

- POLICY LU-10.1** Require minimum lot size in hillside areas considered for subdivision or annexation to be larger than lots on flat areas to minimize slope instability, erosion and drainage impacts.
- POLICY LU-10.2** Require development in hillside areas to be designed into the natural features of the hillside including topography, trees, vegetation, landforms and drainage channels.
- POLICY LU-10.3** In hillside areas, encourage houses to be oriented to the natural topography of the site.

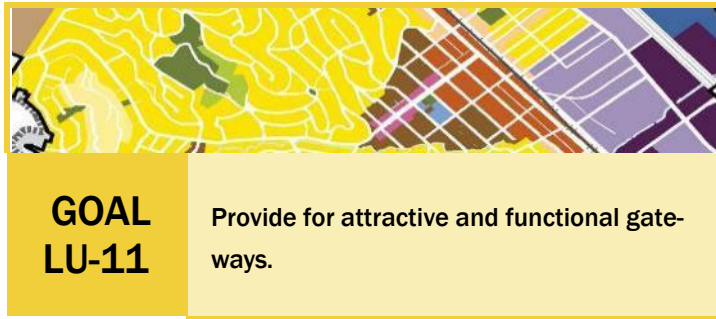
POLICY LU-10.4 Design and locate roads, utilities and other infrastructure to reasonably minimize impacts on the hillside environment. Design should respect the natural topography, produce the least visual impact and require the least grading while remaining consistent with public health and safety standards.

POLICY LU-10.5 Minimize grading and removal of earth material in hillside areas to the greatest extent possible.

POLICY LU-10.6 Require all new development and significantly modified development in the High and Very High Fire Susceptibility Zones to install and maintain fire prevention design and materials in accordance with Building and Fire Codes at the time of the construction/reconstruction.


ACTIONS

ACTION LU-10.1 Consider the development of Hillside Development Guidelines, including the development of lot size and cross slope standards.



POLICIES

- POLICY LU-11.1** Require high quality design for buildings at visually significant locations in gateway areas.
- POLICY LU-11.2** Encourage design features, such as landscaping, art and displays in gateway areas that are welcoming, attractive and contribute to a unique sense of place.
- POLICY LU-11.3** Encourage distinctive architectural features, such as tower elements or a plaza at building entry, for buildings located at visually significant locations within gateway areas.

- POLICY LU-11.4**  Ensure that building placement, frontage treatments and landscaping enhance the pedestrian experience and increase accessibility within gateway areas.
- POLICY LU-11.5** Limit the visibility of surface parking within gateway areas through landscaping and architectural treatments such as low decorative walls or trellises.
- POLICY LU-11.6** Discourage the use of sound walls within gateway areas. If sound walls cannot be avoided, ensure that sound walls are designed to be attractive and well landscaped.
- POLICY LU-11.7** Require roadway improvements in gateway areas that enhance automotive, bicycle and pedestrian circulation.
- POLICY LU-11.8** Place a special emphasis on the preservation of architecturally significant buildings within gateway areas.

POLICY LU-11.9 Ensure that new development on the Landmark sites at the northeast and southeast corners of Holly Street and Industrial Road function as the primary gateway features for the Holly Street Gateway area. Site planning, building treatments, pedestrian improvements and landscape features shall exhibit exceptional design and respect integrity of adjacent uses including nearby residential properties.

POLICY LU-11.10 Consider placing street enhancements, such as welcome signage, at major entrances to the city and residential areas as shown on the Gateway Map in Figure 3-5.

POLICY LU-11.11 Ensure that new development or redevelopment on the northwest and southwest corners of Holly Street and Industrial Road complies with the policies set forth in Land Use Goal 5.

POLICY LU-11.12 Develop welcoming gateway areas that emphasize the unique qualities of San Carlos.

POLICY LU-11.13 Study and evaluate options for improving circulation on Holly Street between Industrial Road and El Camino Real, working with the public, in particular the residents of Holly Street.

ACTIONS

ACTION LU-11.1 Develop design guidelines for development and improvements within gateway areas to enhance community character. These guidelines should promote architectural styles, landscape, street furniture, public art and signage that are in keeping with the aesthetic values of San Carlos.

Cultural and Historical Resources

Existing Conditions

The City of San Carlos has a rich historical legacy dating back to prehistoric times. Remnants of the early inhabitants are limited as there are only a few known archaeological sites in the city located primarily near the banks of Cordilleras and Pulgas Creeks. San Carlos' existing historic character is defined by its more recent cultural resources.

Archaeological Resources

Archaeological data for San Carlos and San Mateo County is largely missing due to urbanization. There are documented prehistoric archaeological deposits near the banks of Cordilleras and Pulgas Creeks where such items as burned mammal bone and chert flakes were found. There is more information known about the Ohlone Indians who inhabited the area beginning around 500 AD. Their territory extended from Monterey Bay to San Francisco Bay. However, due to Spanish settlement in the 18th century, much of the information known about the various Ohlone tribes is from a European perspective. There is little physical evidence of their settlement in San Carlos.

Museum of San Carlos History and the San Carlos Villagers

The Museum of San Carlos History, located at 533 Laurel Street, has a collection of artifacts, photographs and documents relating to the history of the city. The collection includes Native American artifacts such as a grinding stone, photos of early San Carlos life, information on the city and memorabilia from San Carlos High School and past Chickens' Ball events. The Museum also serves as a source of information for research on local families and historic properties in the city.

The San Carlos Villagers serve as Museum docents and handle the day-to-day affairs of the Museum. The San Carlos Villagers were formed in April 1949 to preserve the history of San Carlos and were appointed as Museum docents by the City Council in 1981. Villagers collect documents, photos and memorabilia that reflect San Carlos' rich background and safeguard it for future generations. The Villagers are composed of volunteers from the community and any resident of San Carlos is invited to become a Village.

Historic Architecture and Urban Design:

The early development pattern of San Carlos began in the late 1800s with the construction of the San Carlos Train Depot in 1888. Lot sizes and expanded and widened streets, including San Carlos Avenue were established following the 1906 San Francisco earthquake. Another period of expanded infrastructure and development of housing occurred in 1917. As development moved westward, 1924 marked the creation of the Devonshire Hills subdivision on a 1,400-acre site. This subdivision used principles from the Garden City urban planning movement, established dogleg cul de sacs and pass-through walkways. Bungalow architecture later gave rise to English Tudor and Spanish Eclectic styles found in and near the Downtown. The city has many fine examples of late 19th and early 20th century architecture. These buildings are documented in the city's 1991 Historic Resources Inventory. Two of the city's historic resources are listed in the National Register of Historic Places as noted below.

Historically Noteworthy Properties

San Carlos has two listings in the National Register of Historic Places, the nation's cultural resource inventory. The Southern Pacific Depot at 559 El Camino Real is one listing on the National Register.

Leland Stanford assisted with construction of the train depot by providing materials, Italian stonemasons, and members from his architectural staff to design and build the structure. Built in the unique Richardson Romanesque style, the depot is one of San Carlos' most prominent architectural landmarks. The other listing, located at 125 Dale Avenue, was built by Nathaniel Brittan, son of John Brittan, in 1872. Nathaniel was a member of the San Francisco Bohemian Club and often hosted club members at this three story octagonal "folly" Victorian home.

Existing Preservation Plans and Policies

In 1990, a group of volunteers identified and researched the historic resources in San Carlos. The volunteers' efforts led to the creation of the 1991 Historic Resources Inventory. The inventory contains 52 listings which include residential and commercial structures and one public park. For descriptive purposes, the inventory also identifies two historic districts - the Hacienda Gardens Apartments at 1315 San Carlos Avenue and the 1000 Block of Elm Street between Morse Boulevard and Brittan Avenue. Hacienda Gardens, constructed in 1931, was the first apartment complex in the city.

3 LAND USE ELEMENT

Built in the Spanish Eclectic style, the apartments were well suited for the suburban commuter and are an indicator of development trends during the Great Depression. The 1000 block of Elm Street, which consists of structures mainly built between 1926 and 1929, represents a mixture of architectural styles including Spanish Eclectic and Tudor Revival. A noteworthy characteristic of the houses on the street is the general intactness. It is also a symbol of a major period of development in the city.

Although these resources are highly valued by the City, San Carlos has no historic preservation ordinance, nor formal designation. Protection of historic resources is provided through the California Environmental Quality Act (CEQA), which requires that any potential impacts to historical properties be sufficiently evaluated, but does not necessarily prohibit demolition of or damage to a potentially historically significant property.



Early development in San Carlos



Residential street in Laureola Neighborhood

Goals, Policies and Actions



**GOAL
LU-12**

Protect San Carlos' historic and cultural resources to maintain and enhance a unique sense of place.

POLICIES

- POLICY LU-12.1** Evaluate historical, cultural, and tribal cultural re—sources early in the development re—view process through consultation with interested parties.
- POLICY LU-12.2** Foster the preservation, restoration and compatible reuse of architecturally and/or historically significant structures and sites.
- POLICY LU-12.3** Ensure that modifications to identified historic resources are consistent with the U.S. Secretary of the Interior's Standards for the Treatment of Historic Properties.

- POLICY LU-12.4** Encourage continued use and adaptive reuse of designated historic resources through application of the U.S. Secretary of the Interior's Standards and Guidelines for rehabilitation, reconstruction, and restoration.
- POLICY LU-12.5** Treat with respect and dignity any human remains discovered during implementation of public and private projects within the city and fully comply with the California Native American Graves Protection and Repatriation Act and other appropriate laws.
- POLICY LU-12.6** Promote the maintenance, restoration and rehabilitation of historical resources through but not limited to the use of Federal Rehabilitation Tax Credits, State incentives including the Mills Act and the California Cultural and Historical Endowment and the California State Historical Building Code.
- POLICY LU-12.7** Use public art to enliven and beautify the public realm at appropriate locations.

3 LAND USE ELEMENT



POLICY LU-12.8 Retain the exterior architectural character and setting of the Historical San Carlos Depot and San Carlos Museum (former San Carlos Fire House).

ACTIONS

ACTION LU-12.1 Ensure thorough compliance with the provisions of the California Environmental Quality Act (CEQA) relating to potential impacts to cultural, ~~and~~ historical, and tribal cultural resources.

ACTION LU-12.2 Apply for Certified Local Government status to become eligible for participation in federal and State historic preservation programs.

ACTION LU-12.3 Update the city's inventory and map of historic and architecturally significant properties and landmarks every five years.

ACTION LU-12.4 Develop a cultural landmark and historic preservation plan and supporting ordinances.

ACTION LU-12.5 Develop and implement a Public Arts Action Plan.

ACTION LU-12.6 The City of San Carlos shall develop mapping to indicate areas in the City with archaeological sensitivity and guidance documentation for public and private construction projects that involve ground disturbance activities in areas with archaeological sensitivity. The requirements may include 1) an archeological records search, 2) construction training for cultural sensitivity, and 3) procedures if archaeologic resources are discovered.



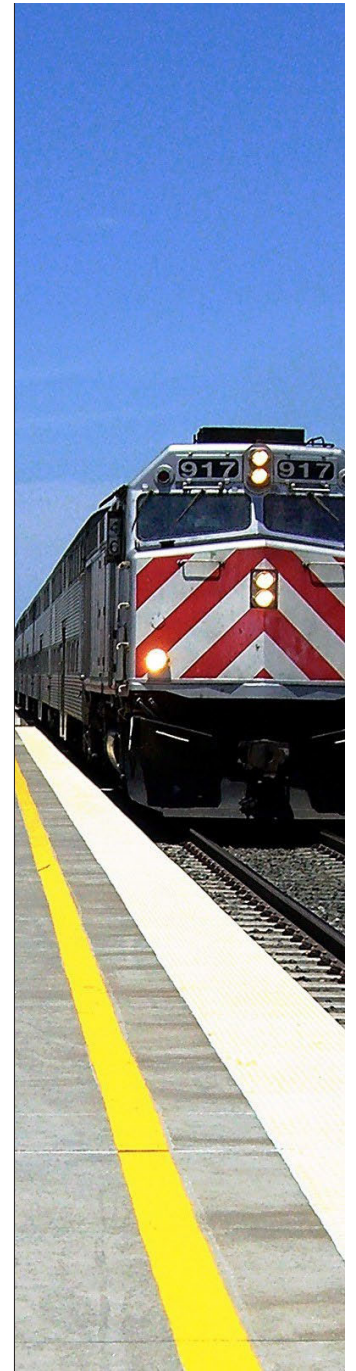
Drake Building

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Circulation and Scenic Highways Element 5



SAN CARLOS
GENERAL PLAN



The Circulation Element describes facilities for the efficient transportation of goods and the safe and effective movement of people throughout the City. It includes a plan of the streets and highways plus facilities for pedestrian, bicycle, rail and air transportation.

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- 92 Scenic Highways
- 95 Goals, Policies and Actions



Introduction

Purpose

The location and appropriate size of roads for the private automobile and public bus are important to San Carlos residents. Adequate facilities for other transportation modes help reduce dependence on the auto mobile as a method of reducing traffic congestion, improving safety, reducing pollution, promoting energy conservation, promoting health and increasing accessibility for all residents.

The Scenic Highways Element deals with identification and protection of the scenic qualities of major road corridors. The San Carlos Scenic Highways Element describes a system of selected roads with adjacent scenic corridors and a set of implementation policies establishing a program for protection and enhancement of scenic qualities within these corridors. The Plan involves State, County and local scenic highways and

roads, and as such represents the local component of the regional scenic highway system.

Relation to Other Elements

The Circulation Element is primarily related to the Land Use and Housing Elements. Circulation routes must consider the accommodation of public utilities, the intensity and pattern of land use and the provision of local connections along designated points for access and safety. Transportation routes must be sensitive to employment locations and concentrations of residential groups to be served.

The Scenic Highways Element is primarily related to the Land Use Element and secondarily related to the Environmental Management and Parks and Recreation Elements.

The Circulation and Scenic Highways Element was updated in 2005 and amended in 2008. It has been re-formatted for integration into the 2030 General Plan. Goals, objectives and policies are formatted and numbered consistent with the 2030 General Plan numbering system and as goals, policies and actions.

Circulation System

The streets and highways in San Carlos may be divided into four classifications: freeway/state highway, arterial street, collector street and minor street. Freeways and State highways are the primary responsibility of the California Department of Transportation. As such, the geometries and cross-section design of these facilities are largely determined by that agency.

The street system within San Carlos is structured around arterial streets, which often carry the larger volume of traffic around, rather than through residential districts, commercial districts and industrial districts. The arterials are fed by collector streets which act to collect traffic from minor streets within each of the districts. Usable road width, sight distance and travel speed generally increase as one moves from minor streets to more important travel routes. A local system of curved streets with offset intersections is considered preferable to the standard grid system. Curved residential streets help prevent through traffic and add character to the neighborhood.

Overall, the amount of total traffic is expected to increase in direct proportion with increased population.

Table 5-1 shows the normal range of traffic capacity on through streets in terms of average daily traffic.

TABLE 5-1 TRAFFIC CAPACITY RANGE

Type	Volume (ADT)	Lane
Highway	20,000 per lane	4-10
Arterial	10,000 – 30,000	2-4
Major Collector	5,000 – 10,000	2
Collector	5,000	2

Freeways and State Highways

San Carlos is situated between two major freeways: U.S. 101 and Interstate 280. U.S. 101 and Interstate 280 are major north-south links between the Cities of San Francisco and San Jose. U.S. 101 is a significant source of noise affecting the community. Interstate 280 is a state-recognized scenic route. El Camino Real (State Route 82) traverses the city parallel to the railroad tracks in a northwest-southeast direction. The highway functions as an inter-city traffic facility with adjacent highway commercial uses. Within San Carlos, El

Camino Real should have a minimum of four lanes for moving traffic and a median divider with left turn stacking lanes. Left turn lanes should be spaced to guide traffic to arterial and collector streets as well as the Central District. Site and building design, landscaping and control are extremely important considerations on adjacent properties. Land uses should continue to be highway commercial oriented.

A southbound off- and on-ramp now connects Brittan Avenue with U.S. 101. This added partial interchange helps provide access to the San Carlos industrial area and relieves congestion at the Holly Street/U.S. 101 interchanges by allowing traffic to enter the industrial area at Brittan Avenue.

A full cloverleaf exists at the Holly Street/U.S. 101 interchange.

Arterial Streets

Arterial streets comprise the major network of streets within the community. Their function is to link residential, commercial and industrial districts with the freeways and highway system, to provide convenient access to other transportation facilities and to act as the

major emergency service and evacuation routes. Arterials are typically two- to four-lane streets having some controls over parking and access points. The arterials also perform the important function of acting as north- south routes should the freeway system be blocked to emergency vehicles. As San Carlos has no east-west highways, they also serve as primary east-west routes.

Frequently there are serious conflicts between the land-service and traffic-service functions of arterial streets. If the land adjacent to the arterial is intensively used, the conflict is hazardous and the accident potential is high. The traffic function of arterials, that of moving relatively large volumes of vehicles, is most important. Land access is its secondary function. For this reason driveways and intersections should be kept to a minimum.

Arterial streets should be designed to carry two to four moving lanes of traffic.

The City has completed several street modifications and improvements designed to accommodate traffic in the Holly Street/Brittan Avenue/Howard Avenue corridor:

ARTERIAL STREETS IN SAN CARLOS

Arterials	Number of Lanes
Alameda de las Pulgas	2-4
Brittan Avenue	2-4
Crestview Drive	2-4
Holly Street	2-4
Crestview Drive	2-4
Howard Avenue (Laurel Street to Industrial Road)	2-4
Industrial Road	4
Laurel Street	2
Old County Road	2
San Carlos Avenue	2-4
Shoreway Road	2

1. Widened and added turn lanes to the El Camino Real, Old County Road and Industrial Road intersections with Holly Street.

2. Constructed a Holly Street grade separation at Old County Road/Railroad/El Camino Real. This grade separation provides for increased safety and congestion reduction for increased rail commuter service during peak hours.
3. Constructed southbound off- and on-ramps at Brittan Avenue and U.S. 101. Widened Brittan Avenue from U.S. 101 to El Camino Real and constructed a grade-separation at Brittan Avenue and Old County Road/Railroad/El Camino Real. The Brittan Avenue grade separation also includes a grade separation at Howard Avenue and Old County Road/Railroad/El Camino Real.

Circulation System

Arterial Streets

Additional improvements will be necessary on Holly Street/Brittan Avenue/U.S. 101 intersections and roadways for increased interchange capacity and improved access to and from U.S. 101.

1. At the Holly Street/U.S. 101 Interchange, widen the eastbound to northbound on-ramp loop to two

lanes, eliminate the northbound to westbound off-ramp loop, widen the northbound off-ramp to two lanes and install a traffic signal for westbound traffic.

2. Widen eastbound Holly Street approaching Industrial Road by 10 feet for a distance of 205 feet to increase the length of the three-lane segment from 115 feet to 320 feet.
3. Widen Brittan Avenue to add an approximately 400-foot dedicated left-turn lane eastbound approaching Industrial Road.

Collector Streets

Collector streets are of less importance than arterials but should still be designed to carry through traffic. These facilities, as their name implies, have the prime purpose of collecting traffic. Their function is to transfer traffic from local generators (residential neighborhoods, schools and employment centers) and minor streets to arterials. The design of collector streets should reflect this emphasis on carrying traffic. They should be two-lane streets and protected from cross traffic. Local streets should avoid crossing a collector, T-intersections are preferred and good sight distance at

intersections is necessary. Collector streets should not form a continuous system; otherwise there will be a tendency to use them as arterials.

COLLECTOR STREETS IN SAN CARLOS

Collectors	Number of Lanes
Arroyo	2
Beverly Drive/Windsor Drive/Torino Drive	2
Cedar Street	2
Club Drive	2
Cordilleras Avenue	2
Devonshire Avenue	2
Devonshire Boulevard	2
Easton Avenue	2
Elm Street	2
Hillcrest Road/Shelford Avenue/Wellington Drive	2
Howard Avenue	2
Melendy Drive	2
St. Francis Way	2

Local Streets Local streets are used to provide access to abutting property, locations for easements, open space for light and air and a firebreak between buildings. Carrying traffic is a secondary function of local streets and they should be designed to discourage through traffic. Local streets are an important element in community design. These facilities provide a permanent framework for building and landscaping. Local streets are typically two-lane facilities with direct access to abutting properties. On-street parking should be provided wherever topographically possible and should consider the integration of sidewalks and bicycle lanes

Streets and Sidewalk Standards

Local conditions may necessitate modification and flexibility of street and sidewalk standards where topography, location, or other conditions warrant. Detailed standards for street and sidewalk improvements, including street trees and landscaped strips are set forth in San Carlos Subdivision Ordinance and Standard Details.

Traffic Volume and Intersection Service Levels

The City shall employ Level of Service (LOS) metrics for Non-CEQA transportation analysis and Vehicle Miles Travelled (VMT) metrics for CEQA transportation analysis. The City's Transportation Study Guidelines (Resolution No. 2024XX-118XXX) provides more information on the methodologies and analysis requirements. Updated traffic volume estimates for the eastern portion of the city were derived in 2001 and have been incorporated into this document. The level of service of an intersection can vary from "A" free flow through "F" forced flow jammed as defined in Table 5-2. The intersection counts and volume/capacity ratios were based on peak traffic volume (typically between 4:00 and 6:00 p.m. in San Carlos). Traffic volumes are presented in forms of Average Daily Traffic (ADT).

With the passage of California Senate Bill (SB) 743 in 2013, beginning July 1, 2020, public agencies are required to use vehicle miles travelled (VMT) metrics, rather than level of service (LOS) metrics, to address CEQA transportation-related impacts. However, the city continues to maintain LOS as a metric in evaluating non-CEQA transportation analysis.

TABLE 5-2 — LEVEL OF SERVICE (TRANSPORTATION RESEARCH BOARD)

Level of Service (LOS)		Volume to Capacity Ratio (V/C)
A	Free Flow	Less than or equal to 0.60
B	Stable Flow (Slight Delay)	0.61 — 0.70
C	Stable Flow (Acceptable Delay)	0.71 — 0.80
D	Approaching Unstable Flow (Tolerable Delay)	0.81 — 0.90
E	Unstable Flow (Congestion; Intolerable Delay)	0.91 — 1.00
F	Forced Flow (Jammed)	Greater than 1.00

Circulation

Holly Street – Brittan Ave./U.S. 101 Access

San Carlos currently has two accesses to U.S. 101 at Holly Street and Brittan Avenue within the city limit. Harbor Boulevard in Belmont and Whipple Avenue in Redwood City also provide a means of access to the community from the Bayshore (U.S. 101) freeway. The Holly Street interchange consists of a full cloverleaf and a six-lane over-crossing. Approximately 12,000 cars per day enter the city via the Holly Street interchange.

Between the Ralston Avenue and Whipple Avenue interchanges, average daily traffic on U.S. 101 is approximately 220,000 vehicles. U.S. 101 is currently operating at a LOS F in both directions at peak hours.

Changes and intensification of land use can contribute to a reduction of level of service to unacceptable levels. In 2007, a level of service, under cumulative conditions, analysis was conducted for buildout allowed by projected growth and planned projects. It was determined that several intersections, under future conditions, would operate at unacceptable levels of service.

Cumulative traffic from foreseeable projects will result in the intersections along Holly Street/Brittan Avenue/U.S. 101 to function at the following service levels (Table 5-32).

TABLE 5-23 INTERSECTION LEVEL OF SERVICE

<u>Intersection</u>	<u>AM Peak Hour</u>	<u>PM Peak Hour</u>
El Camino Real/Holly	B	D
Old County Road/Holly	B	D
Industrial/Holly	D	F
Brittan/Industrial	F	D

Source: Palo Alto Medical Foundation San Carlos Center, Addendum to the EIR, July 2007, Appendix B. SCH# 2003062086,

Road improvements to the Brittan Avenue/Industrial Road intersection, Holly Street/Industrial Road intersection and the Holly Street/U.S. 101 Interchange would reduce cumulative impacts to a less- than-significant level. Improvements described in the discussion of Arterial Streets (above) to the Holly Street/Brittan Avenue/Hwy 101 intersections and roadways will be necessary to return intersections to acceptable levels. Measures which require a fair share of the cost of mitigation, for the traffic generated by the impacts of development, should be considered by the City.

Parking

Adequate off-street parking is necessary to relieve traffic congestion in San Carlos' commercial, industrial and residential areas. All new developments should provide for adequate off-street parking to avoid residential impacts and encourage the use of alternate transportation. As development intensifies or land uses change, an off-street parking problem could develop. Some possible solutions might include expansion of the parking plazas, changed parking time controls, or alternative transportation systems.

Facilities for the Disabled

State law requires that extra wide parking spaces be provided for disabled persons at locations near the entry to public buildings and business developments. Curb ramps at street intersections designed to facilitate wheelchairs should be provided and made conditions of project approval for new developments where feasible.

Pedestrian Facilities and Trails

Pedestrian sidewalks should be installed in those areas where new development occurs. Sidewalks might not be appropriate in those areas where their inclusion would be inconsistent with prior development in the surrounding area.

A local trails system is part of San Carlos' circulation system. This planned trail system partially exists in the Western Hills area and is being expanded by the City's Trails Committee and Parks and Recreation Department.

Bicycle Facilities

Two regional level bike trails are located outside of the city limit to the west in the San Francisco Watershed property and to the east through Redwood Shores. The two regional systems as well as the main bike trails through San Carlos are consistent with the San Mateo County "Bikeways Plan."

Standards for bike routes in San Carlos are those adopted by the California Department of Transportation. In general, the bike route designations in San Carlos consist of roadway striping to provide separate bike lanes and signing. Wherever possible, bike paths separating bicycles from vehicular traffic are considered desirable. The City's Bicycle/Pedestrian Advisory Committee has been combined with the Traffic and Transportation Commission to form a new Commission called the Transportation and Circulation Commission, who is working on updating the Bicycle Transportation Plan.

Transportation Demand Measures (TDMs)

Through both local and regional implementation of TDM Programs, the City intends to address traffic congestion problems by effectively managing future commercial and residential growth. The following sections describe in detail the City's Transportation Systems Management Strategies.

Regional Efforts

The City of San Carlos endorses the City/County Association of Governments of San Mateo County (C/CAG) Congestion Management Program requiring vehicle trip reduction measures for projects generating a net 100 or more peak-period trips in the Congestion Management Program network.

Local Policies

In addition to regional efforts, San Carlos has local policies designed to reduce the vehicle trips generated by development. These policies are outlined in this document.

Transportation Facilities

Transportation facilities provide for the movement of goods and people generally along fixed routes and on a fixed schedule in contrast to the circulation system of roads for private automobiles and trucks which

permit random movement. Three modes of transportation are readily available to San Carlos: rail, road and air.

Rail Facilities

Rail service to San Carlos consists of the railroad line from Gilroy to San Francisco. The railroad provides both consumer and freight services through the city. A significant portion of San Carlos residents work in San Francisco, north San Mateo County, San Jose, or Santa Clara County. Significant energy savings, safety improvements and pollution reduction result from those who use the commuter trains rather than driving private automobiles.

Public Bus

The San Mateo Transit District provides inter-county bus services to all of the cities of Bayside San Mateo County. Local service is available to parts of San Carlos and commuter service is available via express routes along Bayshore Freeway.

Air

The San Mateo County Airport at San Carlos is a general aviation facility located in the eastern portion of the city. The airport is primarily oriented to private planes used for business and pleasure. For international flights, San Carlos residents rely on the San

Francisco, Oakland and San Jose International Airports. These airports can be reached by San Carlos residents in three ways; 1) by private vehicle, 2) by SamTrans and VTA buses, and 3) Caltrain through its connection with BART.

Scenic Highways

Scenic Roads and Corridors

The Scenic Highways portion of this Element is a plan for the development, establishment and protection of scenic roads of State, regional and local value. View sheds from scenic roads are an important resource to San Mateo County and to San Carlos for both aesthetic and recreational values. It is common for persons to select travel routes for visual amenities as well as for consideration of travel time and operating speeds.

Scenic corridors can best be defined as the visual land area outside the road right-of-way and generally described as the “view from the road.” It is within this area that development standards are applied to retain and enhance scenic qualities and restrict unsightly use of the land. These standards may include architectural and site review procedures and regulations on building setbacks, signs, grading, tree removal and undergrounding of utility lines.

In 1963, the State of California adopted a Master Plan for scenic highways which defines the system of scenic highways for State growth. In San Mateo County, four routes are included in the Master Plan. They are the Cabrillo (Coast) Highway (State Route 1); Skyline Boulevard (State Route 35); Half Moon Bay Road, west of Interstate Route 280 (Route Map 92); and Junipero State Freeway (Interstate Route 280). This system of State roads in San Mateo County constitutes the greatest length of scenic highway mileage in all of the nine Bay Area Counties and acknowledgment by the State of the abundance of scenic attributes which exist in San Mateo County. However, inclusion in the State Master Plan does not automatically designate a road an official State scenic highway; it merely indicates that the road qualifies for official designation and so may receive an official designation if a specific scenic corridor is defined for the roadway and a plan and program for protecting scenic resources within the corridor area adopted. If the scenic corridor and regulatory controls adopted by a jurisdiction are satisfactory to the State, the county roads or State highways are then officially designated as State scenic highways.

This Scenic Highways Element specifies roads within the State Master Plan in the vicinity of San Carlos and, also, City and County roads with significant scenic value.

State Scenic Highway

Junipero Serra Freeway (Interstate 280). This State freeway extends the entire length of the county from Daly City to Menlo Park (28.5) miles. Designed as the world's most beautiful freeway, this highway traverses the foothills of the Peninsula between San Francisco and San Jose. Sweeping panoramic views of the Bayside and the San Francisco Watershed property are visible from four vista points adjacent to the roadway. The highway was designed to blend with its natural surroundings and two of its bridges have won national awards for excellence of design. This road is included in the State Master Plan for scenic highways.

County Scenic Highways

Edgewood Road. Edgewood Road is located immediately adjacent to the San Carlos planning area connecting Alameda de las Pulgas with Cañada Road and Interstate 280. The rural nature of the area through which this road passes, its scenic views and surrounding land use warrant inclusion as a scenic road. Edgewood Road passes the Hetch Hetchy Aqueduct right-of-way, the Pulgas Ridge Regional Open Space and the Edgewood County Park site.

Cañada Road. Cañada Road is located westerly of the San Carlos planning area and within the limits of the San Francisco Watershed lands. These lands are dedicated to permanent open space providing a pleasant drive between Edgewood Road and State Route 92 to the north. It is also used extensively by bicyclists.

City Scenic Roads

Alameda de las Pulgas. Alameda de las Pulgas is an arterial city street traversing north to south from San Carlos Avenue to Eaton Avenue and is lined with residential uses. The street is characterized by trees, landscaping and low- to medium-density residential development. Within San Carlos, special landscape treatment has been implemented at points along the road to enhance the corridor.

San Carlos Avenue. San Carlos Avenue is an arterial, urban city street traversing east to northwest between El Camino Real and Cranfield Avenue and is lined with commercial and residential uses. Some locations afford urban landscape views of hills or the San Francisco Bay. Within San Carlos, special landscape treatment has been implemented at points along the route to enhance the

corridor. Tree-lined stretches of San Carlos Avenue along the Pulgas Creek open space corridor that were planted by early settler Timothy Guy Phelps in 1863 provide scenic riparian habitat. Descending into downtown San Carlos, San Carlos Avenue provides a view corridor of the historic Romanesque train station completed in 1888 and City Hall Park. Continued maintenance of the residential and commercial land uses adjacent to this route is anticipated.

Brittan Avenue. Brittan Avenue is an arterial street located to the south of Holly Street extending the length of the city in an east/west direction from U.S. 101 to Crestview Drive. Brittan Avenue is considered a primary entry and access to San Carlos. Street improvements have included a grade separation and landscaping.

Brittan Avenue from Alameda de las Pulgas to Crestview Drive extends through a canyon representative of the natural interior coast range woodland. Single-family homes front on Brittan Avenue with a backdrop of hillside open space retained in permanent City ownership. A portion of the northern side of the canyon is permanently protected by the existence of Big Canyon Park.

Club Drive. Club Drive extends from San Carlos Avenue to Crestview Drive. The route climbs a major ridge where significant panoramic views are available. Club Drive is generally lined with single-family residential uses with open space uses existing in the canyon below.

Crestview Drive. Crestview Drive extends along the major ridge in the western portion of San Carlos. The route extends from the Belmont city limit southerly to connect with Edgewood Road at the lower elevations near the headwaters of Cordilleras Creek. The route offers views of the San Francisco Bay and the San Francisco Watershed lands.

El Camino Real. El Camino Real is a State Highway paralleling the railroad extending from Redwood City on the south to Belmont on the north. Beautification efforts have included landscaped medians with left turn pockets and landscaping along the east and west sides.

Holly Street. Holly Street is an arterial street extending east to west from U.S. 101 to Elm Street. Holly Street is considered a primary entry and access to San Carlos. Street improvements have included entryway decorative features, a grade separation and landscaping.



San Carlos Airport

Goals, Policies and Actions

Circulation and Transportation



GOAL CSH-1

To develop a circulation system that is safe, environmentally-friendly and responsive to the needs of various land uses planned within the City of San Carlos.

POLICIES

POLICY CSH-1.1 Widths of streets and highways should be sufficient to address existing and projected traffic volumes, emergency access requirements, while providing positive pedestrian and bicycle experiences.

POLICY CSH-1.2 The major road system should be designed to carry traffic around rather than through residential areas.

POLICY CSH-1.3 Adequate access should be provided to the commercial and industrial areas of the city.

POLICY CSH-1.4 Adequate freeway access and interchange capacity should be considered and planned for to accommodate future traffic circulation needs.




Caltrain Shuttle from San Carlos Train Station





GOAL CSH-2

To provide a safe, efficient and aesthetically pleasing circulation network for various transportation modes in addition to the automobile.

POLICIES


POLICY CSH-2.1  Continue to recognize, protect and support the San Carlos Airport as a regionally important general aviation facility.


POLICY CSH-2.2  Provide for adequate pedestrian and bicycle facilities as viable transportation modes in San Carlos, as recommended in the San Carlos Bicycle and Pedestrian Master Plan.


POLICY CSH-2.3  Access to public transportation facilities should be convenient and designed to encourage use of public transit.

ACTIONS

ACTION CSH-2.1 Plan for the expansion of the airport in accordance with the adopted Airport Land Use Committee Plan. Provide adequate surface transportation access to that facility.

ACTION CSH-2.2  Continue to support operation of adequate public bus service throughout San Carlos.

ACTION CSH-2.3  Support the Peninsula Corridor Joint Powers Board efforts to upgrade and expand the Peninsula rail service. Work with that agency in implementing its plans for local facility improvements.




 Denotes synergy with Climate Action Plan




GOAL CSH-3

Maintain a street and highway system which accommodates future growth while maintaining acceptable levels of service.

POLICIES

- POLICY CSH-3.1**  Strive to reduce baseline and development-related traffic by ~~20 percent through public-private partnership efforts implementing and enforcing the Transportation Demand Management Ordinance~~.
- POLICY CSH-3.2**  Support city-wide efforts to reduce vehicular trips within and through the community.
- POLICY CSH-3.3**  Support the incorporation of Transportation Demand Management measures in new development to reduce traffic impacts.

POLICY CSH-3.4  Support Smart Growth and Sustainability principles to reduce travel time from housing to jobs, provide affordable transportation to all members of the community, allow compact mixed-use development and decrease dependency on automobiles.

POLICY CSH-3.5 Street and right-of-way widths should be designed and constructed in accordance with the street standards established in this plan, the City Subdivision Ordinance and Standard Details. However, flexibility for street widths should be permitted with sensitivity to slope, neighborhood character, traffic volume, emergency access requirements, and pedestrian/bicycle needs.

POLICY CSH-3.6 Parking and access facilities in the Central District shall be designed to adequately accommodate both customers and employees.

POLICY CSH-3.7 Public sidewalks and walkways shall be designed to accommodate access in accordance with the Americans with

Disabilities Act, and including any other applicable State and federal laws, regulations and guidelines, and shall be kept clear of obstruction.

POLICY CSH-3.8 The City shall ~~strive to maintain intersection~~continue to evaluate service levels ~~metrics above the mid-range of level D (not to exceed a Volume to Capacity Ratio (V/C) of .85 or a total average delay time at intersections of 45 seconds whenever V/C Ratio is not available) metrics as provided by the City's Transportation Significance Criteria as adopted Nov 12, 2024 Resolution 2024-118.~~ The City recognizes that certain development project(s) may cause ~~this-these level of service goal~~thresholds to be exceeded. The City may ~~ap—~~prove such development project(s) if specific economic, legal, social, technological, or other benefits outweigh the ~~adverse effects~~ of exceeding the ~~mid-range level D goal thresholds as set forth in the Transportation Significance Criteria.~~

POLICY CSH-3.9 Where appropriate and relevant, based on the location and scope of a development project under consideration, the City shall consider regional, as well as local traffic impacts when assessing new development projects.

POLICY CSH-3.10 The City shall support efforts for a co-ordinated transportation system and maintaining acceptable levels of traffic with local, regional and Caltrans agencies.

POLICY CSH-3.11 New developments and businesses shall be required to provide adequate loading, unloading and delivery areas, and/or shall be required to conduct such activities during non- business/peak hours.

POLICY CSH-3.12 The City should preserve its existing alley and pedestrian path systems to the maximum extent feasible.

POLICY CSH-3.13 The City may consider traffic-calming devices to reduce speeds and to discourage thru traffic in residential neighborhoods. Impacts of diverting traffic to adjacent neighborhoods, bicycle and pedestrian access and safety, noise, emergency response time, aesthetics and maintenance should be reviewed prior to allowing traffic- calming devices.

POLICY CSH-3.14 The City shall support the continued operation and upgrading of the railroad commuter service between Gilroy and San Francisco.



POLICY CSH-3.15 The City supports dedication and preservation of rights-of-way for future transit service along the rail corridor.



POLICY CSH-3.16 The City shall support adequate access to affordable transportation alternatives for people with impaired mobility.

POLICY CSH-3.17 The City shall consider revising its parking requirements to reflect current trends in business, industry and housing.

ACTIONS

ACTION CSH-3.1 New development projects shall be required to mitigate traffic, circulation and/or parking impacts. The City may impose a mitigation fee on new developments for the proportional share of costs to mitigate the traffic, circulation and/or parking impact of a project.

ACTION CSH-3.2 The City shall consider adoption of a Transportation Impact Fee for new development to support city-wide Transportation Demand Management measures.

ACTION CSH-3.3 The City shall support local school district efforts to reduce traffic through programs such as safe routes to school, school pools and school bus/shuttle programs.

ACTION CSH-3.4 The City shall encourage City employees to utilize alternative transportation through incentive, ridesharing and guaranteed ride home programs.



ACTION CSH-3.5 The City shall coordinate with adjacent communities and responsible agencies to provide an interconnected system of pedestrian ways, trails, bikeways and transit routes.



ACTION CSH-3.6 The City shall consider traffic control measures at intersections when traffic volumes and safety warrants are met.

ACTION CSH-3.7 The City shall strive to reduce vehicular trip generation from new development by 20 percent, using a combination of both public and private funds and efforts. The 20 percent reduction shall be obtained through implementation of Transportation Demand Measures (TDMs). For private development projects, no less than a 10 percent reduction in vehicular trip generation should be attained through the implementation of TDMs that are privately funded and implemented. TDMs may include, but are not limited to, incorporation of the following measures into new development projects:



- Mixed-use areas
- Neighborhood centers
- Pedestrian-oriented public and private development improvements
- Increased/enhanced pedestrian linkages
- Bicycle-friendly improvements
- Access to transit corridor
- Participation in local public shuttle programs
- Parking management

- Links between commercial, residential and industrial areas of the community
- Access to a variety of transportation modes
- C/CAG Congestion Management Plan Trip Reduction Measures

ACTION CSH-3.8 The City shall consider designating Infill Opportunity Zones as outlined in SB 1636.

ACTION CSH-3.9 The City shall support San Mateo City/County Association of Governments (C/CAG) policies on Congestion Management.

ACTION CSH-3.10 The City shall support an intra-city (east/west) local shuttle to feed into other forms of local and regional transportation.



Pedestrians crossing San Carlos Avenue

Bicycle and Pedestrian



GOAL CSH-4

Provide for safe walking and bicycle riding for transportation and recreation.

POLICIES

POLICY CSH-4.1 Support bicycle safety education programs for bicyclists and motorists of all ages.

POLICY CSH-4.2 Reduce potential conflicts, safety hazards and physical obstacles between bicyclists, automobiles and pedestrians and ensure compliance with the Americans with Disabilities Act, and including any other applicable State and federal laws, regulations and guidelines.

POLICY CSH-4.3 The safety of bicyclists, pedestrians, as well as motorists shall be considered in street design wherever possible.



ACTIONS

ACTION CSH-4.1 Provisions shall be made for bicycle transportation within the city as designated on the San Carlos plan for bicycle routes.



Caltrain at San Carlos Train Station


**GOAL
CSH-5**

Ensure all modes of transportation connect safely and efficiently both within San Carlos and with neighboring jurisdictions.

POLICIES

POLICY CSH-5.1 Connect neighborhoods, school sites, activity centers, transportation centers, recreational sites and other important community amenities with sidewalks, pedestrian paths, trails and bikeways.

POLICY CSH-5.2 The City shall support the Peninsula Corridor Joint Powers Board improvement of the railroad station and adjacent parking facilities. In general, the station should act as a major transportation terminal for the city providing facilities for bus, auto parking, bicycle storage, public gathering spaces

and community amenities, consistent with the historic character of the station.

POLICY CSH-5.3 Support an interconnected system of pedestrian ways, paths, trails, bikeways and transit routes within the city and between adjacent communities.

ACTIONS


ACTION CSH-5.1 Peninsula Corridor Joint Powers Board should be encouraged to alleviate existing parking deficiencies through its redesign and the expansion of the San Carlos Depot's parking lots, consistent with the character of the Train Station.





**GOAL
CSH-6**

Integrate transportation and land use.

POLICIES

POLICY CSH-6.1  Bicycling and walking facilities should be incorporated into all new development projects to the maximum extent feasible.

POLICY CSH-6.2  Support transit oriented development with mixed, dense land use that reduces the need to travel and that is linked to good transit. The City shall work with local, regional, and State representatives to encourage the support and funding of transit- oriented development projects.

POLICY CSH-6.3  Encourage developers to consider alternatives to at-grade parking for new development.

ACTIONS

ACTION CSH-6.1 Support improved east-west connectivity by providing pedestrian/bicycle under crossings of the Caltrain tracks at intervals, during future track reconstruction, or as developer mitigation.



Bicyclist on Old County Road


**GOAL
CSH-7**

Contribute to a comprehensive regional trail system for alternative transportation and outdoor recreation purposes.

POLICIES

POLICY CSH-7.1 Trails and paths intended for general circulation shall provide reasonably direct and convenient routes of travel for potential users.



POLICY CSH-7.2 Crosswalks at major intersections should be preserved wherever possible, particularly in areas with high pedestrian traffic.



POLICY CSH-7.3 Financing and implementation of street modifications for pedestrian or bicycle use shall, whenever possible, be integrated with other related programs, including, but not limited to:



street and road projects, street or sidewalk maintenance projects and traffic mitigation programs.

POLICY CSH-7.4 Support traffic controls that recognize bicycles and pedestrians.



POLICY CSH 7.5 Encourage bicycle storage (public and private) and improved bikeway access to station stops and park and ride facilities.



POLICY CSH-7.6 Support the provision of railcars sufficiently equipped for use by bicyclists.



POLICY CSH-7.7 Public trails should be located and designed so that they serve the needs of the public while minimizing private property impacts.



POLICY CSH-7.8 The local public path and trail system should be linked with existing private and regional systems and the road system.



ACTIONS

ACTION CSH-7.1 The local trails system should be documented and enhanced as part of the city's circulation system.

ACTION CSH-7.2 Residential sidewalks shall be a minimum of 4 feet wide and commercial sidewalks shall be a minimum of 8 feet wide wherever possible.

ACTION CSH-7.3 Provide continuity to bike routes within the City and inter-jurisdictionally.



ACTION CSH-7.4 As lands are subdivided, dedication of trail and path easements should be required where appropriate as a part of the City and County's trail and path system. Subdividers should dedicate, construct and maintain trails and paths wherever feasible.



Scenic Highways and Roads



GOAL CSH-8

To develop a system of scenic highways and roads that reflects the aesthetic and visual qualities of the existing and developing San Carlos landscape and the surrounding region.

POLICIES

POLICY CSH-8.1 The City shall continue its program of protecting and enhancing local scenic roads through right-of-way protection and appropriate architectural and landscape controls and requirements.

POLICY CSH-8.2 The City shall encourage the planting of native trees and shrubs along local scenic roads, where practical.

POLICY CSH-8.3 The City shall maintain local scenic roads in safe condition.

POLICY CSH-8.4 The City shall continue architectural and site plan review of all signage, structures and site developments proposed in the scenic corridors to ensure appropriateness of design and materials and proper placement of structures and vegetative screening where necessary.

POLICY CSH-8.5 Traffic mitigation funds should be available to provide aesthetic enhancement to the city's Scenic Highways and Roads.

ACTIONS

ACTION CSH-8.1 As utility funds become available, the City shall undertake further undergrounding of utilities with priority for projects adjacent to local scenic roads.

ACTION CSH-8.2 The City should consider conducting a comprehensive study and update to the local scenic road designations.



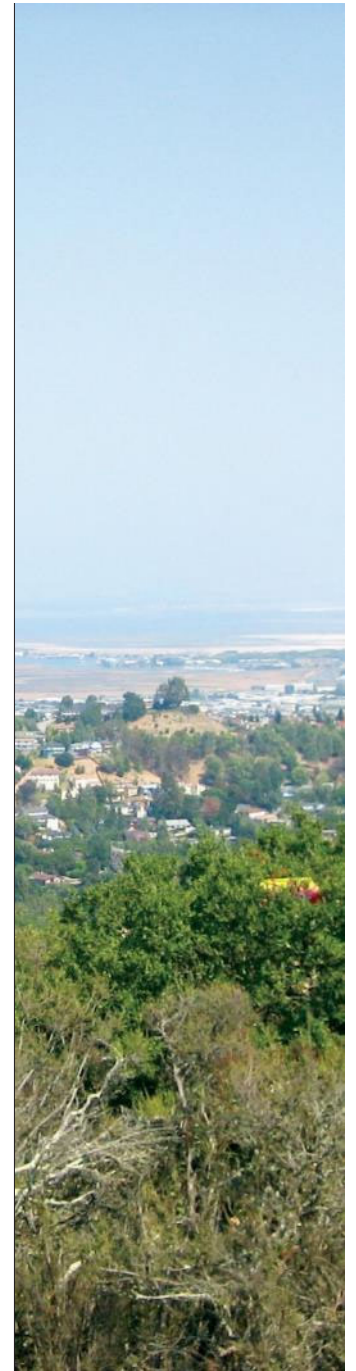
Bicycle parking at San Carlos Train Station



Intersection of San Carlos Avenue and El Camino Real

Environmental Management Element

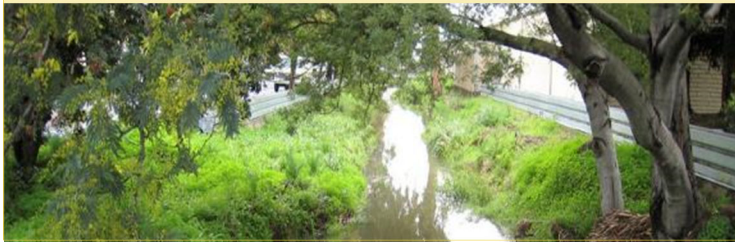
6



The Environmental Management Element aims to protect, preserve and enhance natural resources in San Carlos. The Element identifies San Carlos' important open space lands and ensures that future development will respect the natural and scenic qualities of those places, helping to shape the desired physical form of the community by safeguarding open space for future generations. The Environmental Management Element also provides direction on the conservation of biological resources in and near San Carlos, including plants and wildlife, as well as water and air quality. Additionally, the Element identifies ways to reduce greenhouse gas emissions and solid waste and suggests strategies for adaptation to climate change.

Contents

112	Biological Resources
125	Open Space
127	Hydrology
133	Air Quality
140	Greenhouse Gas Emissions
149	Solid Waste
153	Community Involvement



Introduction

State law requires that a General Plan include both a Conservation Element and an Open Space Element. This General Plan combines these two elements into a single Environmental Management Element that addresses each element's similar and overlapping concerns, and satisfies the legal requirements for both.

State law identifies a series of topics which must be addressed in the Conservation and Open Space Elements. The Conservation Element is required to address the conservation, development and utilization of natural resources, including forests, rivers and other waters, fisheries, plants and wildlife, minerals and

soils. The Open Space Element must address a range of open space types, including six major categories of open space. Most of these types of open space are covered in this Environmental Management Element while a few are covered elsewhere in this General Plan. Table 6-1 lists all six types of open space and identifies where they are addressed in this General Plan.

Not all required topics are discussed in this Element, because they are included elsewhere in the General Plan or such resources do not exist in San Carlos. For example, areas important for the preservation of historic and cultural resources are addressed in the Land Use Element, and open space for public health and safety is primarily discussed in the Safety Element. San Carlos does not have forest, fishery, agricultural, or mineral resources. Other federal and State laws require communities to address air quality and the community production of greenhouse gas (GHG) emissions and solid waste and to develop impact reduction strategies. To this end, the Environmental Management Element includes the topics of air quality, GHG emissions and solid waste.

TABLE 6-1 GOVERNMENT CODE OPEN SPACE CLASSIFICATIONS

Category	Element Addressed In:
Open Space for the Preservation of Natural Resources	
Plant and animal habitat areas	Environmental Management
Rivers, streams, lakes and their banks	Environmental Management
Watershed lands	Environmental Management
Areas required for ecological and other scientific study purposes	Environmental Management
Open Space Used for the Managed Production of Resources	
Agricultural lands and rangelands	Not applicable to San Carlos
Forest and timber lands	Not applicable to San Carlos
Mineral resource production areas	Not applicable to San Carlos
Open Space for Outdoor Recreation and Scenic Resources	
Areas of outstanding historic or cultural value	Land Use
Parks and other areas used for recreation	Parks and Recreation
Areas of outstanding scenic value	Land Use
Scenic corridors, trails and links between different open space areas	Land Use
Open Space for Public Health and Safety	
Areas requiring special management or regulation because of risks presented by natural hazards such as steep slopes or flooding	Safety Element
Open Space in Support of the Mission of Military Installations	
Areas associated with military bases	Not applicable to San Carlos
Open Space for the Protection of Native American Sacred Sites	
Local tribal lands	Land Use Element
Any Native American cultural sites	

6 ENVIRONMENTAL MANAGEMENT ELEMENT



The Environmental Management Element is divided into three sections:

- **Background Information:** Provides information on the existing conditions of biological resources, hydrology, air quality, greenhouse gas emissions and solid waste.
- **Guiding Principles:** Provides a framework and establishes the basic intent of the element and are a broad statement of overall community value relating to environmental management in San Carlos.
- **Goals, Policies and Actions:** Provides policy guidance for protecting and preserving important resources covered in this Element, mentioned above.

Biological Resources

The following section provides background information pertaining to biological resources in San Carlos. The background information supports the goals and policies related to biological resources, which are also included in this section.

Background Information

This section includes background information on natural vegetative communities, special status plants and wildlife, wetlands, riparian habitat and soil types in and near San Carlos.

Natural Communities in San Carlos

Although native vegetation within San Carlos has been substantially altered, the presence of large areas of undeveloped lands to the west and the remaining riparian corridors along creeks contributes to a diverse assemblage of resident and migrant wildlife species. In general, each habitat differs in its relative value to specific species and can be characterized by both vegetation and dependent animal species, although some wildlife species may utilize more than one habitat type. Figure 6-1 shows a general map of the vegetation and

habitat types based on CalVeg mapping by the U.S. Forest Service.

The habitat types found within and around San Carlos all provide different ecological functions and value. The more common habitat types are outlined below:

- *Non-vegetated and sparsely vegetated habitat.* Most of the non-vegetated and sparsely vegetated habitat areas are located east of Alameda de las Pulgas as shown on Figure 6-1.
- *Aquatic habitat.* Aquatic habitat includes streams, ponds, lakes and bay shoreline that provide habitat to a variety of birds, amphibians, fish and mammals.
- *Wetlands.* Wetlands are areas that are periodically or permanently inundated by surface or ground water and support vegetation adapted to life in saturated soil. Wetlands provide habitat to fish and wildlife and provide stormwater, flood and water recharge, filtration and purification functions. Seasonal wetlands are areas of prolonged saturation that are dry during the summer months. Wetlands tend to be present near aquatic features such as creeks, lakes, or ponds and along the bayshore, but also may be found within seasonal swales or isolated depressions such as a low spot in the ground. Wetlands and major waterbodies in and near San Carlos are shown in Figure 6-2. Although there are only documented areas of wetlands near the eastern city border, it is likely that these features exist in other areas of the city and its SOI.
- *Riparian habitats.* Riparian habitat is a distinct plant community found along the margins of creeks and rivers. It has a very high value to wildlife and generally exhibits a rich and diverse animal community. Although mostly urbanized, Pulgas, Brittan, Belmont and Cordilleras Creeks support areas of riparian habitat. However, the scale of the riparian habitat area is too small to be shown in Figure 6-1.
- *Oak woodland.* Oak woodland habitat consists of patches of several or more mature trees frequently dominated by California coast live oak and valley oak. Some areas of oak woodland habitat also support a dense understory shrub layer of vegetation that includes coyote brush, poison oak, California coffeeberry, Himalayan blackberry and California rose. Several types of

FIGURE 6-1

Vegetation and Habitat Types

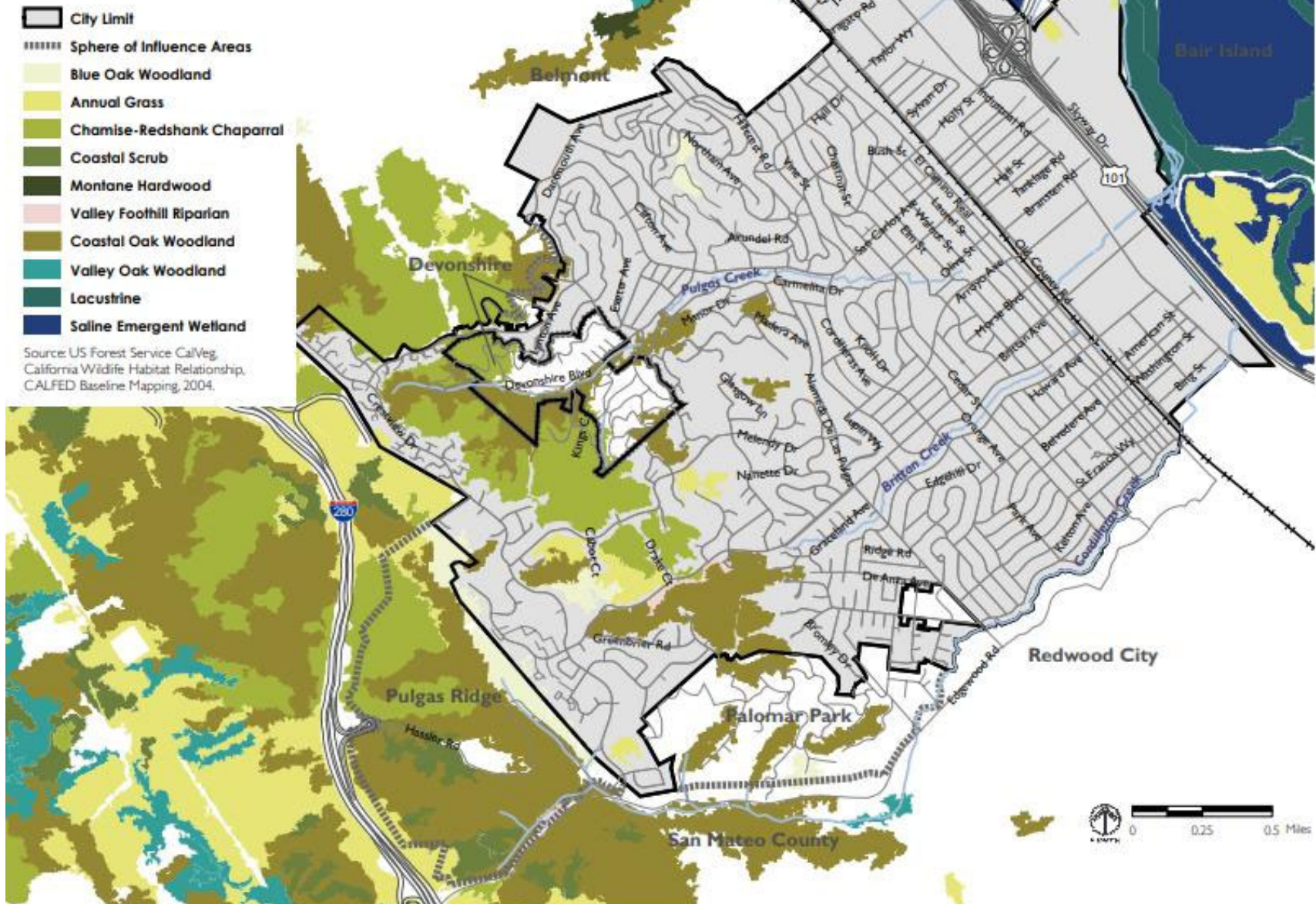


FIGURE 6-2
Wetlands and Waterbodies

-  City Limit
-  Sphere of Influence Areas
-  Tidal Salt, Brackish Freshwater Marsh
-  Intertidal Mudflat and Rocky Shores
-  Seasonal Wetlands
-  Lakes, Ponds and Creeks
-  Waterbodies



6 ENVIRONMENTAL MANAGEMENT ELEMENT



oak woodland are shown on Figure 6-1. This habitat is found in small patches in single-family neighborhoods and concentrated in open space and park areas.

- *Annual grassland.* The majority of grassland habitat in San Carlos is rather low-quality grassland dominated by annual, non-native upland grasses and forbs.
- *Scrub.* Scrub habitat in the San Carlos area is characterized by Chamise-Redshank Chapparal. Scrub is found in some of the upland open space and park areas.

Sensitive Plant and Wildlife Species in San Carlos

San Carlos' hilly, densely vegetated open space areas and proximity to the San Francisco Bay provide potential habitat for a variety of sensitive plant or wildlife species. As of February 2009, the California Natural Diversity Database (CNDDDB), an inventory of rare plants and animals in California, identified no occurrences of sensitive species or habitats in the urban areas of San Carlos. However, known occurrences of sensitive species are documented nearby. Specifically, the dusky footed woodrat is known to be located on, or in the immediate vicinity of an area at the western end

of Devonshire Boulevard, and the highest concentrations of nests occurring in riparian, coast live oak woodland and chaparral dominated by chamise and toyon. Circles around these point locations, using radii given in the CNDDDB, are drawn on Figure 6-3. Sensitive habitat, plants and wildlife found within the city limit and SOI are summarized in Table 6-2.

Coastal salt marsh and wetland habitat near the San Carlos Airport, but outside the city limit and SOI, are known to support sensitive species. Water birds such as the endangered California clapper rail and threatened western snowy plover could potentially be present in areas adjacent to the San Carlos Airport. There is also potential for the federal endangered salt marsh harvest mouse to occur in these areas, particularly in places with cordgrass or alkali brush.

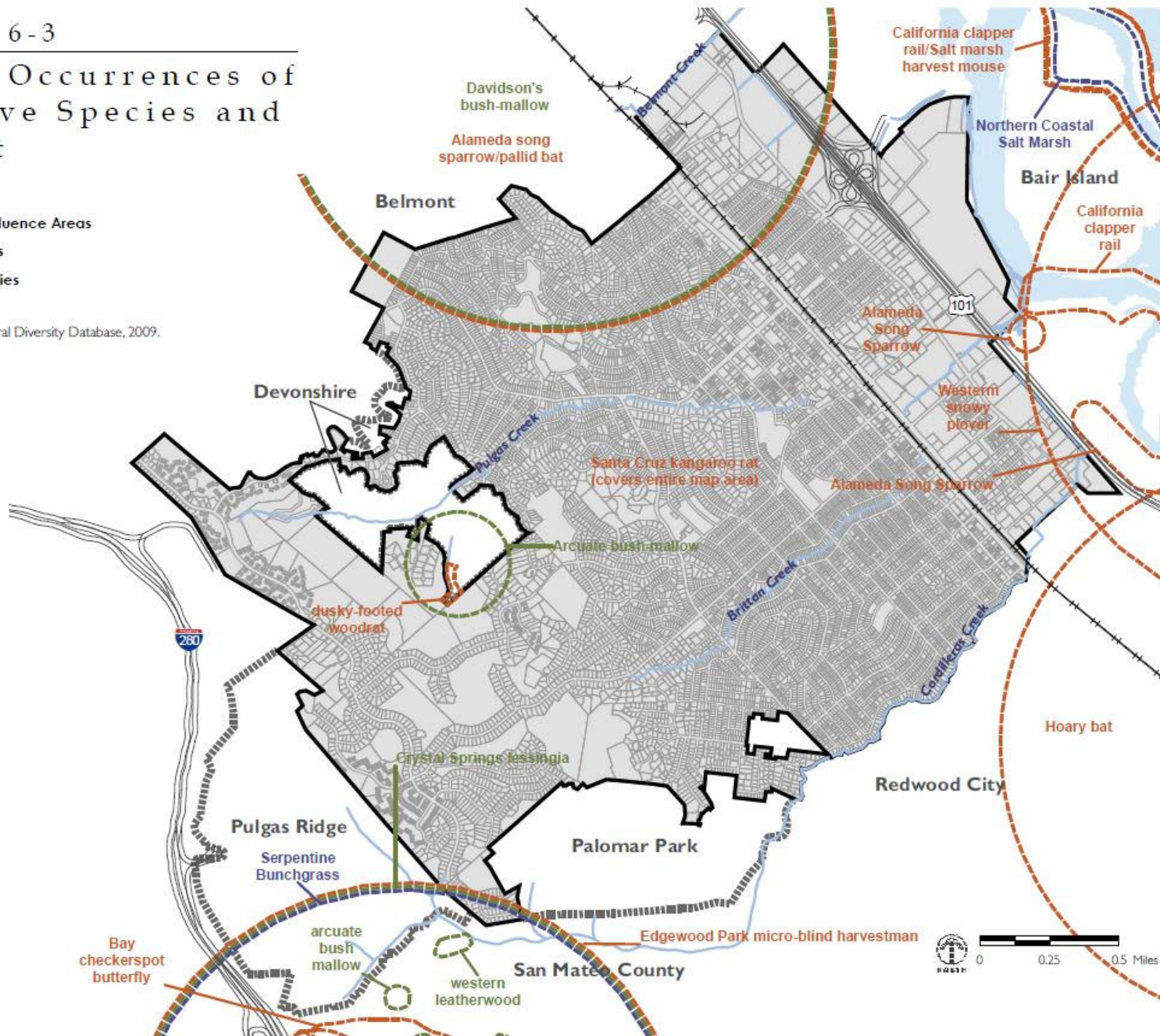
The San Francisco garter snake, California red-legged frog, California tiger salamander and dusky footed wood rat all have potential to occur in open space areas in and around San Carlos. The San Francisco garter snake, a federal endangered species, typically resides in densely vegetated ponds near exposed hillsides where they can sun themselves, feed and find cover in

FIGURE 6-3

Known Occurrences of Sensitive Species and Habitat

-  City Limit
-  Sphere of Influence Areas
-  Plant Species
-  Animal Species
-  Habitat

Source: California Natural Diversity Database, 2009.



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TABLE 6-2 SENSITIVE SPECIES FOUND IN THE CITY LIMIT AND SPHERE OF INFLUENCE

Species	Habitat	Status
Habitat		
Serpentine Bunchgrass	n/a	Recognized as a sensitive community by CDFG
Plants		
Arcuate bush-mallow	Chaparral and coastal scrub on dry slopes	CNPS List 1B (rare, threatened or endangered in California)
Crystal Springs lessingia	Mixed woodlands, oak woodlands, valley and foothill grasslands, coastal scrub on serpentine soils	CNPS List 1B (rare, threatened or endangered in California)
Davidson's bush-mallow	Coastal scrub	CNPS 1B (rare, threatened or endangered in California)
Serpentine benchgrass	Serpentine soils	Recognized as a sensitive community by CDFG
Insects		
Bay checkerspot butterfly	Serpentine rock outcrops and serpentine soils	Federally threatened
Edgewood Park micro-blind harvestman	Serpentine rock outcrops and serpentine grasslands	Recognized as a species of special concern by CDFG
Birds		
Alameda song sparrow	Tidal marsh	Recognized as a species of special concern by CDFG
California clapper rail	Tidal marsh	State and federally endangered
western snowy plover	Tidal salt, brackish freshwater marsh	Federally threatened
Mammals		
Pallid bat	Desert scrub with rocky outcrops, forested oak and pine regions	Recognized as a species of special concern by CDFG
Santa Cruz kangaroo rat	Desert scrub and sandy hills	Recognized as a species of special concern by CDFG
San Francisco dusky footed wood rat	Chaparral and coastal scrub on dry slopes	Recognized as a species of special concern by CDFG

Notes: CDFG = California Department of Fish & Game; CNPS = California Native Plant Society
Source: California Natural Diversity Database (CNDDB), February 2009.

rodent burrows. Often the prey of the San Francisco garter snake, the California red-legged frog, a federal threatened species, occurs in areas of riparian vegetation with deep, still, or slow-moving water. The California tiger salamander, also a federal endangered species, is found in vernal pools and seasonal ponds in grassland and low foothills. The dusty footed wood rat, a California species of concern, typically is found in woodland areas with dense underbrush. Known populations occur in the Devonshire SOI. Additionally, native shrubs like the arcuate bush mallow, also known to occur in the Devonshire SOI, could potentially occur in open space areas west of Alameda de las Pulgas.

Invasive Plants

Invasive plants are a concern throughout the Bay Area. Detrimental effects from invasive plants particular to urban areas include the displacement of native plants and wildlife and increasing risk of exposure to wild-fires and floods. Plants and trees such as the eucalyptus, Scotch and French broom and pampas grass increase fire fuel loads and can also be highly flammable. Other invasive plants, such as the giant reed, can clog

stormwater systems, which can increase the risk of flooding.

The California Invasive Plant Inventory or Invasive Plants of California's Wildlands can assist in determining if a plant is an invasive species. Cal-IPC ranks species as "High," "Moderate," or "Limited" impact, and any species from these can be evaluated for potential threat to local habitat. Even species ranked as "Limited" impact for California as a whole can have severe impacts in a particular county or property due to local history and site conditions.

Watersheds and Riparian Corridors

Natural drainage in San Carlos is divided into two main watersheds: Pulgas Creek and Cordilleras Creek. Within the watersheds are Pulgas, Brittan, Belmont and Cordilleras Creeks, which are the main drainage ways through San Carlos emptying into San Francisco Bay. Salt and brackish marshes are found near the terminus of each of the creeks east of Highway 101. The upper portions of these watersheds are generally undeveloped, the middle sections are primarily residential and the eastern portions are typically commercial

and industrial. The quality of the watersheds is discussed in Section D.1.c below.

The four creeks in San Carlos are identified in Figure 6-2. Belmont Creek is located at the northern San Carlos boundary in the East Side area. Belmont Creek flows into Belmont Slough and O'Neill Slough.

Pulgas and Brittan Creeks are the two main creeks within the City of San Carlos. The creeks have mostly unhardened channels in the upper reaches and hardened channels in the lower flatlands, where Brittan Creek joins Pulgas Creek via an underground conduit (paralleling El Camino Real). Following the confluence of Pulgas Creek and Brittan Creeks, the combined flow drains into Smith Slough south of Bair Island.

Cordilleras Creek, the longest of the four creeks, defines the southern boundary of San Carlos, which is shared with Redwood City. Cordilleras Creek, like the combined Pulgas/Brittan Creek, also flows into San Francisco Bay via Smith Slough. Similar to Pulgas and Brittan Creeks, the upper reaches of the creek are mostly unhardened with hardened channels in the lower flatlands.

The creeks discussed above are “losing creeks,” meaning they are not recharged by groundwater. Consequently, they are intermittent and generally flow during the winter wet-weather season and from irrigation runoff during the dry months.

Protecting the habitat functions of San Carlos’ streams and riparian corridors is a priority for the City. The riparian protection ordinance regulates construction or other work performed in or near creeks. Exceptions to this rule include placement of approved storm drainage outflows and removal of sedimentation.

Creek restoration and maintenance and tree and vegetation replacement standards should further the enhancement and protection of creeks.



Guiding Principles

The Guiding Principles are a set of key objectives that articulate San Carlos' core values relating to the environment. The Guiding Principles of the Environmental Management Element are:

- Ensure natural resources are preserved, sustained and managed through environmental stewardship.
- Support community health and wellness through sound environmental practice.
- Empower the community to help protect the environment through public awareness and involvement.
- Ensure that there is a Climate Action Plan (CAP) in place at all times to address reduction of greenhouse gas emissions and manage the impacts of climate change.
- Endeavor to be a model city of good conservation and resource management practices.

Goals, Policies and Actions



GOAL EM-1

Protect natural habitat and other biological resources.

POLICIES

- POLICY EM-1.1** Ensure that potential impacts to biological resources and sensitive habitat are carefully evaluated when considering development project applications.
- POLICY EM-1.2** Ensure that development is consistent with all federal, State and regional regulations for habitat and species protection.
- POLICY EM-1.3** Work to manage or eliminate non-native invasive species from City-owned property and open space.

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POLICY EM-1.4 Protect and preserve the circadian cycle (the cycle of night and day) by limiting sources of light during nighttime hours.

POLICY EM-1.5 Promote the preservation of native species, habitat and vegetation types and overall natural diversity.



Denotes synergy with Climate Action Plan

Note: The Climate Action Plan adopted in 2009 was replaced by a new Climate Mitigation and Adaptation Plan (CMAP) adopted on September 27, 2021 (Resolution No. 2021 – 094). The CMAP calls for reducing emissions 40 percent below 1990 levels by 2030 and 80 percent below 1990 levels by 2050.

ACTIONS

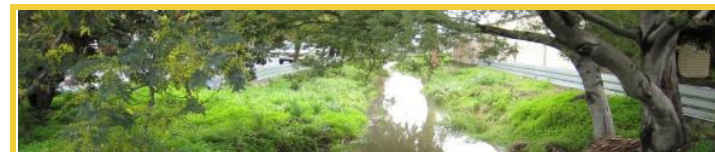
ACTION EM-1.1 Continue to cooperate with local, regional and State agencies involved in protecting critical habitat.

ACTION EM-1.2 Seek grant funding for the removal of invasive plants and installation of native trees and shrubs.

ACTION EM-1.3 Use native plants wherever possible on City-owned and controlled property.

ACTION EM-1.4 Enforce rules and regulations in public open space areas to minimize the impacts of destructive activities.

ACTION EM-1.5 Require that major new buildings and taller structures that extend above the existing surrounding urban fabric and height of the tree canopy be designed to minimize the potential risk of bird collisions using input from the latest bird-safe design guidelines and best management practice strategies to reduce bird strikes.



GOAL EM-2

Promote healthy streams and riparian corridors.

POLICIES

POLICY EM-2.1 Preserve and enhance riparian areas.



POLICY EM-2.2 Continue to enforce the City's Riparian Ordinance for all four of the City's creeks (Pulgas, Brittan, Cordilleras and Belmont) and their tributaries.



POLICY EM-2.3 Carefully evaluate the cumulative and compounding impacts of incremental creek encroachments.



POLICY EM-2.4 Restore culverted or buried channels to their natural state wherever feasible.



POLICY EM-2.5 Promote the establishment of native vegetation and the removal of non-native invasive plants in riparian areas.



POLICY EM-2.6 Encourage property owners to replace fallen trees along waterways to maintain an upper canopy of vegetation. The species shall be as approved by the City arborist. Encourage use of trees native to the area.



POLICY EM-2.7 Retain Pulgas, Brittan, Cordilleras and Belmont Creek channels and their 100-year floodplains wherever possible as natural open space areas. These areas are to function as storm drainage facilities and as open space greenbelts to support natural habitat.



POLICY EM-2.8 Participate and help coordinate with neighboring jurisdictions' watershed management efforts.



ACTIONS

ACTION EM-2.1 Consider amending the Riparian Ordinance to strengthen stream protection requirements and reduce potential for flooding. Potential amendments may include evaluation of increased setbacks, limited walls and fences, requiring Best Management Practices (BMPs) for biotechnical bank stabilization and erosion control and vegetation management requirements.

ACTION EM-2.2 Consider establishing incentives to stabilize creek banks utilizing natural methods.

ACTION EM-2.3 Provide information to the public on City regulations and best practices for riparian corridor management.

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- ACTION EM-2.4** Develop a citywide policy that applies to all City properties and operations and establishes protocols to work with water service providers to determine appropriate location(s) for and implementation of a reclaimed (recycled) water distribution system (purple pipe) for landscaping and other non-potable water uses for residential, commercial and industrial consumers.
- ACTION EM-2.5** Explore availability of grant funding for removal of invasive plants from riparian areas and planting of native and appropriate trees and shrubs.
- ACTION EM-2.6** Consider preparation of Watershed Management Plans for all watersheds, addressing flooding causes, improvement of creek functionality and water quality and creek channel restoration.



GOAL EM-3

Enhance the urban forest.

POLICIES

- POLICY EM-3.1**  Maintain and expand the urban canopy with special emphasis on protection of heritage trees.
- POLICY EM-3.2**  Review and amend the Zoning Ordinance as needed to identify barriers to the effective enhancement of the urban forest and the protection of heritage trees.
- POLICY EM-3.3**  Assist community groups with tree planning efforts.

ACTIONS

ACTION EM-3.1 Implement Climate Action Plan measures to require tree planting.



ACTION EM-3.2 Review and amend the Zoning Ordinance as needed to identify barriers to the effective enhancement of the urban forest and the protection of heritage trees.

ACTION EM-3.3 Establish and implement a program to protect existing and plant new trees at city facilities, public parks and in public planting strips and parking lots, working with non-profit volunteer groups if possible.

Open Space

This section contains background information on open space areas in San Carlos. Also in this section are goals and policies related to open space.

Background Information

Open space is defined as undeveloped areas that are set aside for outdoor recreation, natural resource preservation and the protection of public safety. Within San Carlos there are approximately 73 acres of open space designated as a city park and an additional 86 acres of land designated as open space in the Land Use Element. This acreage includes Chilton Park and undeveloped portions of Big Canyon Park and Eaton Park, but does not include other city parks that are developed for active use.

Open space near San Carlos but outside the city boundary includes Peninsula Watershed lands, Pulgas Ridge Open Space Preserve and Edgewood Park. Bair Island is a significant open space area near the San Carlos airport located within Redwood City, and is part of the Don Edwards San Francisco Bay National Wildlife Refuge. Bair Island consists of 2,600 acres of open space. Including Bair Island, there are approximately 3,370 acres of open space in areas near San Carlos. Both Figures 7-1 and 7-3 in the Parks and Recreation Element depict open space lands within and surrounding the city.


Goals, Policies and Actions




GOAL EM-4


Acquire, preserve, protect and restore open space and enhance the public's ability to enter and enjoy open space.

POLICIES

- POLICY EM-4.1**  Retain existing public open space as open space.
- POLICY EM-4.2** Support an open space system that is diverse in uses and opportunities and includes natural function/wildlife habitat as well as passive and appropriate active recreation.
- POLICY EM-4.3** Focus open space acquisition efforts on the most environmentally sensitive areas.

POLICY EM-4.4 Coordinate with Midpeninsula Regional Open Space District and other agencies on planning and managing public open space, including management of the Pulgas Ridge Open Space Preserve for public open space use.

POLICY EM-4.5  Support the efforts of non-profit organizations to expand and manage protected open space.

POLICY EM-4.6  Establish public access to public open space lands appropriate to the character and conservation value of the open space.

POLICY EM-4.7 Prohibit the sale of City-owned open space properties.

ACTIONS

ACTION EM-4.1 Seek additional funding sources, including State and federal programs, to finance open space acquisition, restoration and management.

ACTION EM-4.2 Review new development proposals for opportunities to create open space.

ACTION EM-4.3 Establish and work to achieve City standards for open space based on population.

ACTION EM-4.4 Study the need for an Open Space Ordinance.

ACTION EM-4.5 Encourage the development of riparian open space areas for publicly-accessible, low-impact recreation.

ACTION EM-4.6 Implement the approved Trails Connection Plan.

Hydrology

This section contains background information and goals, policies and actions related to water supply, water quality and wastewater and stormwater services in San Carlos.

Background Information

Water Supply

California Water Service Company (Cal Water), the main water provider in the city, purchases water from the San Francisco Public Utilities Commission. Water consumed in San Carlos is from Cal Water's Bayshore district, the source of which is predominantly the Hetch Hetchy reservoir, located in the Sierra Nevada mountains. While State law calls for water to come from other lower elevation reservoirs, Hetch Hetchy continues to be the source for most of San Carlos' water due to its higher water quality. The San Carlos water infrastructure system includes 21 storage tanks and 29 booster pumps. Although Cal Water is the primary water service provider in San Carlos, the Mid- Peninsula Water District also serves approximately 100 residential and commercial accounts in the city. Additionally, some properties rely on wells for the provision of water.

Cal Water encourages water conservation through rebate programs, providing low flow shower heads at no cost, distributing literature on conservation practices and giving talks at local schools. Cal Water does not currently have a recycled water system in San Carlos,

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but it does offer water recycling in other parts of the State and estimates that water recycling will likely be offered in San Carlos within the next few years.

Groundwater

The city is located within the San Mateo Subbasin of the Santa Clara Valley Groundwater Basin. The San Mateo Subbasin is bounded by the Westside Basin to the north, San Francisco Bay to the east, San Francisquito Creek to the south and the Santa Cruz Mountains to the west. The Subbasin has two main water-bearing units: the Holocene and Pleistocene alluvium and the Santa Clara Formation. The alluvium is the most important water-bearing unit in the Subbasin, and most of the wells in the Subbasin draw water from the deeper aquifers of this unit. A relatively shallow water table aquifer overlies the aquifers in the lowland areas. Groundwater is commonly found at less than 5 feet below grade in flatland areas.

Water Quality

Residents in San Carlos drink water from the Bayshore District of Cal Water. Supply from this district exceeded water quality standards in 2007. Testing includes primary and secondary standards. Primary

standards limit levels of contaminants in drinking water. Secondary standards limit substances that affect the taste, odor, or appearance of water; five inorganic chemicals are identified: calcium, chloride, magnesium, sodium and sulfate. The 2007 Water Quality Report for primary standards identified fluoride, halo acetic acids, trihalomethanes, chloramine, copper and lead. None of the identified substances in either category exceed public health standards.

The health of the watersheds in San Carlos, described in the Biological Resources section of this Element, is typical of urbanized areas. Upland sections of the creeks tend to have less pollution while urbanized portions of the waterways contain contaminants. Various contaminants have been identified in San Carlos creeks including polychlorinated biphenyls (PCBs), which can persist in the tissues of animals found in the creeks, as well as ultimately pollute the Bay. The City considers the habitat functions of streams and riparian corridors a priority and, therefore, developed watershed protection mechanisms such as creek setbacks, regulations for construction adjacent to creeks and pesticide application in watershed areas. However, water from local watersheds is not used for drinking in San Carlos.

Wastewater

The Public Works Department operates and maintains the wastewater collection system in the city. The Public Works wastewater system also serves several outside sewer districts including Devonshire Canyon, Scenic Heights, Emerald Lake and the unincorporated portion of the Harbor Industrial Area. Properties in these areas are subject to an Outside Sewer Service Agreement with the City of San Carlos. These properties must be located in the SOI and must demonstrate consistency with applicable General Plan policies. In assigning sewer service to these properties, the City will give priority to single-family residences with failing septic tanks. Collected wastewater is delivered to a pump station operated by the Silicon Valley Clean Water~~outh Bayside System Authority~~ (SVCWBSA). This wastewater is then pumped to the SVCWBSA treatment plant, located in Redwood Shores, east of the city. There are 106 miles of sewer lines in San Carlos ranging in size from 5 to 27 inches. The average annual wastewater flow for the City of San Carlos is about 2.6 million gallons per day (MGD). Wastewater flows in San Carlos have generally stayed constant despite increased development~~decreased in the last 13 years by 25 percent~~ due to water conservation efforts and sewer main replacement.

The SVCWBSA plant is a regional wastewater treatment facility that serves San Carlos and the nearby municipalities of Belmont, Redwood City, Menlo Park, Portola Valley and portions of Atherton, Woodside, East Palo Alto and San Mateo County. Altogether, the SVCWBSA plant serves over 200,000 customers. The current capacity of the plant is 29 million gallons per day (MGD). The wastewater system has sufficient treatment capacity to meet Regional Water Quality Control Board (RWQCB) Standards.

Stormwater

As mentioned above, there are two watersheds in San Carlos: the Pulgas Creek Watershed and the Cordilleras Creek Watershed. The creeks within the watersheds and the city's SOI that receive stormwater drainage include Belmont, Pulgas Brittan and Cordilleras Creeks. These creeks are unlined channels that eventually empty into the San Francisco Bay. The creeks do not have sufficient capacity to carry stormwater during high tides. In addition, flooding results from limited upstream capacity for stormwater.

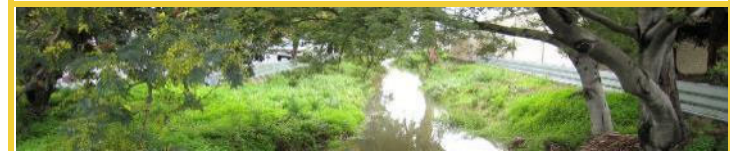
The City of San Carlos maintains all stormwater facilities within the city. There are approximately 27

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miles of closed conduits in the city that receive stormwater drainage through 680 inlets. Stormwater capacity within San Carlos varies based on calculated need, ~~with most storm drains accepting 100-year flood events~~. The City of San Carlos operates approximately 6,500 linear feet of flood control channel with a capacity of over 500 cubic feet. The drainage system dates to the early twentieth century and, as such, does not meet today's design standards. Repairs are completed as-needed. Developers or property owners are responsible for adding extensions to the stormwater system when new development occurs.

San Carlos participates in San Mateo County's Stormwater Management Plan, which outlines maintenance activities to be undertaken by cities; targets industrial and illicit discharge; describes public information about stormwater; provides guidelines to cities for construction permits; and establishes monitoring programs to measure the success of the other portions of the plan.

Goals, Policies and Actions



GOAL EM-5

Assure a high level of domestic water quality, promote water conservation and reduce toxics in run-off, including stormwater and the sanitary sewer system.

POLICIES

- POLICY EM-5.1** Reduce the discharge of toxic materials into the city's sanitary sewer and stormwater collection system by promoting the use of Best Management Practices (BMPs).
- POLICY EM-5.2** Promote the use of less toxic household and commercial cleaning materials.

POLICY EM-5.3 Promote the conservation and efficient use of water in new and existing residences and by commercial and industrial consumers.



POLICY EM-5.4 Encourage the use of drought-tolerant plants and efficient watering techniques for all City landscaping.



POLICY EM-5.5 Recycled water distribution system (purple pipe) should be used for landscaping and other non-potable water uses for residential, commercial and industrial customers, where technically and financially feasible.



POLICY EM-5.6 Continue public education programs on water issues working with water service providers, local non-profits and other environmental organizations, including conservation measures and BMPs for residents, businesses, contractors and City employees.



POLICY EM-5.7 Encourage site designs that manage the quantity and quality of storm water run-off.



POLICY EM-5.8 Work with water service providers to provide high quality domestic water.

POLICY EM-5.9 Sewer service may be extended outside the city limit only as required to protect public health due to failing septic systems in accordance with the following policies:

- Extension of sewer service would be denied if there is insufficient capacity in the wastewater collection system.
- No change to the land use would occur.
- The extension of sewer service could not be used to enable further subdivision.
- The property owner would be required to annex as such time as a complete consolidation of properties could be annexed.

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- The property owner would be required to complete all improvements necessary to meet City building and engineering standards.
- Applicant to assure payment of all sewer connection, plan checking and inspection fees.


POLICY EM-5.10 Require the evaluation of potential groundwater depletion that could occur from new development through dewatering.

ACTIONS

ACTION EM-5.1 Evaluate amending the Zoning Code to maximize permeable surfaces or other water catchment methods for new development as applicable.

ACTION EM-5.2 Utilize bioswales and other bio-filtration systems as applicable to cleanse run-off before it enters creeks and the San Francisco Bay.

ACTION EM-5.3 Minimize road surface pollutant runoff by utilizing appropriate methods such as regular street sweeping.

ACTION EM-5.4  Implement Climate Action Plan measures to provide for water-efficient landscaping.

ACTION EM-5.5 Establish water conservation goals for City buildings and operations.

ACTION EM-5.6 Evaluate potential incentives for the use of drought-tolerant landscaping and recycled water for landscape irrigation.

ACTION EM-5.7 Amend the Municipal Code to codify the Outside Sewer Service policies for residential uses.

ACTION EM-5.8 Develop a recycled water implementation plan, which would identify potential sources and uses of recycled water, environmental benefits, capital and operating costs and potential utility providers.

ACTION EM-5.9 Monitor outside agencies responsible for cleaning up known toxic sites.

ACTION EM-5.10 Implement the NPDES Stormwater Permit and for those properties exempt from the Permit, require a stormwater pollution prevention plan, including use of best management practices, to control erosion and sedimentation during construction.

Air Quality

Air is a critical component of the natural environment and the availability of clean, non-polluted air is an important factor for human health and quality of life for San Carlos residents. The primary factors that determine air quality are the locations of air pollutant sources and the amount of pollutants emitted from those sources. Meteorological and topographical conditions are also important factors. Atmospheric conditions, such as wind speed, wind direction and air temperature gradients, interact with the physical features of the landscape to determine the movement and dispersal of air pollutants.

Regulatory Framework

The federal Clean Air Act (CAA) governs air quality in the United States. In addition to being subject to federal requirements, air quality in California is also governed by more stringent regulations under the California CAA. At the federal level, the United States Environmental Protection Agency (U.S. EPA) administers the CAA. The California CAA is administered by the California Air Resources Board (CARB) at the State level and by the Air Quality Management Districts at the regional and local levels. The Bay Area Air Quality Management District (BAAQMD) regulates air quality at the regional level, which includes the nine-county Bay Area.

United States Environmental Protection Agency

The EPA is responsible for enforcing the federal CAA. The EPA is also responsible for establishing the National Ambient Air Quality Standards (NAAQS). The NAAQS are required under the 1977 federal CAA and subsequent amendments. The EPA regulates emission sources that are under the exclusive authority of the federal government, such as vehicles, aircraft, ships and locomotives. The agency has jurisdiction over emission sources outside State waters (e.g. beyond the

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outer continental shelf) and establishes various emission standards, including those for vehicles sold in states other than California. Automobiles sold in California must meet the strict emission standards established by the CARB.

California Air Resources Board

In California, the CARB, which is part of the California Environmental Protection Agency, is responsible for meeting the State requirements of the federal CAA, administering the California CAA and establishing the California Ambient Air Quality Standards (CAAQS). The California CAA, as amended in 1992, requires all air districts in the State to endeavor to achieve and maintain the CAAQS. The CAAQS are generally more stringent than the corresponding federal standards and incorporate additional standards for sulfates, hydrogen sulfide, vinyl chloride and visibility reducing particles. The agency is responsible for setting emission standards for vehicles sold in California and for other emission sources, such as consumer products and certain off-road equipment. The CARB established passenger vehicle fuel specifications, which became effective in 1996.

Bay Area Air Quality Management District

Regional air quality is regulated by the BAAQMD. The BAAQMD regulates stationary sources (with respect to federal, State and local regulations), monitors regional air pollutant levels (including measurement of toxic air contaminants (TACs)), develops air quality control strategies and conducts public awareness programs. The BAAQMD has also developed CEQA Guidelines that establish significance thresholds for evaluating new projects and plans and provide guidance to lead agencies for evaluating air quality impacts of projects and plans.

The BAAQMD is in the process of preparing the 2009 *Bay Area Clean Air Plan* which will update the *Bay Area 2005 Ozone Strategy* in accordance with California CAA requirements to implement “all feasible measures” to reduce ozone. The 2009 Plan will also consider the impacts of ozone control measures on particulate matter, air toxics and GHGs. Additionally, the 2009 Bay Area Clean Air Plan will review progress in improving air quality in recent years and will establish emission control measures to be adopted or implemented from 2009 through 2012. The Plan will also address PM₁₀ and PM_{2.5}, defined below, as well as climate change.

Criteria Air Pollutants and Effect

The CARB and the EPA currently focus on five “criteria pollutants” as indicators of air quality and as such air quality studies generally focus on those five pollutants: CO, O₃, NO₂, SO₂ and suspended particulates (i.e. PM₁₀ and PM_{2.5}).

- **Carbon Monoxide.** CO, a colorless and odorless gas, interferes with the transfer of oxygen to the brain. It can cause dizziness and fatigue, and can impair central nervous system functions. CO is emitted almost exclusively from the incomplete combustion of fossil fuels. CO is a non-reactive air pollutant that dissipates relatively quickly, so ambient CO concentrations generally follow the spatial and temporal distributions of vehicular traffic. The highest CO concentrations measured in the Bay Area are typically recorded during the winter.
- **Ozone.** O₃, a colorless toxic gas, is the chief component of urban smog. Short-term O₃ exposure can reduce lung function in children, make persons susceptible to respiratory infection and produce symptoms that cause people to seek medical treatment for respiratory distress. Long-term exposure can impair lung defense

mechanisms and lead to emphysema and chronic bronchitis. Although O₃ is not directly emitted, it forms in the atmosphere through a chemical reaction between reactive organic gas (ROG) and nitrogen oxides (NO_x) under sunlight. ROG and NO_x are primarily emitted from automobiles and industrial sources. Highest O₃ concentrations occur during summer and early autumn, on days with low wind speeds or stagnant air, warm temperatures and cloudless skies.

- **Nitrogen Dioxide.** NO₂, a reddish-brown gas, irritates the lungs. It can cause breathing difficulties at high concentrations. Like O₃, NO₂ is not directly emitted, but is formed through a reaction between nitric oxide (NO) and atmospheric oxygen. NO and NO₂ are collectively referred to as nitrogen oxides (NO_x) and are major contributors to O₃ formation. NO₂ also contributes to the formation of PM₁₀ (see discussion of PM₁₀ below).
- **Sulfur Oxides.** Sulfur oxides, primarily SO₂, are a product of high-sulfur fuel combustion. The main sources of SO₂ are coal and oil used in power stations, in industries and for domestic heating. SO₂ is an irritant gas that attacks the

throat and lungs. It can cause acute respiratory symptoms and diminished ventilator function in children. SO₂ concentrations have been reduced to levels well below the State and national standards, but further reductions in emissions are needed to attain compliance with standards for PM₁₀, of which SO₂ is a contributor.

- **Suspended Particulate Matter.** Particulate matter pollution consists of very small liquid and solid particles suspended in the air, which can include smoke, soot, dust, salts, acids and metals. Particulate matter also forms when industry and gaseous pollutant undergo chemical reactions in the atmosphere. Respirable particulate matter (PM₁₀) and fine particulate matter (PM_{2.5}) represent fractions of particulate matter. PM₁₀ refers to particulate matter less than 10 microns in diameter and PM_{2.5} refers to particulate matter that is 2.5 microns or less in diameter. Major sources of PM₁₀ include motor vehicles; wood burning stoves and fireplaces; dust from construction, landfills and agriculture; wildfires and brush/ waste burning; industrial sources; windblown dust from open lands; and atmospheric chemical and photochemical reactions. PM_{2.5} results

primarily from diesel fuel combustion (from motor vehicles, power generation and industrial facilities), residential fireplaces and wood stoves.

- PM₁₀ and PM_{2.5} pose a greater health risk than larger-size particles, because these tiny particles can penetrate the human respiratory system's natural defenses and damage the respiratory tract increasing the number and severity of asthma attacks, cause or aggravate bronchitis and other lung diseases and reduce the body's ability to fight infections.

Toxic Air Contaminant Levels

TACs are a broad class of compounds known to cause morbidity or mortality (usually because they cause cancer) and include, but are not limited to, the criteria air pollutants listed above. TACs are found in ambient air, especially in urban areas, and are caused by industry, agriculture, fuel combustion and commercial operations (e.g. dry cleaners). Diesel exhaust is the most common source of TACs. TACs are typically found in low concentrations, even near their source (e.g. benzene near a freeway). Because chronic exposure can result in adverse health effects, TACs are regulated at the regional, State and federal level.

Background

This section describes the San Carlos climate and existing air quality conditions.

Climate

San Carlos is located in the western portion of the San Francisco Bay Area Air Basin. The basin includes the counties of San Francisco, Santa Clara, San Mateo, Marin, Napa, Contra Costa and Alameda, along with the southeast portion of Sonoma County and the southwest portion of Solano County. San Carlos is located in the Peninsula climate subregion of the Bay Area and the climate is characterized by warm dry summers and cool moist winters.

Temperatures in San Carlos tend to be less extreme compared to inland locations due to the moderating effect of the Pacific Ocean and the Bay. In summer, high temperatures are generally in the high 70's and in the 50's during winter. Low temperatures range from the 50's in summer to the 30's in winter.

Existing Air Quality Conditions

Air quality is affected by the rate of pollutant emissions and by meteorological conditions such as wind speed, atmospheric stability and mixing height, all of which affect the atmosphere's ability to mix and disperse pollutants. Long-term variations in air quality typically result from changes in air pollutant emissions, while short-term variations result from changes in atmospheric conditions.

For the most part, San Carlos enjoys good air quality due to the almost persistent northwesterly flow of air. Episodes of high particulate levels can occur in late fall and winter when high pressure systems produce extended periods of light winds and low-level temperature inversions. Although less common, this pattern in summer can produce fair weather and very warm temperatures throughout the Bay Area. This condition frequently produces poor atmospheric mixing that results in degraded regional air quality. Ozone standards traditionally are exceeded in downwind portions of the Bay Area when this condition occurs during the warmer months of the year.

6 ENVIRONMENTAL MANAGEMENT ELEMENT

In 2007, the BAAQMD operated a network of 27 permanent monitoring stations in the Bay Area. In addition, CARB operated one station. These stations monitored air pollutant levels continuously. The closest station is located in Redwood City at 897 Barren Avenue.

Attainment Status

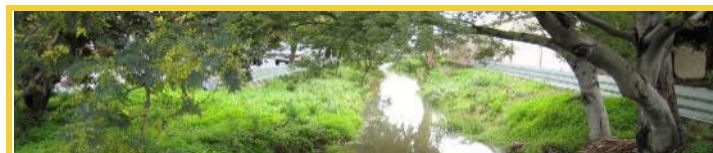
Areas that do not violate ambient air quality standards are considered to have attained the standard. Violations of ambient air quality standards are based on air pollutant monitoring data and are judged for each air pollutant.

For the five criteria pollutants, attainment status is as follows:

- **Carbon Monoxide.** Maintaining CO standards for over a decade and is classified attainment maintenance by the EPA.
- **Ozone.** The Bay Area as a whole does not meet State or federal ambient air quality standards for ground level O₃. This is non-attainment and is considered serious by the State.
- **Nitrogen Dioxide.** The region is in attainment for this pollutant.

- **Sulfur Oxides.** The region is in attainment for this pollutant.
- **Suspended Particulate Matter.** The region does not meet State standards for particulate matter (both PM₁₀ and PM_{2.5}) and does not meet federal standards for PM_{2.5}.


Goals, Policies and Actions





GOAL EM-6

Support atmospheric conditions that are clean, healthful, provides maximum visibility and meets air quality standards.

POLICIES

- POLICY EM-6.1**  Support and comply with the Bay Area Air Quality Management District, State and federal standards and policies that improve air quality in the Bay Area.

POLICY EM-6.2  Support and encourage commercial uses to adopt environmentally friendly technologies and reduce the release of pollutants.


POLICY EM-6.3  Support the reduction of emissions of particulates from wood burning appliances, construction activity, automobiles, trucks and other sources.

POLICY EM-6.4 Implement Bay Area Air Quality Management District (BAAQMD) guide- lines that establish minimum screening or buffer distances between emissions sources and sensitive receptors. Exceptions may be made for projects that do not meet the distance requirements but can be determined compatible with adjacent uses through a project-specific study that determines potential health risk. Mitigation measures shall be required to reduce these risks to acceptable levels.

POLICY EM-6.5 Consider potential impacts from land uses that may emit pollution and/or odors when locating air pollution sources near sensitive receptors. Air pollution sources could include free-ways, industrial uses, hazardous materials storage, waste disposal/transfer stations and other similar uses.

POLICY EM-6.6 BAAQMD recommended measures to reduce PM₁₀ and exhaust emissions associated with construction shall be applied to new development in San Carlos.

ACTIONS

ACTION EM-6.1  Require review by appropriate agencies of development applications that may create potential air quality impacts to assure compliance with relevant regulations.

ACTION EM-6.2 Provide information to the public on Best Management Practices including low emission alternatives to wood burning appliances.



ACTION EM-6.3 For use on City-operated properties, explore options for landscaping equipment which will reduce contribution of air pollution. Encourage the same options by residents and businesses.



Greenhouse Gas Emissions

Background

This section contains background information and goals, policies and actions related to GHG emissions.

Climate Action Plan

The City is taking a proactive approach in addressing GHG emission reduction by developing a Climate Action Plan (CAP) in concert with this General Plan. Addressing climate change in this manner defines San Carlos as an innovative member of the local government community. Key components of the CAP are integrated into the General Plan. The General Plan goals,

policies and actions reinforce the CAP. The CAP is intended to be updated on a more regular basis than the General Plan, ensuring that implementation of the City efforts to assure GHG emissions are in compliance with current regulation. This approach is especially important given the constant flux of new research findings, technological improvements and policy updates dealing with climate change.

Baseline Greenhouse Gas Emissions

The community GHG emission inventory found that an estimated 267,237 metric tons of carbon dioxide equivalent (CO₂e) were released in 2005, the baseline year. The largest source of emissions was the transportation sector, with approximately 56 percent of all emissions. The commercial/industrial/municipal sector produced approximately 20 percent, the residential sector amounted to approximately 18 percent, and the waste sector released nearly 5 percent of the community's GHG emissions. City operations account for approximately 0.6 percent of the GHG emissions.

Projected Greenhouse Gas Emissions

The Inventory found that if San Carlos continues to release GHGs at its 2005 rate, the community's

emissions will increase to 365,787 metric tons per year by 2030. That would be an increase of nearly 37 percent over a span of 25 years. The increase can be attributed to estimated increases in population, consumption, households and commercial activity.

Climate Change Strategies and Adaptations

To achieve a 15 percent reduction of the baseline by 2020 and 35 percent reduction by 2035, the CAP provides a strategic policy focus on five areas: Building Efficiency/Site Design; Auto Emission Reduction; Low Carbon Energy Use; Alternative, Non-Automotive Travel Modes; and a Waste Reduction program. In total, the Plan includes 23 broad-based goals and 42 reduction measures. Each reduction measure is tied to a target whereby a specific number of metric tons CO₂e would be reduced per year.

The climate action goals and measures in the CAP are separated into three chapters for analysis in the CAP: Energy, Transportation and Land Use and Solid waste. In the General Plan, these goals and measures for transportation and land use are also reflected in the Housing and Land Use Elements. For instance, increased housing density near transit not only reduces

emissions through reduced energy consumption through the sharing of walls, air conditioning/heating units and infrastructure, but it also reduces residents' vehicle miles traveled, achieving emission reduction in the transportation sector.

Also included in the CAP and carried forward into the General Plan are adaptation strategies that may be necessary as the climate changes and sea levels rise. Adaptation measures are important in order to allow the community to proactively prepare for potential effects. The challenge will be reducing the effects to the lowest level possible and ensure that the community is prepared. Adaptation strategies are also included in the Community Safety and Services Element of the General Plan.



Open Space in San Carlos


Goals, Policies and Actions





GOAL EM-7


Develop a Greenhouse Gas Emissions Inventory and develop and implement a Climate Action Plan to address San Carlos' contribution to Global Climate Change.


POLICIES


POLICY EM-7.1  Take appropriate action to address climate change and reduce greenhouse gas emissions.

POLICY EM-7.2  Monitor and participate in federal, State and regional policies and directives relating to climate change, and make adjustments to City policies and programs as appropriate.

POLICY EM-7.3  Participate in regional, State and federal efforts to reduce greenhouse gas emissions and mitigate the impacts resulting from climate change.

POLICY EM-7.4  Utilize the expertise of regional, State and federal agencies when developing, revising and implementing greenhouse gas reduction strategies.

POLICY EM-7.5  Ensure consistency with the San Carlos Climate Action Plan through adjustment of City policies, programs, and actions as appropriate.

POLICY EM-7.6  Support greenhouse gas (GHG) emission reduction measures and climate change resiliency strategies that are cost effective and help create an environmentally sustainable, livable and equitable community. The cost of implementation to the City and the private sector shall be considered prior to the adoption of any GHG reduction strategy.

POLICY EM-7.7 Collaborate with stakeholders and volunteers in the formulation and implementation of greenhouse gas reduction strategies.



ACTIONS

ACTION EM-7.1 Implement strategies in the Climate Action Plan to achieve the greenhouse gas reduction target.



ACTION EM-7.2 Develop criteria for reviewing all proposed projects within the city to determine consistency with the Climate Action Plan (CAP) and review projects meeting the identified criteria to ensure consistency with the CAP.



ACTION EM-7.3 Update the Climate Action Plan (CAP) every five years, including but not limited to:



- a. A revised greenhouse gas (GHG) emissions inventory;
- b. An overview of new knowledge on the causes and anticipated impacts of climate change;

c. Collaborate with stakeholders and volunteers to assist in the preparation and implementation of the effective CAP.

d. An assessment of the appropriateness and adequacy of San Carlos' GHG reduction target;

e. A summary of the quantified cost per metric ton of carbon dioxide equivalent reduced per emission reduction measure;

f. An evaluation of the effectiveness of existing programs; and

g. Modifications to goals, policies and strategies as needed to achieve the GHG reduction target.

ACTION EM-7.4 Develop and implement a comprehensive outreach program that works with locally-based organizations and volunteers to educate the public about the Climate Action Plan and greenhouse gas reduction strategies and programs.




6 ENVIRONMENTAL MANAGEMENT ELEMENT




GOAL EM-8


Prepare for the potential impacts of climate change through the adoption of adaptation and resiliency strategies.

POLICIES


POLICY EM-8.1  Adjust the Climate Action Plan as necessary to comply with current law and new threats to the community that may develop as a result of climate change.


POLICY EM-8.2  Partner with neighboring communities and regional agencies to develop and implement regional adaptation programs.

ACTIONS

ACTION EM-8.1  Update the Climate Action Plan every five years to re-evaluate projections for

climate change threats and the appropriateness of adaptation and resiliency strategies.

ACTION EM-8.2  Incorporate climate change threats into the City's Emergency Incident Plan and Emergency Operations Center training.

ACTION EM-8.3  Cooperate with regional agencies and partner with neighboring communities to prepare for and mitigate coastal inundation as a result of sea level rise.




View of San Francisco Bay from San Carlos hills





GOAL EM-9


Reduce energy consumed citywide.


POLICIES


POLICY EM-9.1  Provide assistance and support efforts for increased energy efficiency for businesses and residences through a combination of incentives and regulations.


POLICY EM-9.2  Support on-site generation of energy through alternative forms of energy production such as solar panels, wind turbines and biomass facilities.

POLICY EM-9.3  Emphasize energy conservation in local government housing assistance programs.


POLICY EM-9.4  Provide outreach to residents, businesses and property owners on incentives, regulations and programs to increase energy efficiency.

POLICY EM-9.5  Design all new construction and major remodels of government agency buildings to relevant green building standards.

POLICY EM-9.6  Encourage new private construction and major remodels to be designed to meet or exceed Green Uniform Building Code requirements.

POLICY EM-9.7  Implement energy efficiency in City owned and operated facilities to reduce municipal energy costs and serve as a model for the community.

ACTIONS

ACTION EM-9.1  Implement measures in the Climate Action Plan intended to reduce energy consumption.

6 ENVIRONMENTAL MANAGEMENT ELEMENT

ACTION EM-9.2 Adopt a Green Building Code as called for in the Climate Action Plan.



ACTION EM-9.3 Review and amend the Zoning Ordinance to identify and reduce barriers to the establishment of on-site energy generators.



ACTION EM-9.4 Integrate energy cost reduction measures into City's facilities where feasible.



ACTION EM-9.5 Encourage energy efficiency audits and upgrades of facilities to which the City provides funding, including the fire department and sewage service.



ACTION EM-9.6 Periodically investigate funding resources available to assist the City in energy conservation or on-site energy production at City facilities.



GOAL EM-10

Promote local food production and distribution systems

POLICIES

POLICY EM-10.1 Promote consumption of food grown in the local region.



POLICY EM-10.2 Support the establishment of community gardens, especially within established residential neighborhoods, encouraging organic, edible plants.



POLICY EM-10.3 Encourage neighborhood grocery stores, farmers markets and food assistance programs to increase their use of locally grown/prepared goods.



POLICY EM-10.4 Encourage institutions, such as schools, hospitals, colleges, government agencies and businesses to provide foods produced locally and in the region. Encourage and support active school garden programs.



POLICY EM-10.5 Encourage residents to grow produce.



ACTIONS

ACTION EM-10.1 Support the establishment of organic, edible food gardens on commercial, public and quasi-public properties.

ACTION EM-10.2 Consider utilizing undeveloped City property for urban agricultural uses where appropriate.



GOAL EM-11

Promote and expand public and alternative modes of transportation.

POLICIES

POLICY EM-11.1 Encourage and support maximum allowable density Transit Oriented Development projects within Planning Areas 1, 2 and 3.



POLICY EM-11.2 Work with transit service providers to increase the frequency, reliability and quality of transit service.



POLICY EM-11.3 Support the addition of amenities, such as bus shelters and directional signage, to promote increased transit ridership.



6 ENVIRONMENTAL MANAGEMENT ELEMENT

POLICY EM-11.4 Provide an integrated network of bicycle and pedestrian thoroughfares that connects jobs and housing to other city destinations, as recommended in the San Carlos Bicycle and Pedestrian Master Plan.



POLICY EM-11.5 Evaluate and encourage a shuttle system in San Carlos to connect residential neighborhoods to commercial areas, transit and other destinations in San Carlos.



POLICY EM-11.6 Encourage employers to incentivize employee use of mass transit and alternative modes of transportation.



POLICY EM-11.7 Support programs to reduce vehicle trips associated with transporting students to and from schools.



POLICY EM-11.8 Promote a car sharing program.



POLICY EM-11.9 Coordinate with major employers, neighboring municipalities, transit agencies and providers to enhance regional transit and shuttle service.



POLICY EM-11.10 Evaluate and encourage new forms of mass transit.



POLICY EM-11.11 Amend the Zoning Ordinance to create a Transportation Demand Management (TDM) Ordinance that contains strategies to reduce vehicle trips.



POLICY EM-11.12 Include in the Transportation Demand Management Ordinance a requirement that new office development over a certain size include showers and safe and secure bike racks to encourage employees to bicycle to work.



ACTIONS

ACTION EM-11.1 Implement measures in the Climate Action Plan to reduce transportation emissions.



ACTION EM-11.2 Implement traffic calming devices to increase roadway safety for bicycles and pedestrians.

ACTION EM-11.3 Design streets to accommodate all modes of transportation, including emergency vehicles, and provide for a safe and attractive pedestrian experience.



ACTION EM-11.4 Coordinate with neighboring jurisdictions, the County and regional agencies to expand bicycle connections to regional destinations.



ACTION EM-11.5 Encourage transit providers to utilize vehicles with low polluting technologies and to reduce or eliminate idling.



Solid Waste

This section provides background information about solid waste providers in San Carlos and goals, policies and actions related to solid waste.

Background

Waste Haulers

Solid waste and recyclables are collected within the city by a provider contracted through the South Bay Waste Management Authority (SBWMA). This is a joint

powers agreement with 12 member agencies. San Carlos solid waste and recyclables are initially taken to the Shoreway Recycling and Disposal Center (SRDC) which receives about 150 tons per day (five-day average) of solid waste and 62 tons per day of recyclables from the city.

SBWMA is currently in the selection process for a new contract to begin on January 1, 2011. The selected provider will be a recycling and solid waste services management company that provides residential and commercial collection, transfer, recycling and composting. In addition, the provider will be responsible for household hazardous waste disposal. In March 2009, the City began a food scraps program that works in concert with the yard waste recycling program. It is an innovative program in that it encourages the recycling of household food scraps including paper products contaminated with food waste that have previously been omitted from the recycling chain. The Feed the Pail, Feed the Planet food waste program is an integral part of the Waste Management Authority's goal of reducing the amount of household waste that is sent to the landfill.

6 ENVIRONMENTAL MANAGEMENT ELEMENT



Waste Generation and Diversion Rates

In 1989, California passed the Waste Management Act which requires municipalities to divert 50 percent of their waste from landfills. Between 1999 and 2004, San Carlos was unable to reach the 50 percent diversion goal. According to the San Mateo Recycle Works program, however, San Carlos improved the diversion rate by 42 percent in 2005 and by 47 percent in 2006. The City's enhanced efforts to enforce a construction and demolition Ordinance are expected to improve the diversion rate in 2009 by 60 percent.

Shoreway Recycling and Disposal Center

The SBWMA runs the Shoreway Recycling and Disposal Center (SRDC), located on the border of San Carlos and Redwood City. The SRDC is a solid waste transfer station and material recovery facility with a permitted operating capacity of 3,000 tons per day.

There are plans to reconfigure the transfer station and build a new recycling facility capable of handling a single stream recycling program for San Carlos and the 11 partner agencies that use this facility. This reconfiguration will increase the level of recycling in San

Carlos and help the City meet its 50 percent recycling goal under AB 939.

Landfills

The majority of the solid waste collected in San Carlos is transported to the Ox Mountain Landfill in Half Moon Bay. The landfill, owned and operated by Allied Waste, is expected to reach capacity in 2023. In 2007, a total of 603,160 tons of solid waste was disposed at the Ox Mountain Landfill, of which 34,670 tons (or 5.74 percent) came from San Carlos.

Recycling

Acceptable residential recyclable material includes plant materials, mixed paper, plastic (#1-7), aluminum and bi-metal cans, glass, used motor oil, batteries and cell phones. Commercial recycling includes plastic, glass, cardboard, mixed office paper, food scraps and plant materials.

In 2006, the City of San Carlos collected 2,732 tons of recyclable material. San Carlos recently participated in a pilot program to collect household batteries and cell phones. This program is now being expanded to other cities within the jurisdiction of the South Bay side

Waste Management Authority (SBWMA), of which San Carlos is a member.

Composting

In March 2009, San Carlos instituted a food scrap and yard trimming program. Single-family home residents are able to compost food scraps and yard trimmings.

Future Expansion of Services

SBWMA is conducting a procurement process to implement a comprehensive array of new solid waste and recycling collection services beginning January 1, 2011. The new services will convert the residential collection services to a cart-based program with weekly collection for solid waste, recyclables and organics (plant materials and food scraps). Residents will also be able to fully commingle all recyclables (paper, glass, plastics and metals) in the cart along with recycling a wider variety of materials including used oil, oil filters and household batteries and cell phones.

The SRDC facility will also undergo substantial renovation and environmental enhancements in preparation for the rollout of new collection services to be completed Fall 2010. New features include a new

material recovery facility, expanded transfer stations and a new environmental education center. These facility improvements will result in a new material recovery facility that will handle a 20,000 ton per year increase from residential and commercial customers.

Goals, Policies and Actions



GOAL EM-12


Reduce solid waste disposal and increase recycling.


POLICIES

POLICY EM-12.1 Work with the local waste management authority to increase community diversion of solid waste that meets or exceeds the targeted rate in the Climate Action Plan.





6 ENVIRONMENTAL MANAGEMENT ELEMENT


POLICY EM-12.2  Minimize City government waste by expanding reduction, recycling and composting programs and practicing reuse.


POLICY EM-12.3  Encourage the public and private sectors to utilize reusable, returnable, recyclable, environmentally friendly products and repairable goods through incentives, educational displays and activities, as well as City purchasing policies and practices.


ACTIONS


ACTION EM-12.1  Implement measures in the Climate Action Plan to reduce solid waste and increase recycling and reuse.


ACTION EM-12.2  Consider incentives to households and businesses to reduce the volume of solid waste sent to the landfill.

ACTION EM-12.3  Require adequate facilitation of recycling in all new development and new commercial tenancies.

ACTION EM-12.4  Encourage recycling programs in existing multi-family buildings.

ACTION EM-12.5  Encourage building deconstruction in lieu of demolition. Require a construction and demolition debris waste plan to maximize recycling rates.

ACTION EM-12.6  Encourage the use of recycled pavement and/or permeable products for public and private parking lots and driveways.

ACTION EM-12.7  Support the commercial food scraps and organics recycling program.

ACTION EM-12.8 Evaluate options for increasing ease of properly disposing household hazardous waste, including but not limited to electronics, fluorescent bulbs, thermometers, spent fire extinguishers and pharmaceuticals.

Community Involvement in Environmental Management

This section includes background information on community involvement in environmental management and goals, policies and actions related to public awareness and public participation in environmental issues.

Background Information

The City of San Carlos is committed to working with residents to address environmental issues. Part of the public process includes outreach efforts to engage the public on the issues at hand, and public participation opportunities including workshops, study sessions and Planning Commission and City Council meetings. The City values the expertise its residents possess on the environmental issues affecting the city. Citizens are encouraged to participate in committees and other forums to make sure that local knowledge and expertise informs environmental policies and programs. Examples of past opportunities to address environmental issues in San Carlos include the Natural Resources Task Force and the Flooding, Land Use and Creeks Ad Hoc Committee. More recently, San Carlos Green has

been an active collaborator in the area of promoting the urban forest, recycling and the CAP.



Goal, Policies and Actions



GOAL EM-13

Increase public awareness of environmental issues and promote public participation in environmental policymaking and programs.

POLICIES

- POLICY EM-13.1**  Encourage the active participation of residents, businesses, and other stakeholders in the City's environmental programs.
- POLICY EM-13.2**  Support the efforts of local non-profit organizations involved in protecting the natural environment.

6 ENVIRONMENTAL MANAGEMENT ELEMENT

POLICY EM-13.3 Support the expansion of environmental education programs and curriculum.



ACTIONS

ACTION EM-13.1 Provide information about the City's environmental issues, goals and programs to the public on a regular basis.

ACTION EM-13.2 Provide the community with information on City policies and practices that support good conservation and re-source management.

ACTION EM-13.3 Evaluate the development of an environmental sustainability implementation plan.

ACTION EM-13.4 Continue to encourage local businesses to utilize sustainable practices.

ACTION EM-13.5 Encourage the development of a committee or commission to serve as a permanent citizen's advisory

committee to aid the City with developing and implementing environmental management policies, researching best practices, researching available support and funding options and presenting program and code proposals to the City.

ACTION EM-13.6 Actively seek outside grants, donations, tax relief, or other sources of funding to minimize City costs associated with achieving natural resource goals.



Open space near San Carlos

Parks and Recreation Element

7



7 PARKS AND RECREATION ELEMENT

The Parks and Recreation Element addresses parks, open space, trails and recreational activities available to residents and visitors to San Carlos. This element provides information and policy guidance to ensure adequate provision of parks and recreational opportunities in the City of San Carlos.

Contents

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 - Funding Sources
- 169 Guiding Principles
- 170 Goals, Policies and Actions



Introduction

The Parks and Recreation Element is closely related to the City's *Master Plan for Parks, Open Space, Buildings, and other Recreational Facilities*, adopted in August 2008. The Master Plan establishes a long-term vision for San Carlos' park facilities, identifies specific improvements to the existing park system and presents a strategy for funding capital improvements, operation and maintenance. The Parks and Recreation Element establishes a broad policy framework to support the Master Plan. The Master Plan also contains detailed existing conditions information that is the foundation for the goals and policies in this Element.

A Parks and Recreation Element is an optional element of the General Plan and is not required by State law. The decision by the City of San Carlos to include this Element in the General Plan shows the City's commitment to providing, protecting and enhancing San Carlos' public parks and recreational

opportunities. The City recognizes that parks and recreation are important amenities in San Carlos and contribute to a high quality of life for all city residents.

The information in this element is organized into three sub-sections:

- **Existing Setting:** Contains information on existing parks and recreational opportunities in the City of San Carlos.
- **Guiding Principles:** Establishes the key objectives that guide policies in the Parks and Recreation Element.
- **Goals, Policies and Actions:** Provides guidance to the City regarding parks and recreation decisions.

Existing Setting

This section describes existing parks, open space, trails and recreation programs in San Carlos.

City Parks

San Carlos residents enjoy a total of 16 public parks located throughout the city. Figure 7-1 and Figure 7-3 show park locations and Table 7-1 identifies their size and provides a description of each park. San Carlos parks occupy approximately 135 acres within the city limit. Park amenities include multi-use athletic fields, basketball and tennis courts, a dog park, playground equipment, jogging paths, hiking trails, children's play areas and passive recreation areas.



Ball Fields at Laureola Park

TABLE 7-1 SAN CARLOS CITY PARKS

Park Name	Acreage	Description
Arguello Park	21.0	Arguello Park is the largest and most diverse of the developed parks with a turfed play area, picnic locations, a running trail and unmarked hiking trails. The park was recently renovated in 2006. Tennis courts are located on adjacent school property. ^a
Big Canyon Park	16.0	Big Canyon Park is a beautiful and rustic open space area. The 1.2-mile trail in the park is rugged, hilly and narrow with great views of the City and the East Bay.
Burton Park	10.3	Burton Park is the oldest and best known of the developed parks. It currently contains Madsen softball diamond, used by adult softball leagues, little leagues, soccer teams and other baseball teams; a large soccer field; three lighted tennis courts, two full basketball courts; two horseshoe pits; the Kiwanis Recreation Building; two children's play areas; park benches; picnic tables; barbecue pits and a turfed play area. The park playground was recently renovated and other renovations are planned in the future.
Cedar Park	0.6	Cedar Park has a small turf area, children's play area, asphalt basketball court/multi-use section, park benches, picnic table and barbecue pit.
Chilton Avenue/ Sequoia Court	1.6	Chilton Avenue/Sequoia Court is an undeveloped hill area. There is an excellent view of the canyon and surrounding area from the western boundary and another great view of San Carlos and the East Bay from the middle of the property. Children enjoy climbing on a major rock outcropping located on the slope leading down to Bay View. No park improvements have yet been developed on this site.
City Hall Park	1.3	City Hall Park is centrally located in the downtown area. It attracts mainly passive forms of recreation, but contains a turf area large enough for active games and play.
Crestview Park	7.0	Crestview is one of the newest City parks and it is frequently used by soccer players, neighboring families and jogging and walking enthusiasts. The park facilities include a soccer field, basketball courts, children's play area, paved area with stanchions making it accessible for volleyball play and a jogging/walking path.
Eaton Park	57.6	Eaton Park is a beautiful, natural open space with meandering trails, natural vegetation and varied wildlife. It is undeveloped except for a trail, which winds its way up the hillside toward Loma Lane and a 4H facility. A fire access road winds its way to the top of the park as well.
Heather Dog Exercise Area	1.5	The park is used by dog owners and their pets. There is also a trail in the southern part of the park with a great view through the canyon.
Highlands Park	11.2	The complex is used for year-round athletic events, including baseball, soccer, softball, tennis and sports camps, as well as for neighborhood recreational activities including a children's play area.

TABLE 7-1 SAN CARLOS CITY PARKS (CONTINUED)

Park Name	Acreage	Description
Hillcrest Circle Park	0.2	The park contains a children's play area, half-court basketball court, picnic bench, barbecue pit and drinking fountain. The park attracts neighborhood youth that frequent the play areas, the basketball court and other "free play" sections of the asphalt. The park was recently renovated.
Laurel Street Park	0.3	The park is utilized by shoppers as a resting spot before further shopping and by customers of adjacent restaurants. The park is used annually for a portion of the Chamber of Commerce Art and Wine Festival, the Sister City Committee's "Taste of Italy," concerts in the park and the Kiwanis Club's annual toy drive.
Laureola Park	2.6	This neighborhood park gets a variety of uses throughout the year. Little League baseball uses the field area in the spring and the American Youth Soccer Organization (AYSO) makes use of the entire turf area in the fall. In addition, residents utilize the turf, basketball court and the children's play area regularly. The Special Needs Program is the main tenant of the recreation building year-round, but the building is also used for other special interest classes and community groups.
North Crestview	4.3	This is currently an undeveloped park site, located across the street from Vista Park. It was originally acquired by the City for development of a vehicular connection between Highway 280 and Crestview Drive, which was never constructed. The site is steeply sloping up from the street, thus making access difficult. The site offers magnificent views eastward across the Bay. It borders the open space area owned by the San Francisco Public Utilities Commission. Opportunities exist to connect to adjacent trail systems via the North Crestview site.
Rosek Park	0.2	This triangular-shaped parcel is primarily a turf area with a large oak tree. The park is occasionally used by neighborhood children for free play and by adults as a picnic or resting area.
San Carlos Avenue Neighborhood Park	0.3	The park is a reasonably-utilized facility, primarily attracting neighborhood children and adult chaperones. It currently contains a swing set, park benches, barbecue pit, small turf area, drinking fountain and climbing apparatus.
Vista Park	3.8	Vista Park, landscaped with native vegetation, has walking paths, park benches, trash receptacles and picnic tables. The park has a magnificent view to the east. It is presently used by local resident walkers, pet owners and passive users.

¹ Parks Master Plan will complete future Arguello Park improvements.
Source: City of San Carlos, 2007.

The City has identified the need to acquire land to expand existing parks and to develop new City parks. The acquisition of new parkland has been considered for the areas east of El Camino Real, Devonshire Canyon and the Civic Center area. Additionally, an off-leash dog exercise area and a skate park have also been considered. There are also planned expansions and improvements for many City parks, including Arguello, Burton and Highland parks.

Figure 7-1 provides information to facilitate future decisions about park and open space land acquisition. This map identifies the following categories of land: City parks and open spaces, publicly-owned vacant land, privately-owned vacant land and privately-owned designated open space.

Service Standards

It is the City's goal to provide 2.5 acres of developed/active parks for every 1,000 residents in San Carlos. This service standard is stated as Policy 1.1 of this Element. Currently the City provides 2.3 acres of developed/active parks for every 1,000 residents.

Walkability Policy

A goal of the Parks and Recreation Department is to locate a park or recreational facility within ½-mile of every resident. This goal is stated as Policy 1.2 of the General Plan. Residences that are more than ½-mile from a City park are shown on Figure 7-2. Approximately 90 percent of existing residential parcels in San Carlos are within ½-mile of a park or recreational facility.

Open Space

San Carlos residents have access to a variety of open space areas. Open space areas are lands set aside for preservation of significant natural resources, open space and public education. Open space areas provide for passive recreation with trails, views, natural vegetation, wildlife and environmental educational facilities. Open space areas in the vicinity of San Carlos are listed in Table 7-2. These areas are owned and operated by the Midpeninsula Regional Open Space District (MPROSD), San Mateo County and the State Department of Fish and Game.

FIGURE 7-1

Parks, Open Space Sites, and Vacant Land

- City Limit
- Sphere of Influence Areas
- Regional Open Space
- Existing City Park
- City Owned Land Designated as Open Space
- Private Land Designated as Open Space
- Vacant City Owned Parcels
- Vacant Private Owned Parcels

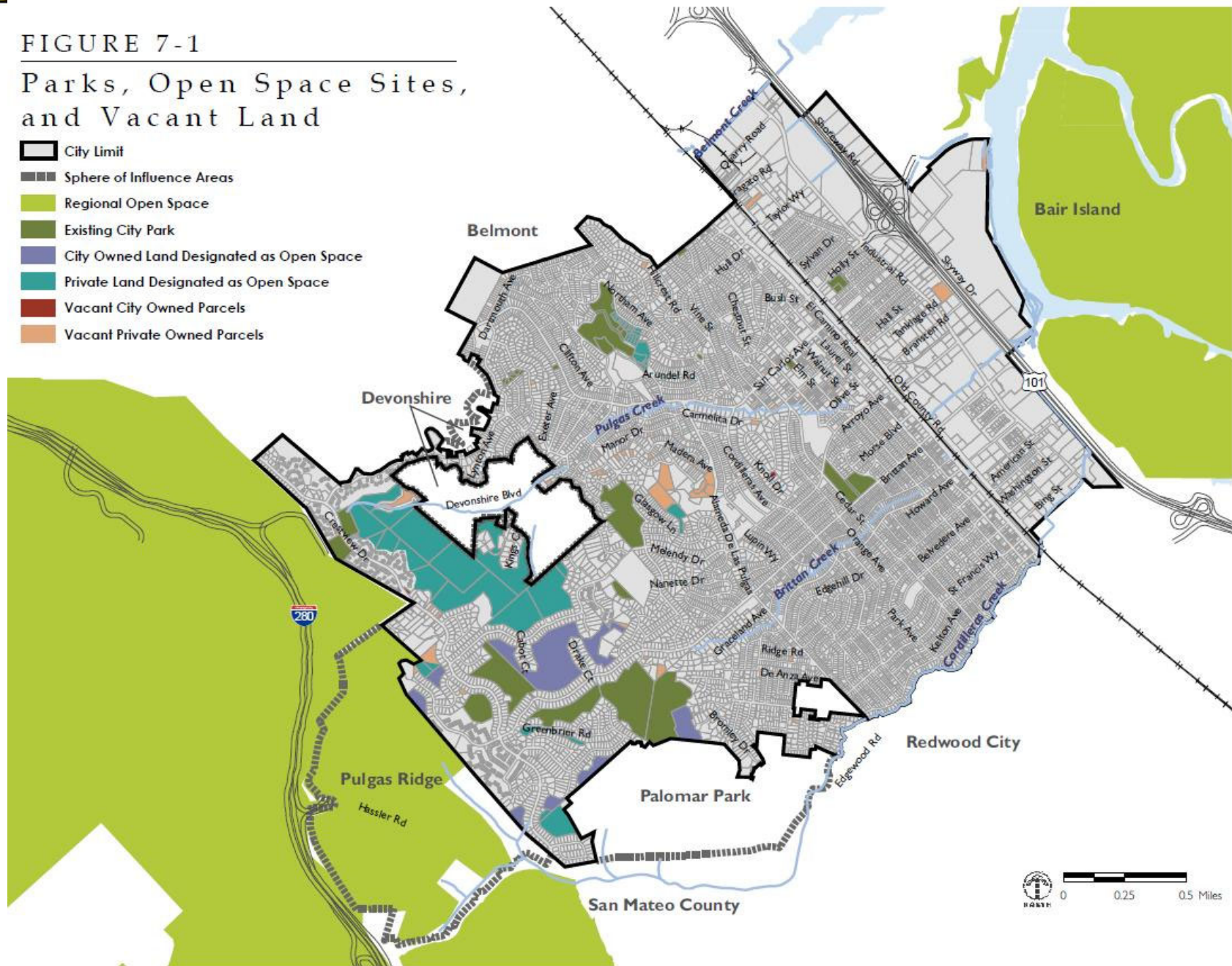


FIGURE 7-2

Residences More than 1/2 Mile
from a City Park

-  City Limit
-  Sphere of Influence Areas
-  City Park
-  Residential parcel located more than 1/2 mile from a park

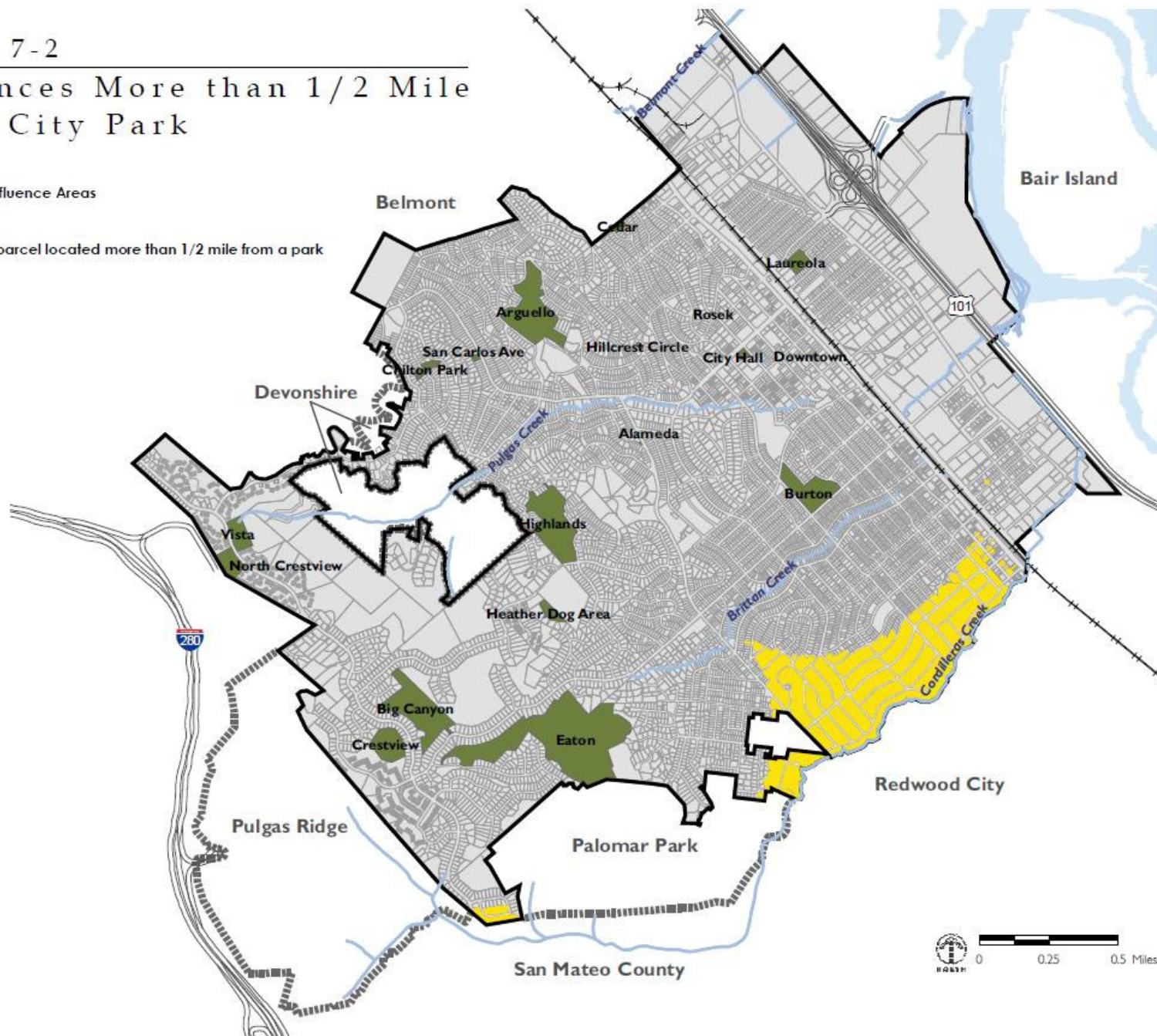


TABLE 7-2 OPEN SPACE AREAS

Open Space	Acreage	Description
Midpeninsula Regional Open Space District (MPROSD)		
Pulgas Ridge	366	6 miles of developed trails, various trails and one wheelchair accessible trail and an off-leash dog area.
Purisima Creek Redwoods	3,360	24 miles of trails, features Purisima Creek Canyon, views of the coast and Half Moon Bay.
Teague Hill	626	One developed trail takes hikers or equestrians through a small portion of the northwest corner of Teague Hill, into the Santa Cruz Mountains.
San Mateo County		
Edgewood Park	467	8.49 miles of trails, features serpentine grasslands that are famous for their magnificent displays of wildflowers each spring.
State Department of Fish and Game		
Bair Island Ecological Reserve	1,985	Former salt ponds that have been restored to tidal wetlands.
San Francisco Public Utilities Commission		
Peninsula Watershed	19,000 4,000	Scenic Easement Scenic and Recreation Easement.

MPROSD manages 26 open space preserves totaling over 57,000 acres. The three closest MPROSD preserves are Pulgas Ridge, Purisima Creek Redwoods and Teague Hill, with Pulgas Ridge Open Space Preserve located within San Carlos' SOI. San Mateo County manages five regional parks, the largest being 467-acre Edgewood Preserve, located approximately 3 miles south of San Carlos. The State Department of Fish and Game runs Bair Island, a 1,985-acre Ecological Preserve within the Don Edwards National Wildlife Refuge, located adjacent to San Carlos in the wetlands of San Francisco Bay. The Peninsula Watershed owned by the San Francisco Public Utilities Commission lies west of and adjacent to the Pulgas Ridge SOI. A 19,000-acre Scenic Easement and a 4,000-acre Scenic and Recreation Easement overlay the Peninsula Water shed. Open space within San Carlos includes Big Canyon Park, Eaton Park and land designated as open space in this General Plan. The open space facilities controlled or operated by the City are essentially unimproved or in their natural state with minimal or no aboveground improvements provided by the City, other than trails and trail heads.



Hiking Trail at Big Canyon Park

Figure 7-1 shows the locations of open space within and surrounding the city. Figure 7-3 shows the location of the Pulgas Ridge Open Space Preserve, Peninsula Watershed, Edgewood Park and Bair Island regional open spaces surrounding San Carlos.

Trails

Highlands, Arguello, Big Canyon, Eaton and Heather Dog Area are the five city parks with hiking trails within the city limit. Among these parks, the City

owns and maintains 8.7 miles of recreational trails which are shown in Figure 7-4. The longest trail within San Carlos' trail system is the Eaton-Big Canyon Trail, which runs through both Eaton and Big Canyon Parks and connects the two parks together. The City does not maintain equestrian facilities or mountain biking trails at this time. Information on pathways through the city for bicycling and jogging are discussed in the Circulation and Scenic Highways Element of this General Plan.

The City has plans to expand the system of public trails in San Carlos. In February of 2007 the City Council approved a Trails Connections Plan that identifies 14 possible new connections to existing trails in San Carlos and surrounding areas. Existing trails and planned connections are shown in Figure 7-4 and listed in Table 7-3. Of the 14 connections, six connect trails within San Carlos and the remaining eight are regional connections. The first priority trails, as identified in the plan, are scheduled to be implemented before the second priority trails. In addition to implementing the Trails Connections Plan, the City's planned improvements to the trail system include extending existing trails and addressing soil erosion and trail drainage issues.

FIGURE 7-3
Parks and Open Space

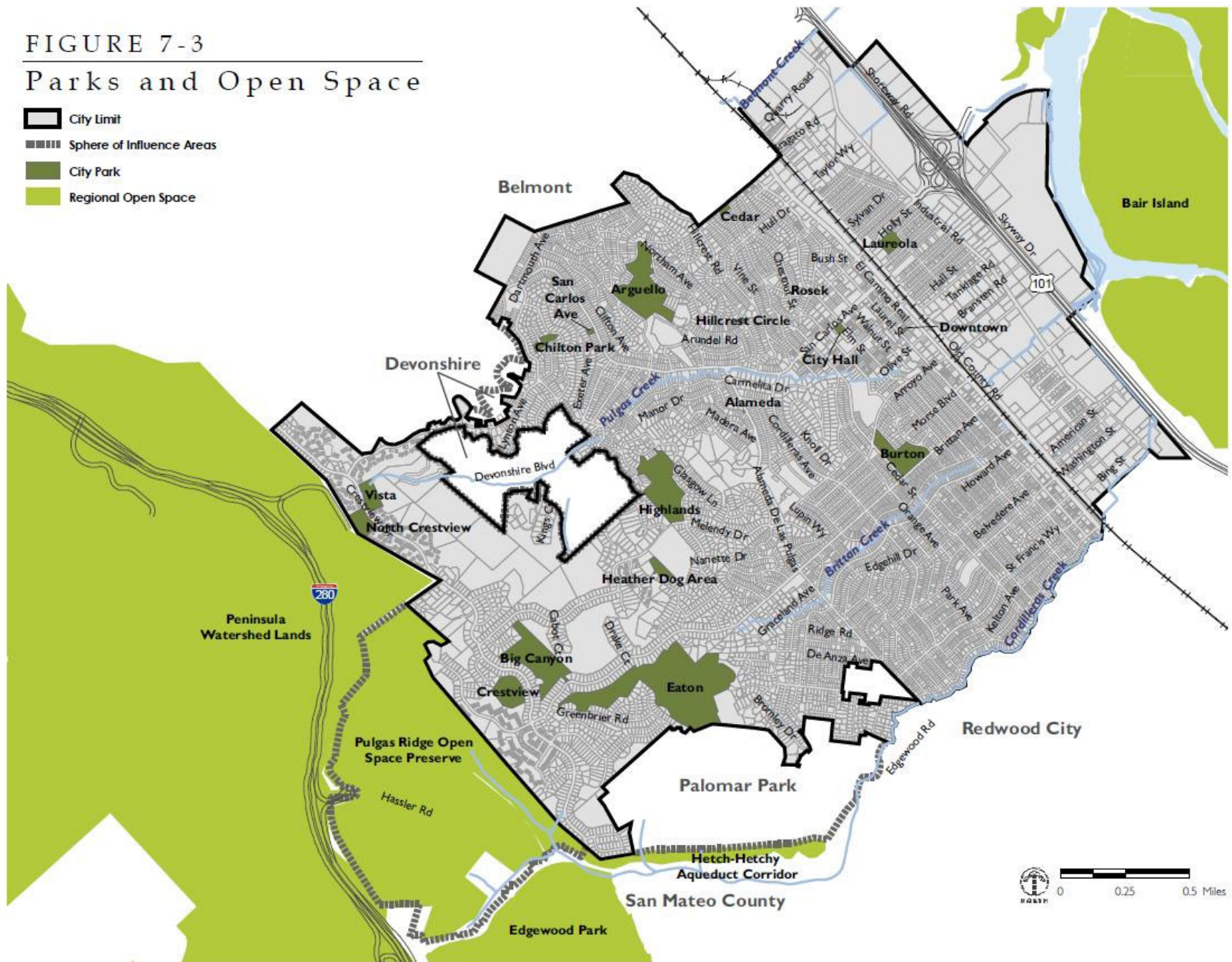









FIGURE 7-4

Existing and Planned Trails

-  City Limit
-  Sphere of Influence Areas
-  City Park
-  Existing Trail
-  Potential Trail Connection
-  Existing Bay Trail
-  Planned Bay Trail

Source: City of San Carlos, 2008; Association of Bay Area Governments, 2009.

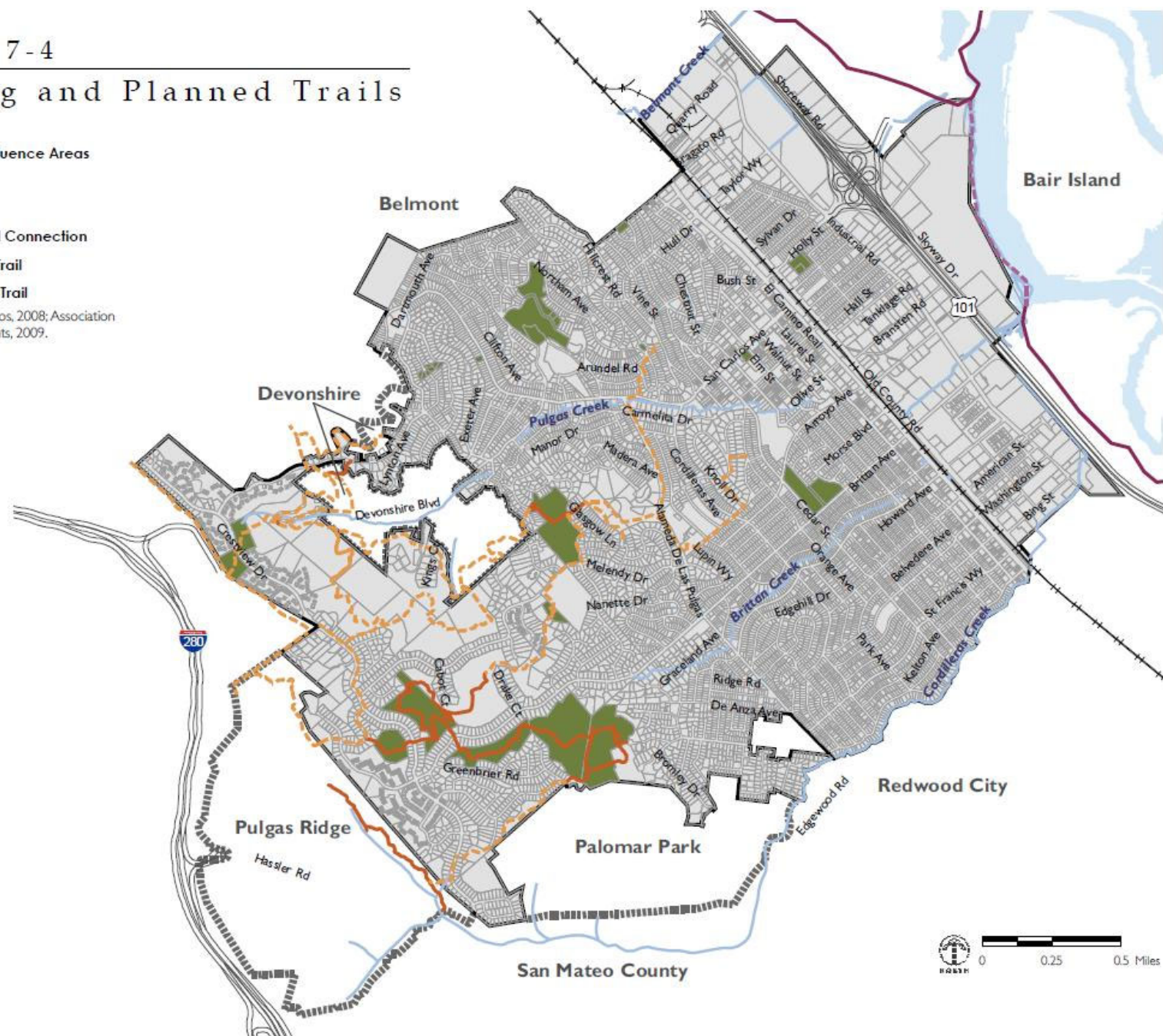


TABLE 7-3 POTENTIAL SAN CARLOS TRAIL CONNECTIONS

First Priority

1	Crestview to Pulgas Ridge Open Space Preserve and San Francisco Watershed Lands
2	Unimproved City-Owned Parcel on Crestview (Across Crestview Drive from Vista Park) to San Francisco Watershed Lands
3	Devonshire Trail System to Crestview
4	Highland Area/Heather Park to Big Canyon/Eaton Trail System
5	Lynton/Oakley Avenue to Club Drive to Witheridge Road to Belmont Trail System
6	End of Brittan to Pulgas Ridge Open Space Preserve
7	Cranfield Avenue to Club Drive to Witheridge in Belmont
8	Eaton Park to City-Owned Parcel Off La Mesa Drive Via Loma Road to Edgewood Park

Second Priority

9	Oakley/Devonshire to Crestview Drive and Vista Park
10	Lands of Rosa Flores Via Chesham to Proposed Devonshire Trail System
11	Land of Rosa Flores Via Winding Way to Proposed Devonshire Trail System
12	Existing Trail from Highlands Park to Winding Way
13	Alameda to Dundee and Highland Park Across Black Mountain Property to Bell/Lupin Avenue
14	Lower Crestview Drive to Pulgas Ridge Open Space Preserve

Source: City of San Carlos, 2007, *Trails Connections Plan*.

As previously noted, the City does not currently meet its standard of 1 mile of hiking trail per 1,000 residents. To do so, the City would need a total of 27 miles of trails (at the city's current population). Additional trail miles would be provided with implementation of the Council approved Trail \ Connections Plan

and identified during development of the upcoming Open Space Management Plan. The Action Plan of the Parks Master Plan schedules the Open Space Management Plan for development during Fiscal Year 2008/09 to 2011/12.

Recreational Programs

The Parks and Recreation Department provides recreational services and programs for all residents of San Carlos including youth, adults, senior citizens and people with disabilities. Services and programs are primarily provided at the Adult Community Center,

Sustainability and the Parks and Recreation Department



The Parks and Recreation Department is contributing to the advancement of sustainability practices within the city. The Department uses a small electric truck for park maintenance, has a strong recycling program, and implements an Integrated Pest Management plan which strives to reduce the amount of chemicals used for park maintenance. The Department uses 100 percent of all downed trees for mulch and utilizes an irrigation system that regulates the amount of water used based on atmospheric conditions.

the Burton Park buildings and the Laureola Park Special Needs Building. The Adult Community Center serves residents over 50, offering a number of classes and activities. Meeting and dining spaces for special events are available at the Adult Community Center. At Burton Park is the Youth Center, which targets pre-teen and young teen youth and has a full-size gymnasium, activities room, TV lounge, learning kitchen, dance studio and computer-equipped homework center. The Laureola Park Special Needs Building offers pre-school programs and serves special-needs residents, offering recreation and socialization activities



Youth Center at Burton Park



Master Plan for Parks, Open Space, Buildings and other Recreational Facilities

The Master Plan for Parks, Open Space, Buildings and other Recreational Facilities was adopted in August, 2008. The purpose of the plan is to provide the city with a long-term vision for its park system by identifying improvements to existing parks and targeting opportunities for new park facilities. The implementation strategy, a component of the Master Plan, prioritizes and schedules park system improvements and discusses funding for capital improvements and ongoing operation costs and maintenance. Specific recommendations in the Master Plan will be supported by broader policies regarding parks and recreational facilities in the 2030 General Plan.

for children, teenagers and adults with physical, social, or learning limitations.

To enhance the recreational programming available to San Carlos residents, the City has identified the need for new recreational facilities and improvements to existing ones. The City has planned new recreational facilities including an aquatics center, a performing arts center, a new community center and a gymnasium for adult recreation. The City has planned improvements for existing facilities such as the Adult

Community Center, the Laureola Park Building and the San Carlos Museum of History.

Funding Sources

Many California cities experience fiscal pressure to provide recreational facilities and programs for their residents. Despite funding cuts, the City remains committed to providing a high level of service for residents. The City is considering a wide variety of funding mechanisms to maintain prior funding levels. The City has a Quimby Act Ordinance in place. The Quimby Act authorizes cities and counties to pass ordinances requiring that developers set aside land, donate conservation easements, or pay fees for park improvements. Revenues generated through the Quimby Act cannot be used for the operation and maintenance of park facilities. The City will also consider additional funding sources including other development-related financing mechanisms, voter approved taxes and assessments, private sector funding and grant resources.



Guiding Principles

The Guiding Principles are a set of key objectives that articulate San Carlos' core values relating to parks and recreation. The Guiding Principles of the Parks and Recreation Element are:

- **Strengthen a sense of place and community image in San Carlos through parks and recreational programs.**
- **Provide facilities and recreational opportunities for all residents of all ages and abilities.**
- **Maintain a diversity of passive and active facilities and recreational uses in San Carlos.**
- **Support a sustainable way of life through parks and recreation.**
- **Facilitate and support community problem solving.**
- **Support urban trails to enhance pedestrian mobility and interconnectivity.**

Goals, Policies and Actions



GOAL PR-1

Increase the amount of City-owned park and open space land.

POLICIES

POLICY PR-1.1 Actively pursue land acquisitions to provide additional recreational opportunities, especially in underserved areas, which will help the City achieve the goal of increased park land.

POLICY PR-1.2 Maintain a balance of athletic fields, active parks and passive open space that supports a variety of recreational uses.

ACTIONS

ACTION PR-1.1 Explore opportunity sites for the development of new parks facilities, focusing on providing recreation opportunities to underserved areas based on the City's Master Plan for Parks, Open Space, Buildings and other Recreational Facilities.

ACTION PR-1.2 Work to fund land acquisition for parks and open space including all available mechanisms both public and private.

ACTION PR-1.3 Continue to monitor possibilities for acquisition of land to expand the Adult Community Center and/or City Hall Park.

ACTION PR-1.4 Strive to provide a minimum of 2.5 acres of traditional parkland for every 1,000 residents.

ACTION PR-1.5 Strive to provide a park facility within ½-mile of every resident.

ACTION PR-1.6 Provide the opportunity for the Parks and Recreation Department during the development review process to assess on-site open space and recreational amenities.

ACTION PR-1.7 Investigate acquisition of open space lands or easements to expand trail network, especially in areas adjacent to existing open space.

ACTION PR-1.8 Explore purchase or easement encumbrance of land in the Devonshire Canyon area.

ACTION PR-1.9 Update the City's park development impact fee to address residential renovations, remodels and additions that potentially increase the number of residents living in a dwelling unit.

ACTION PR-1.10 Identify parcels that may be suitable for acquisition; for example, parcels in underserved areas of the city and parcels adjacent to parks and public facilities.

ACTION PR-1.11 Consider adoption of an ordinance requiring the maximum allowable park land dedication fee.

ACTION PR-1.12 All City-owned Park Facilities and Open Space Park Facilities, as defined by the Municipal Code, should be re-zoned to allow such uses. The City Council may change the zoning to allow other uses if it finds that it is a change in use that will meet the goals of the Parks and Recreation Element of the General Plan.



Dog exercise area at Crestview Park



GOAL PR-2





Provide cultural, historical, environmental education and recreational facilities that support a diversity of needs and interests.

POLICIES

- POLICY PR-2.1** Consider the recreational needs and interests of all segments of the San Carlos community when evaluating decisions relating to parks facilities.
- POLICY PR-2.2** Consider establishing a new facility for the visual and performing arts.
- POLICY PR-2.3** Continue to support implementation of trail connections as identified in the City's ~~Master—Potential Trail Connections Plan for Parks, Open Space, Buildings and other Recreation Facilities.~~



Denotes synergy with Climate Action Plan

- POLICY PR-2.4**  Continue to maintain City owned open space trails and connections to regional trails.
- POLICY PR-2.5**  Promote the development of publicly accessible urban trails throughout the city to provide access to the natural environment and facilitate non-motorized transportation options.
- POLICY PR-2.6**  Complete the Bay Trail alignment in San Carlos.
- POLICY PR-2.7**  Encourage new development to provide trails and trail connection easements or dedications where feasible and appropriate.
- POLICY PR-2.8** Address any multi-use trail conflicts with enforced policy and posted signage.
- POLICY PR-2.9** Continue building and renovating playgrounds to universal accessibility standards.

POLICY PR-2.10 Improve the availability and quality of athletic fields in San Carlos.

ACTIONS


ACTION PR-2.1 Study the feasibility of acquiring additional parkland to construct a new community center and outdoor aquatics facility.


ACTION PR-2.2 Consider constructing an outdoor theater.

ACTION PR-2.3 Continue joint-use agreements with the San Carlos Elementary School District for additional use of school facilities and fields.

ACTION PR-2.4 Continue and enhance alternative funding strategies for providing additional facilities, including naming rights and sponsorships, grants and endowments.

ACTION PR-2.5 Coordinate with relevant agencies and organizations to support development of the Bay Trail Network and to provide a safe and convenient route in the vicinity of the San Carlos Airport.

ACTION PR-2.6  Prepare an Open Space Management and Trails Master Plan to further identify trail connectivity and future trail development for public benefit.

ACTION PR-2.7  Maintain a current map of trails that is available to the public and update as necessary to define trails as multi-use or single-use.

ACTION PR-2.8 Extend and improve trails in Big Canyon, Eaton Park and Arguello Park.

ACTION PR-2.9 Consider providing space, whether in new or existing parks, for off-leash dog areas, a skate park, bocce courts, Frisbee golf, BMX bicycling and other alternative sports.

7 PARKS AND RECREATION ELEMENT

ACTION PR-2.10 Study feasibility and desirability of reopening and/or expanding pedestrian and bicycle pathways.



Oak tree at Burton Park



GOAL PR-3

Provide recreational programs to meet the needs of all residents.

POLICIES

- POLICY PR-3.1** Ensure that recreational programs are available for all ages and abilities.
- POLICY PR-3.2** Support recreational programs that encourage the interaction of different segments of the San Carlos population.
- POLICY PR-3.3** Expand the availability of aquatics facilities and programming.
- POLICY PR-3.4** Promote visual and performing arts programs.

POLICY PR-3.5 Ensure that parks facilities and usage will only be expanded with a commensurate expansion in maintenance resources, including future staff and equipment.

POLICY PR-3.6 Partner with adjacent agencies including San Mateo County, Belmont Parks and Recreation, San Francisco Public Utilities Commission and the Midpeninsula Regional Open Space District to provide expanded parks and open space amenities for San Carlos residents.

POLICY PR-3.7 ~~Protect the Youth Center as a valuable venue exclusively for youth activities and programs.~~ Protect the Youth Center as a valuable venue giving priority to youth activities and programs as subject to the terms in the Youth Center Use Policy adopted by City Council².


ACTIONS

ACTION PR-3.1 Seek to establish a joint use agreement with the Sequoia Union High School District to increase access to pools, gymnasiums, theaters, athletic fields and other facilities.

ACTION PR-3.2 Seek to improve existing fields through the City/San Carlos Elementary School District joint use agreement.



City Hall Park



GOAL PR-4

Provide for environmentally-sustainable parks and recreational programs.

POLICIES

POLICY PR-4.1 Preserve and protect sensitive species and habitats in City parks and open space, as identified by the Environmental Management Element of this Plan or state and federal guidelines.

POLICY PR-4.2 Maintain and enhance ecological diversity in City parks and open space.

POLICY PR-4.3 Incorporate sustainable practices into the on-going maintenance of City parks and recreational facilities.

POLICY PR-4.4 Design new park and community facilities with environmentally-friendly features, incorporating formalized Bay-Friendly Landscaping practices and to be Leadership in Energy and Environmental Design (LEED) certified or equivalent.

POLICY PR-4.5 Consider transit, bicycle and pedestrian accessibility when evaluating locations for new or substantially renovated parks facilities.


POLICY PR-4.6 Use sustainable materials reused, renewable, locally sourced and/or recycled to the greatest extent possible.


POLICY PR-4.7 Continue to employ integrated pest management policy and practices as part of parks maintenance and recreation services programs.

POLICY PR-4.8 Replant, when necessary, with native species and/or climate appropriate plants.


POLICY PR-4.9 Design and maintain trails with appropriate drainage standards and to prevent soil erosion.

POLICY PR-4.10 Integrate stormwater management onsite to the greatest extent possible for all parks facilities.

POLICY PR-4.11  Maintain or plant trees where appropriate to provide shade, absorb carbon, reduce the heat island effect and reduce cooling loads in shaded buildings.

POLICY PR-4.12  Study the feasibility of reducing or eliminating City department use of gasoline powered landscape maintenance equipment.


ACTIONS

ACTION PR-4.1  Based on recommendations for increased energy efficiency, develop an implementation program for efficiency modifications to Department- maintained facilities.

ACTION PR-4.2 Adopt Bay-Friendly Landscaping Principles or current best practices as part of the City's parks maintenance program.

ACTION PR-4.3 Continue and enhance the grass-cycling and plant debris compost program.

ACTION PR-4.4 Develop a program to replace sheared hedges in City parks with plants that can grow to their natural shape and size within the space allotted to them.

ACTION PR-4.5  Continue and enhance smart irrigation with climate-based controllers in City parks.

7 PARKS AND RECREATION ELEMENT

ACTION PR-4.6 Study the feasibility of minimizing the use of new lawns in City parks and the replacement of some existing lawns with meadows or no-mow turf alternatives.



ACTION PR-4.7 Continue department policy of not purchasing or providing water in plastic bottles.



Park bench at Vista Park



GOAL PR-5

Promote civic engagement in parks and recreation.

POLICY PR-5.1 Continue to use the Parks and Recreation Commission as a forum for resident involvement in decision making relating to parks and recreation.

POLICY PR-5.2 Provide regular outreach to the public about City parks and recreational programs.

POLICY PR-5.3 Support community efforts to use parks and recreation as an expression of civic pride.

- POLICY PR-5.4** Work with the Parks and Recreation Foundation and other civic or private organizations to raise private funds for prioritized projects.
- POLICY PR-5.5** Continue to support community events, volunteers and non-profits.
- POLICY PR-5.6** Continue to support and partner with other City departments to meet City and department goals.
- POLICY PR-5.7** Continue to support and recognize the role of community groups.

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ENVIRONMENTAL SAFETY AND PUBLIC SERVICES ELEMENT

8



The Environmental Safety and Public Services Element provides information about risks in San Carlos due to natural and human-made hazards and contains policies designed to protect the community and its property from these hazards. This Element also provides information about public services in San Carlos.

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Purpose and Scope

The Safety Element is one of the State-mandated elements of the General Plan. It presents the City's overall goals, policies, and action programs to facilitate resilience to natural and man-made hazards. This Safety Element meets the requirements of California Government Code Section 65302(g). Under State planning law, this Element identifies and discusses the following hazards of concern for the City:

- Geology and Seismic Hazards
- Flooding Hazards
- Fire Hazards
- Hazardous Materials and Waste
- Airport Operations
- Emergency and Disaster Preparedness
- Climate Change Resilience

This Element also describes the existing Public Services the City provides to the community.

Safety Element Organization

This Element is organized to be consistent with the other General Plan Elements. The guiding principles, goals, policies, and actions provide declarative statements setting the City's approach to safety-related issues as follows:

- **Guiding Principle:** An overarching goal that identifies the major themes addressed in the Goals, Policies, and Actions.
- **Goal:** A general statement of the desired community outcome, denoted as Goal ESPS-# in this Element.
- **Policy:** Policies are efforts that contribute to meeting the goals, denoted as Policy ESPS-#.# in this Element.
- **Action:** A list of recommended programs and future actions necessary to achieve the stated goals and policies, denoted as Action ESPS-#.#x in this Element.

Integrating safety considerations throughout the General Plan creates a consistent framework that prioritizes the well-being of the community. The San Carlos Safety Element is a key component of the General Plan which works in conjunction with other Elements, including:

- **Land Use Element:** shapes the potential physical development of the city and to preserve, protect, and enhance the community's current quality of life consistent with the City's Vision
- **Housing Element:** promotes the maintenance and development of housing to meet the needs of San Carlos residents. Periodic updates of the Housing Element are required in conjunction with the Regional Housing Needs Allocation prepared by the California Department of Housing and Community Development.
- **Circulation & Scenic Highways Element:** plans for the efficient transportation of goods and the safe and effective movement of people throughout the City.

- **Environmental Management Element:** aims to protect, preserve, and enhance natural resources in San Carlos.
- **Parks & Recreation Element:** provides information and policy guidance to ensure adequate provision of parks and recreational opportunities in the City of San Carlos.
- **Noise Element:** identify sources of noise in San Carlos and to define strategies for reducing the negative impact of noise to the community.

Regulatory Framework

California Government Code 65302(g)(1)

California Government Code Section 65302(g)(1) establishes the legislative framework for California's Safety Elements. This framework consolidates the requirements from relevant federal and state agencies, ensuring that all jurisdictions are compliant with the numerous statutory mandates. These mandates include:

- Protecting against significant risks related to earthquakes, tsunamis, seiches, dam failure, landslides, subsidence, flooding, and fires as applicable.
- Including maps of known seismic and other geologic hazards.
- Addressing evacuation routes, military installations, peak-load water supply requirements, and minimum road widths and clearances around structures as related to fire and geologic hazards, where applicable.
- Identifying areas subject to flooding, sea level rise, and wildfires.

- Avoiding locating critical facilities within areas of high risk.
- Assessing the community's vulnerability to climate change and including adaptation and resilience goals, policies, and implementation actions.

California Government Code 65302(g)(3) adopted through SB 1241 (2012)

California Government Code Section 65302(g)(3) requires the Safety Element to identify and update mapping, information, and goals and policies to address wildfire hazards. As part of this requirement, any jurisdiction that includes State Responsibility Areas (SRAs) or Very High Fire Hazard Severity Zones in the Local Responsibility Areas (LRAs), as defined by the California Board of Forestry and Fire Protection (Board), is required to transmit the updated Element to the Board for review and approval. San Carlos contains Very High Fire Hazard Severity Zones in the LRA; therefore, compliance with Section 65302(g)(3) is required.

California Government Code 65302(g)(4) adopted through SB 379 (2015)

California Government Code Section 65302(g)(4) requires the Safety Element to address potential impacts of climate change and develop potential strategies to adapt/mitigate these hazards. Analysis of these potential effects should rely on a jurisdiction's Local Hazard Mitigation Plan (LHMP) or data and analysis from the State of California's Integrated Climate Adaptation and Resilience Program (ICARP) and the State's ResilientCA.org and the Cal-Adapt websites. This Element relies on the most current San Mateo County Multi-

Jurisdictional LHMP, and supplemental information from Cal-Adapt to ensure compliance with this requirement.

California Government Code 65302(g)(5) adopted through S.B. 99 (2019)

California Government Code Section 65302(g)(5) requires the Safety Element to identify evacuation constraints associated with residential developments, specifically focused on areas served by a single roadway.

California Government Code Sections 8685.9 and 65302.6

California Government Code Section 8685.9 (also known as Assembly Bill 2140 or AB 2140) limits California's share of disaster relief funds paid out to local governments to 75 percent of the funds not paid for by federal disaster relief efforts. However, if the jurisdiction has adopted a valid Local Hazard Mitigation Plan (LHMP) consistent with Disaster Mitigation Act (DMA) of 2000 and has incorporated the LHMP into the jurisdiction's General Plan, the State may cover more than 75 percent of the remaining disaster relief costs. California Government Code Section 65302.6 indicates that a community may adopt an LHMP into its Safety Element if the LHMP meets applicable State requirements. As the General Plan is an overarching long-term plan for community growth and development, incorporating the LHMP into it creates a stronger mechanism for implementing risk reduction strategies and hazard mitigation projects.

National Flood Insurance Program

The National Flood Insurance Program (NFIP) was created in 1968 to help communities adopt more effective floodplain management programs and regulations. The Federal Emergency Management Agency (FEMA) is responsible for

implementing the NFIP and approves the floodplain management plans for participating cities and counties. San Carlos participates in the NFIP and uses Title 15, Chapter 15.56 of the San Carlos Municipal Code to administer flood management regulations.

Alquist-Priolo Earthquake Fault Zoning Act

The Alquist-Priolo Earthquake Fault Zoning Act (California Public Resources Code [PRC], Chapter 7.5, Section 2621-2699.6) was intended to reduce the risks associated with surface faults and requires that the designated State Geologist identify and map "Earthquake Fault Zones" around known active faults. Per PRC Section 2623(a), cities and counties shall require a geologic report defining and delineating any hazard of surface fault rupture before the approval of a project. If the jurisdiction finds no undue hazard of that kind exists, the geologic report on the hazard may be waived, with the State Geologist's approval.

Seismic Hazards Mapping Act

The Seismic Hazards Mapping Act (California Public Resources Code, Chapter 7.8, Section 2690-2699.6) created a statewide seismic hazard mapping and technical advisory program in 1990 to help cities and counties more effectively address the effects of geologic and seismic hazards caused by earthquakes. Under PRC 2697, cities and counties shall require a geotechnical report defining and delineating any seismic hazard before approving a project located in a seismic hazard zone. If the jurisdiction finds that no undue hazard of this kind exists based on information resulting from studies conducted on sites near the project and of similar soil composition to the project site, the geotechnical report may be waived. After a report has been

approved or a waiver granted, subsequent geotechnical reports shall not be required, provided that new geologic datum, or data, warranting further investigation is not recorded. Each jurisdiction shall submit one copy of each approved geotechnical report, including the mitigation measures to be taken, if any, to the State Geologist within 30 days of its approval of the report.

Cortese List

Government Code Section 65962.5 (typically referred to as the "Cortese List") identifies sites that require additional oversight during the local permitting process as well as compliance with the California Environmental Quality Act (CEQA). The list is generally a compilation of properties and businesses that generate, store, and/or have been impacted by the presence of hazardous materials/wastes. Many properties identified on this list may be undergoing corrective action, cleanup, or abandoned and in need of these activities. The City of San Carlos has a variety of sites identified on this list that range from permitted underground storage tanks, leaking underground storage tanks, sites meeting waste discharge requirements, and land disposal sites.

Relationship to Other Documents

Documents Incorporated by Reference

San Mateo County Local Hazard Mitigation Plan

The [2021 Multijurisdictional Local Hazard Mitigation Plan \(LHMP\)](#) identifies risks posed by hazards and contains strategies to reduce the impact of hazard events on people and property in San Mateo County. A planning partnership was

formed between San Mateo County and local jurisdictions, including San Carlos, to leverage resources and to meet requirements of the federal DMA for as many eligible local governments as possible. As a participating jurisdiction, San Carlos prepared a jurisdiction-specific annex that documents the jurisdiction's mission, programs, and policies, and evaluates its capacity to carry them out in a mitigation action plan.

The LHMP was developed to meet the following objectives:

- Meet or exceed program requirements specified under the DMA.
- Enable San Mateo County to continue using federal grant funding to reduce risk through mitigation.
- Meet the needs of San Mateo County as well as state and federal requirements.
- Create a risk assessment that focuses on San Mateo County hazards of concern.
- Coordinate existing plans and programs so that high-priority initiatives and projects to mitigate possible impacts of a disaster are funded and implemented.
- Establish an “equity lens” approach to this plan update process as an option for all planning partners.

The LHMP complies with all requirements set forth under DMA 2000, received approval from FEMA in 2021, and was adopted by the County in 2021. Sections of the Safety Element are supplemented by the LHMP, which is incorporated by reference, as allowed by California Government Code Section 65302(g).

The Multi-Jurisdictional Local Hazard Mitigation Plan (LHMP) for the County of San Mateo planning area was developed in accordance with the Disaster Mitigation Act of 2000 (DMA 2000) and followed FEMA's Local Hazard Mitigation Plan guidance. The LHMP incorporates a process where hazards are identified and profiled, the people and facilities at risk are analyzed, and mitigation actions are developed to reduce or eliminate hazard risk. The implementation of these mitigation actions, which include both short and long-term strategies, involve planning, policy changes, programs, projects, and other activities. <https://www.smcgov.org/ceo/2021-multijurisdictional-lhmp>

San Carlos Climate Mitigation and Adaptation Plan

The [2021 Climate Mitigation and Adaptation Plan](#) (CMAP) aims to reduce City-wide emissions 40% by 2030 and 80% by 2050 relative to 1990 levels and identifies strategies to achieve those targets. In addition, the CMAP recognizes the potential climate change impacts and vulnerabilities in the community and identifies strategies that support climate adaptation and resilience.

Sections of the Safety Element are supplemented by the CMAP, which is incorporated by reference, as allowed by California Government Code Section 65302(g).

San Carlos Safety Element Vulnerability Assessment

As required by California Senate Bill (SB) 379, adopted in 2015, a jurisdiction's General Plan Safety Element must contain relevant climate adaptation and resiliency strategies. The Safety Element update must include the preparation of a Vulnerability Assessment that identifies the specific risks that climate change poses to the local jurisdiction. The 2021 San Carlos Safety

Element Update Vulnerability Assessment includes an assessment of: (1) the community's exposure to past, current, and projected climate hazards, and (2) responsible agencies and their ability to respond and address climate change impacts.

Sections of the Safety Element are supplemented by the Vulnerability Assessment, which is incorporated by reference, as allowed by California Government Code Section 65302(g).

CalWater Urban Water Management Plan

As required by the California Water Code, all urban water agencies supplying more than 3,000 customers prepare an Urban Water Management Plan. CalWater's 2020 Urban Water Management Plan, Mid-Peninsula District is incorporated by reference.

Informational Documents

San Mateo County Flood and Sea Level Rise Resiliency District Resources

The San Mateo County Flood and Sea Level Rise Resiliency District, also known as [OneShoreline](#), is an independent government agency that works across jurisdictional boundaries to secure and leverage public and private resources for the long-term resilience of the County. OneShoreline plans and builds solutions to the climate change impacts of sea level rise, flooding, and coastal erosion, and enhance the environment, recreational opportunities, and quality of life within communities throughout the county.

San Carlos Emergency Operations Plan

The San Carlos Emergency Operations Plan (EOP) outlines how the City of San Carlos, its government, stakeholder agencies,

community-based organizations (CBO), business community, and residents will coordinate a response to major emergencies and disasters. The EOP identifies operational strategies and plans for managing inherently complex and potentially catastrophic events.

The City of San Carlos has officially adopted and integrated the following emergency management, response, and coordination systems:

- Incident Command System (ICS)
- Standardized Emergency Management System (SEMS)
- National Incident Management System (NIMS)

The EOP addresses the four phases of emergency management:

- Preparedness
- Response
- Recovery
- Mitigation

San Carlos Vegetation Management Plan

The San Carlos Vegetation Management Plan is an ongoing effort to reduce hazardous vegetation fuel loads and vertical and horizontal fuel continuity within the Wildland Urban Interface (WUI) in City-owned parks located west of Alameda de las Pulgas in the City of San Carlos.

The plan's proposed vegetation management activities will provide benefits to a significant number of residential structures, infrastructure, and natural resources in the areas surrounding Arguello Park, Highlands Park, Eaton Park,

Crestview Park, Big Canyon Park and other City-owned parcels by minimizing the potential for wildfire ignition and spread. The plan will also benefit responding fire agency personnel by providing defensible space areas and moderating fire behavior should a fire occur.

Santa Cruz County/San Mateo County Wildfire Protection (CWPP) Plan

The CWPP, adopted in 2018, identifies landscape scale hazards and provides strategic actions to reduce wildfire risk for healthier ecosystems and more resilient communities. The CWPP identifies at-risk communities and provides fuel reduction recommendations for high priority areas. The CWPP can aid communities to apply for state and federal funding for fire prevention and programs. www.firesafesanmarateo.org

Community Hazards

Geologic and Seismic Hazards

This section provides background information on potential public safety issues related to geologic and seismic hazards, including earthquakes, surface rupture, liquefaction, expansive soils, subsidence, and landslides.

Background Information

Earthquakes and Surface Rupture

The Bay Area is in one of the most active seismic regions in the United States. Each year, low and moderate magnitude

earthquakes occur in or near the Bay Area. The April 1906 earthquake on the San Andreas fault, estimated at about Moment Magnitude¹ (Mw) 7.9 (M8.3 on the Richter scale), was likely the largest seismic event felt in San Carlos. Figure 8-1 shows the approximate position of the major fault zones in the Bay Area, historical magnitudes and location of the study area in relation to these features. The California Geological Survey has developed a list of cities affected by surface fault ruptures referred to as the Alquist-Priolo earthquake fault zones, called for by the Alquist-Priolo Act. The zones encompass all active and potentially – active traces of the San Andreas, Calaveras, Hayward, and San Jacinto faults, and other faults or fault segments deemed necessary by the State Geologist. San Carlos is not found on the list, although the list does not include all hazards associated with earthquakes. There is an Alquist-Priolo earthquake fault zone near San Carlos, encompassing the area around the San Andreas fault as it passes through the Santa Cruz Mountains and the Crystal Springs Reservoir.

The relative lack of seismic activity since the 1989 Loma Prieta earthquake (Mw 6.9 and M7.1) suggests that the Bay Area will likely experience an earthquake of significant magnitude in the next couple of decades. United States Geological Survey (USGS) scientists and others conclude that there is a 63 percent chance of at least one Mw 6.7 or greater earthquake will strike the San Francisco Bay region before 2036. Earthquakes of Mw 6.7+ magnitude can create ground accelerations in bedrock and in stiff unconsolidated sediments severe enough to cause major

¹ Moment Magnitude is a type of earthquake measurement that conveys more precise and usable information about seismic events when compared to the Richter scale. Moment Magnitude numbers may appear lower than

the traditional Richter magnitudes, particularly for earthquakes greater than 5.0 on the Richter scale.

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damage to structures and foundations that are not designed specifically with earthquake reinforcements and to underground utility lines without sufficient flexibility, to accommodate seismic ground motion. Consequently, it is necessary to design structures and facilities in the city to withstand the anticipated effects of seismic vibration from distant as well as nearby sources.

The principal active faults in the San Carlos area are the San Gregorio, San Andreas, Hayward, Calaveras, and Greenville faults. Table 8-1 contains the estimated characteristics of potential future earthquakes for the three known major faults that would cause at least strong ground shaking in San Carlos. San Carlos is closest to the San Andreas Fault system, an active fault system located approximately one mile west of the city. The San Andreas fault system has the second highest probability (21 percent) of generating a Mw 6.7+ earthquake in this timeframe; the Hayward fault has the highest probability at 31 percent. Figure 8-2 shows the San Andreas fault zone, relative to the city and its Sphere of Influence (SOI).

Table 8-1 Estimated Maximum Parameters for Major Known Faults Affecting the Project Area

Fault	San Gregorio	San Andreas	Hayward
Moment Magnitude (Mw)	7.44	7.38	7.1
Duration of Strong Shaking (seconds)	30 - 60	30 - 60	30 - 60

Approximate Distance and Direction from City Limit to Fault (miles)	9.0 SW	1.0 SW	14.0 NE
Source: California Geological Survey			

The California Department of Conservation has developed maps showing State Earthquake Zones of Required Investigation for fault zones, liquefaction zones, and landslide zones (Figure 8-3 and Figure 8-4). The USGS Earthquake Hazards Program produces maps depicting the projected intensity and extent of seismic activity under various earthquake scenarios (Figure 8-5).

Liquefaction

Liquefaction generally occurs as a result of strong ground shaking during earthquakes in areas where granular sediment or fill material occur with high moisture content in or immediately below it. The ground shaking transforms the material from a solid state to a temporary liquid state. Liquefaction is a serious hazard because buildings in areas that experience liquefaction may sink or suffer major structural damage. Liquefaction is most often triggered by seismic shaking, but can also be due to improper grading, landslides, or other factors.

Liquefaction potential within the city and its SOI ranges from very low to very high. Liquefaction potential in the western hill areas is low, while the flatlands and bay margins area have high liquefaction potential.

Areas with high liquefaction potential are shown in Figure 8-6. Generally, for the low-lying areas within the mapped 100- or 500-year flood plain, site specific analyses of liquefaction potential should be completed before any major development occurs.

Expansive Soils

Expansive soils contain higher levels of clay which expand and shrink depending on water content. Consequently, expansive soils present hazards for structures that were not appropriately engineered. The only expansive soils found in the city are located in the northwestern hills and the western hills near Interstate 280 (I-280), areas within the SOI but outside the city limit.

These expansive soils are technically referred to as Maymen loams and are classified as having low expansion potential. Figure 8-7 shows the expansive soils in the area.

Landslides

Landslides are downward and outward movements of slope-forming materials such as rock, soil and/or artificial fill. The general characteristics that influence landslide hazards include slope material, slope steepness, water content, vegetation coverage and proximity to areas of erosion or man-made cuts.

The best predictor of where slides might occur is the location of past movements. Landslides occur on some of the upper hilly slopes, more commonly in the western area of the city. Figure 8-8 shows the landslide hazard areas in San Carlos. Differences in the physical characteristics of slope materials, which markedly influence landslide potential, vary widely in terms of landslide hazards. A site-specific geotechnical analysis is

needed to accurately assess potential landslide hazards at any specific project location. Stringent City grading and building codes and slope landscaping requirements are in place to address landslide potential. Soils studies and remediation for any problem are required prior to issuance of a permit.

Subsidence

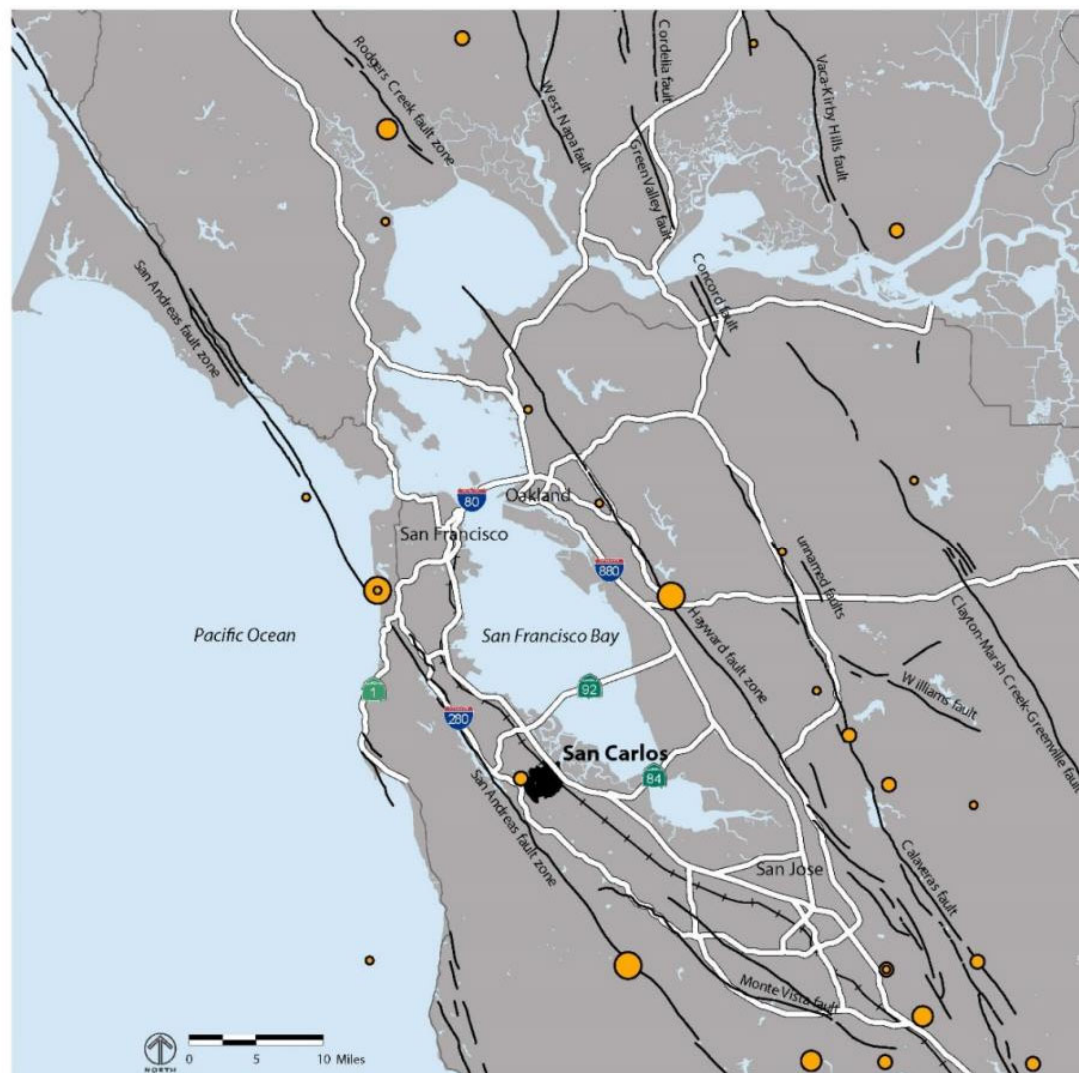
Subsidence is the gradual or sudden sinking of an area of land due to removal or displacement of subsurface earth materials. Subsidence in California is caused by lowered groundwater tables due to groundwater pumping or prolonged drought, drainage, compression of organic soils or mud, underground mining, and natural compaction or collapse. The effects of subsidence include damage to buildings and infrastructure. Sea level rise may lead to increased saturation of the underlying soils along the shoreline, increasing rates and risk of subsidence in eastern San Carlos. Shoreline roads, including Hwy 101, and infrastructure located beneath roads are at an increased risk of damage or failure due to subsidence exacerbated by sea level rise.

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FIGURE 8-1

Regional Faults and Historical Earthquakes

- City Limit
 - Sphere of Influence Areas
 - Fault
- Historical Earthquakes 1800 to 1999**
Magnitude on the Richter Scale:
- 5.5 - 5.9
 - 6.0 - 6.4
 - 6.5 - 6.9
 - 7.0 - 7.9



August 2020
Sources: San Carlos 2030 General Plan, 2007.

FIGURE 8-2

Area Faults



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Figure 8-3

Earthquake Zones of Required Investigation

Colors may vary due to transparency and overlapping data.

Fault Traces

- Accurately Located
- - - Approximately Located
- · - Approximately Located, Queried
- - - Inferred
- · - Inferred, Queried
- Concealed
- ····· Concealed, Queried
- - - Aerial Photo Lineament

Fault Zone



Liquefaction Zone



Landslide Zone



Liquefaction Landslide Overlap Zone



Area Not Evaluated for Liquefaction or Landslides



Parcels

- Parcel is in an Earthquake Fault Zone, a Liquefaction Zone, and a Landslide Zone
- Parcel is in an Earthquake Fault Zone and a Liquefaction Zone
- Parcel is in an Earthquake Fault Zone and a Landslide Zone
- Parcel is in an Earthquake Fault Zone
- Parcel is in a Liquefaction Zone and Landslide Zone
- Parcel is in a Liquefaction Zone
- Parcel is in a Landslide Zone
- Parcel is not in a zone or has not been evaluated

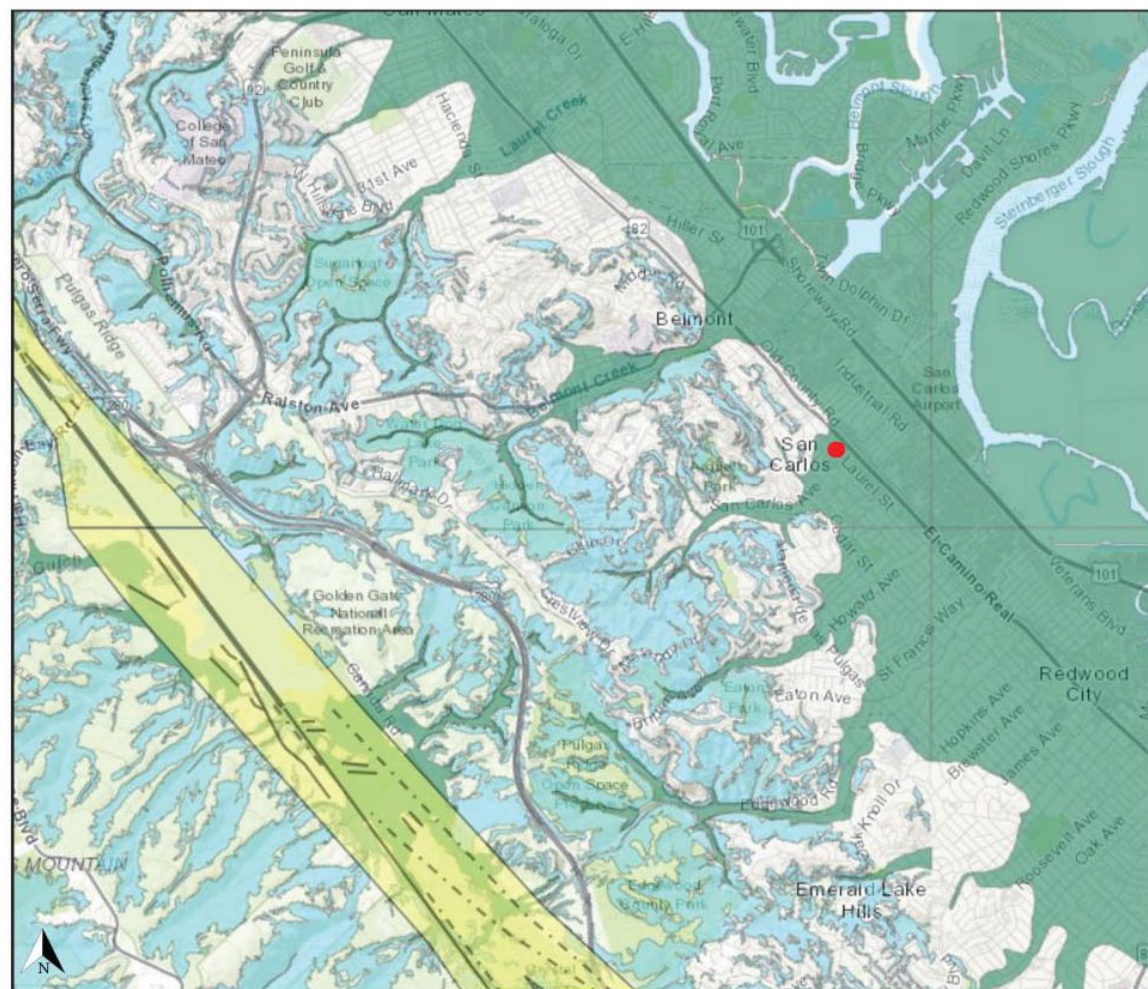



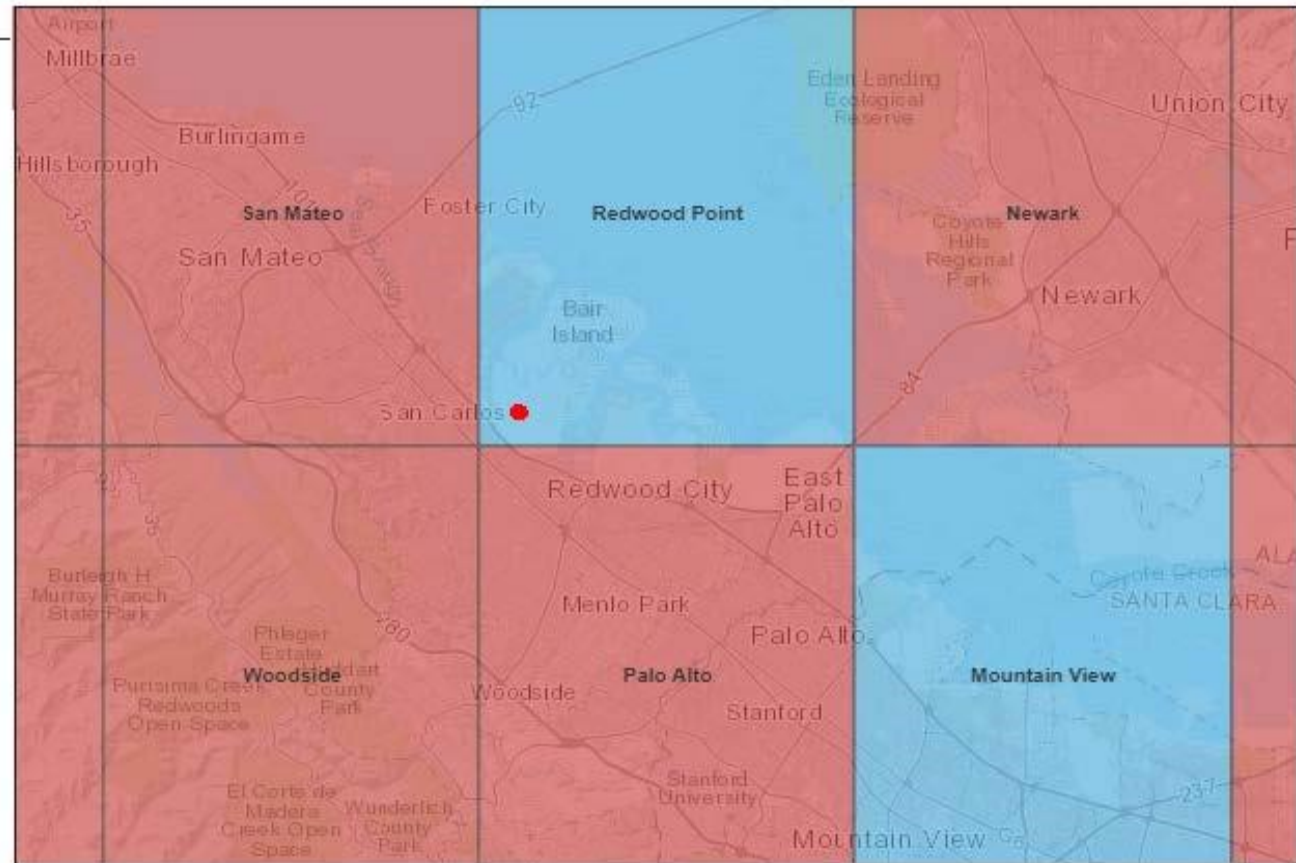


Figure 8-4

CGS Regulatory Maps

Regulatory Maps

-  Fault zones, Landslide and Debrisation zones
-  Seismicity Hazard Zone
-  Landslide and High Seismic Risk



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Figure 8-5

USGS Earthquake Scenario Map

Earthquake Scenarios

epicenters



ruptures



Mercalli Intensity

II-III (Weak)

IV (Light)

V (Moderate)

VI (Strong)

VII (Very Strong)

VIII (Severe)

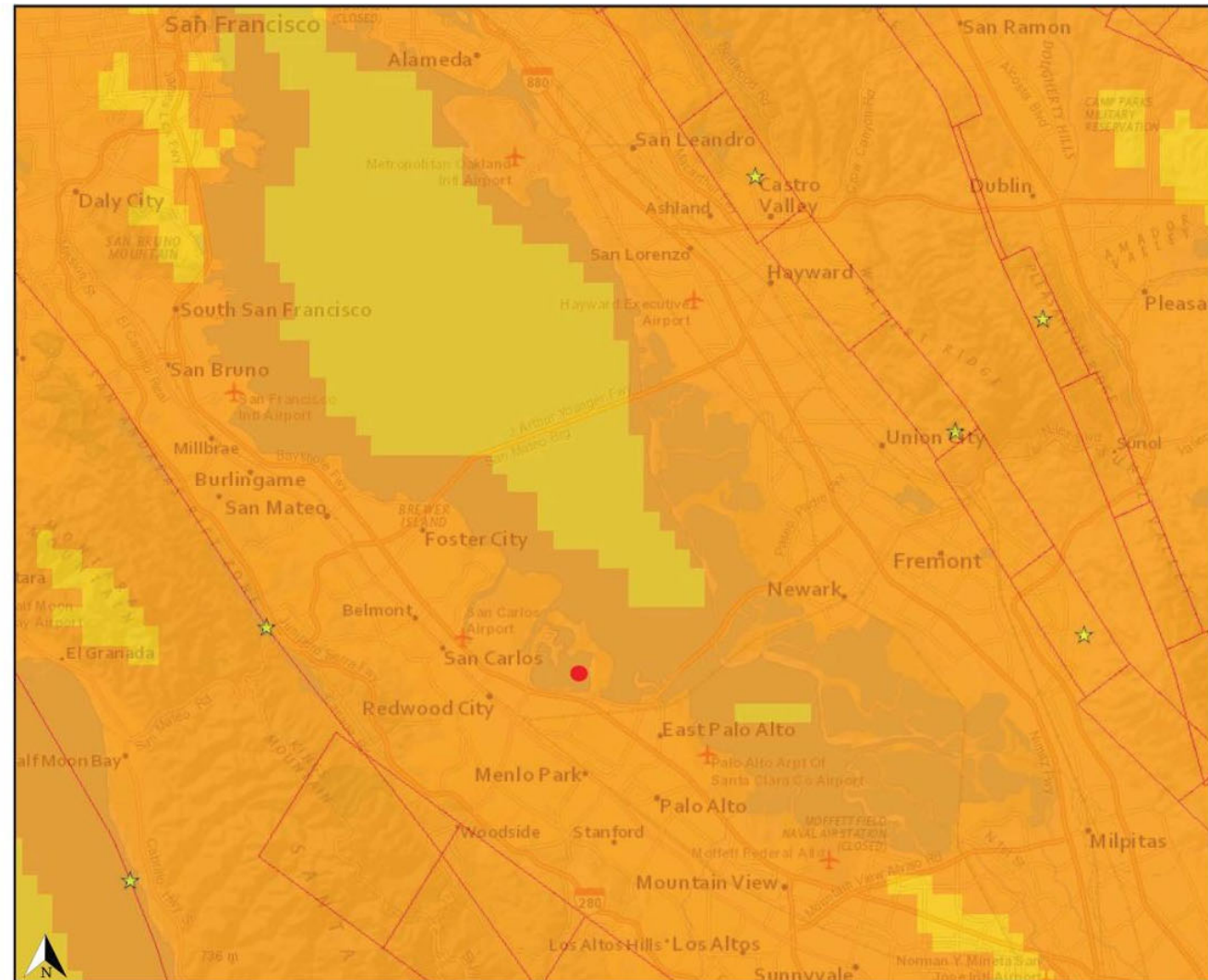
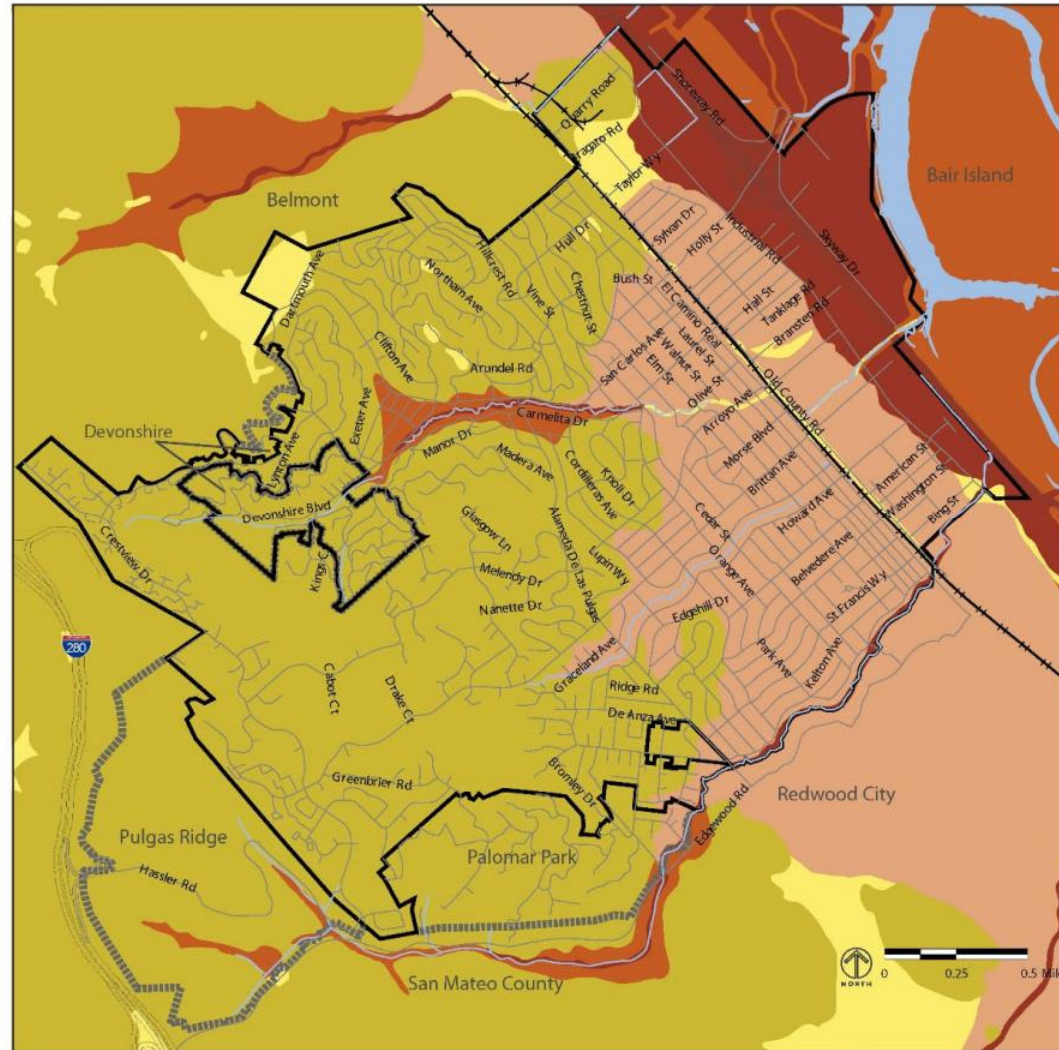
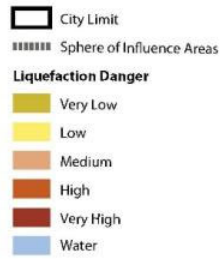


FIGURE 8-6

Liquefaction Potential

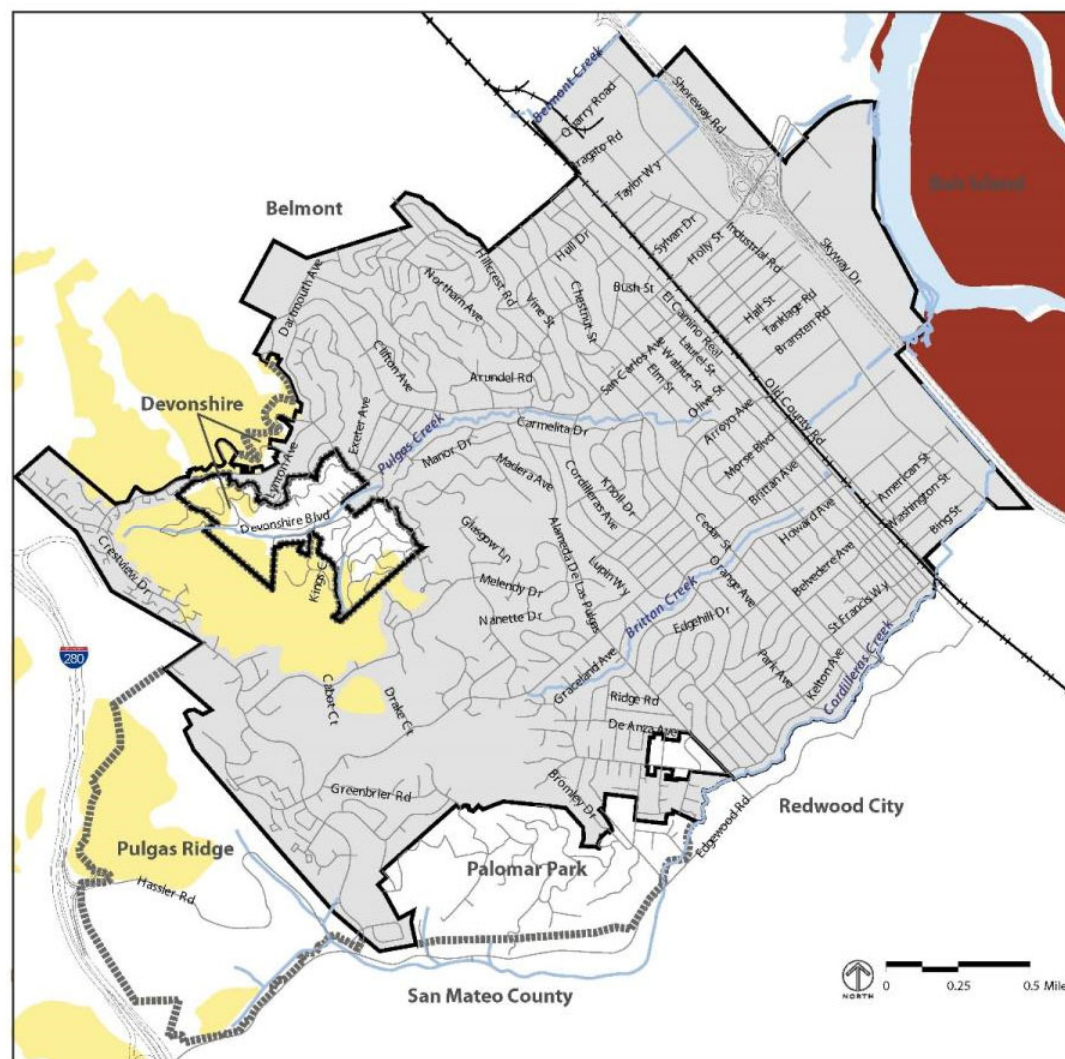


August 2020
 Sources: San Carlos 2030 General Plan, 2007.

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FIGURE 8-7

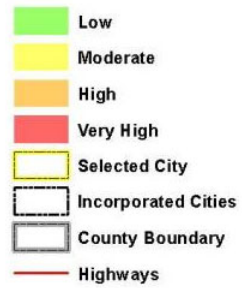
Expansive Soils



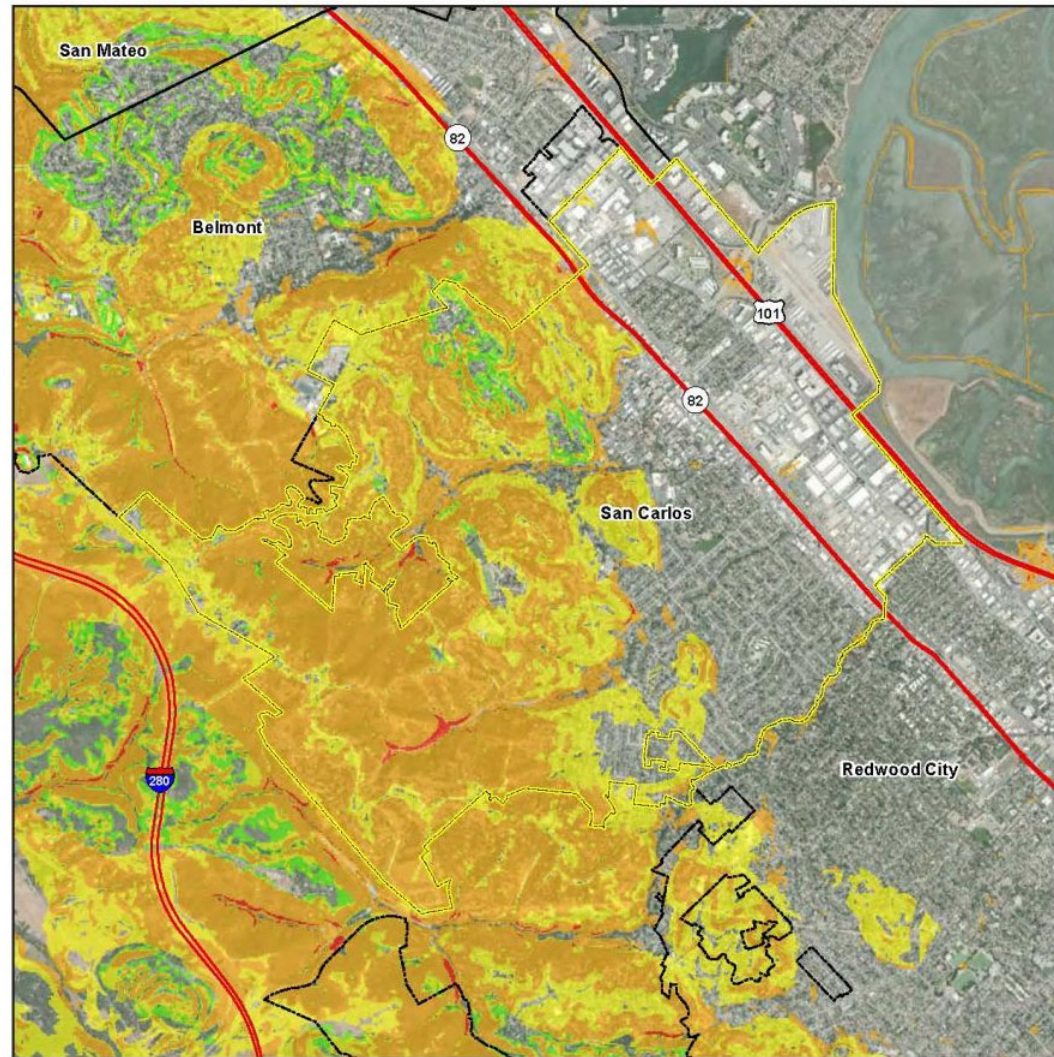
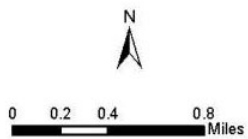
August 2020
 Sources: San Carlos 2030 General Plan, 2007.

FIGURE 8-8

Landslide
Hazard
Areas



Data Sources: ESRI Basemap,
San Mateo Co., CGS



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Guiding Principles

The Guiding Principle establishes a framework for the basic intent of the element. The Guiding Principle of the Environmental Safety and Public Services Element is:

- Minimize to the maximum extent possible vulnerability to natural and man-made hazards.

Goals, Policies, and Actions



GOAL ESPS-1

Reduce the potential loss of life, injury, and property damage due to seismic and geologic hazards.

POLICIES

Policy ESPS-1.1 The City Building Official shall verify geotechnical and soils reports for development in areas where potentially serious geologic risks exist. These reports shall address the degree of hazard, design parameters for the project based on the hazard, and appropriate mitigation measures. Based on the findings of

these reports, the City shall require that new structures are designed and built to withstand the effects of seismically-induced ground failure.

Policy ESPS-1.2 Prohibit structural development in known areas where seismic and geological hazards cannot be mitigated.

Policy ESPS-1.3 Continue to monitor and enforce mitigation measures to reduce risk for projects where geological and seismic hazards can be mitigated.

Policy ESPS-1.4 Enforce requirements of the Alquist- Priolo Special Studies Zones Act should any fault traces in San Carlos be discovered and prove to be active or potentially active.

Policy ESPS-1.5 Continue to incorporate seismic risk analysis into the City's ongoing building inspection program through thorough review of projects by plan check and field inspections.

Policy ESPS-1.6 Continue to encourage retrofitting of structures, particularly older buildings, to withstand earthquake shaking and landslides, consistent with state Building Codes and Historic Building Codes.

Policy ESPS-1.7 Continue to incorporate geotechnical hazard data into future land use decision-making, site design, and construction standards.

Policy ESPS-1.8 Actively promote public education, research, and information dissemination on seismic and geotechnical hazards.

Policy ESPS-1.9 Continue to ensure that seismic hazards are mitigated to the greatest extent possible for critical public facilities, infrastructure, and emergency services.

ACTIONS

Action ESPS-1.1 Continue to review the General Plan, Zoning Ordinance, Subdivision Ordinance, and Uniform Building Code to ensure that geotechnical data and information relating to seismic hazards is current and accurate.

Action ESPS-1.2 Continue to enforce the City of San Carlos Unreinforced Masonry Seismic Retrofit Program ordinance for any existing unreinforced masonry structures that may exist within the city.

Action ESPS-1.3 Provide opportunity for voluntary retrofit of existing residential buildings by implementing the Standard Plan Set for Residential Seismic Retrofitting as adopted by ABAG.

Flood Hazards

The following background information on inland flooding and bayshore flooding is sourced, with revisions, from the City of San Carlos Climate Mitigation and Adaptation Plan (2021).

Background Information

Inland and Bayshore Flooding

Inland flooding can cause significant harm to buildings, people, and infrastructure. Floodwater can be deep enough to drown people and may move fast enough to carry people or heavy objects (such as cars) away. Flooding can be caused by heavy rainfall, long periods of moderate rainfall, or clogged storm drains during periods of rainfall. In rare instances, a break in a water pipe or water tank can also cause flooding. Storm drainage systems throughout the city collect stormwater runoff and convey water to prevent flooding, although these systems are typically designed based on winter storms recorded in the past and may not be designed to accommodate more intense storms anticipated under Climate Change conditions.

What is currently considered a 100-year flood, or a flood that has a 1-percent chance of occurring annually, may occur more often due to climate change. Figure 8-9 shows that the inland flood hazard areas are primarily located along the bayshore, Pulgas Creek, Cordilleras Creek, and Belmont Creek.

During strong storms and king tides, bay shoreline flooding may damage or destroy commercial buildings in low-lying areas in eastern San Carlos; disrupt transportation routes, such as Highway 101, Shoreway Road, Industrial Road, Holly Street, Old County Road, and Brittan Avenue; and harm important economic assets, such as the Aviation Museum, industrial and

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manufacturing centers, biotechnology companies, and major employers. Essential infrastructure, such as the San Carlos Airport, bridges, electric vehicle charging stations, solid waste facilities, and water and wastewater infrastructure, may be frequently temporarily inundated, causing them and the community services they support to not function as needed.

Persons experiencing homelessness may live in open spaces along creeks, persons without access to lifelines, or with limited income or access to resources, may be more likely to live in low-lying areas or in less-resilient structures, and therefore are highly vulnerable to bayshore flooding.

The United States Army Corps of Engineers' (USACE) Flood Risk Management Program maintains a National Levee Database of federally, State, and locally constructed, operated, and maintained levees throughout the United States. The USACE Flood Risk Management Program maps levees operated and maintained by San Mateo County along the Bayshore at the San Carlos Airport. These levees ensure most of the San Carlos Airport, also owned and operated by San Mateo County, is largely but not completely located outside FEMA flood hazard zones and is protected from flood damage (see Figure 8-8). However, the bayshore levees do not protect other areas of the City near the Bay that are located west of the airport. Areas in San Carlos protected from bayshore flooding by levees are represented as flood protection zones shown in Figures 8-15 and 8-16, which depict Flooding and Seal Level Rise.

Dam Inundation

A dam inundation zone is an area in which flooding could occur due to failure of an upstream dam, endangering people, and property within the zone in the instance of such a failure. Dam inundation can be caused by an earthquake or other catastrophe. There are three zones of dam inundation near San Carlos: Lower Crystal Springs Reservoir Dam Inundation Zone, Notre Dame Dam Inundation Zone and Lower Emerald Lake Dam Inundation Zone. However, there are no such zones in the city. Figure 8-10 shows the location of dam inundation areas near San Carlos.

FIGURE 8-9

FEMA Flood Zones

FEMA Flood Zones

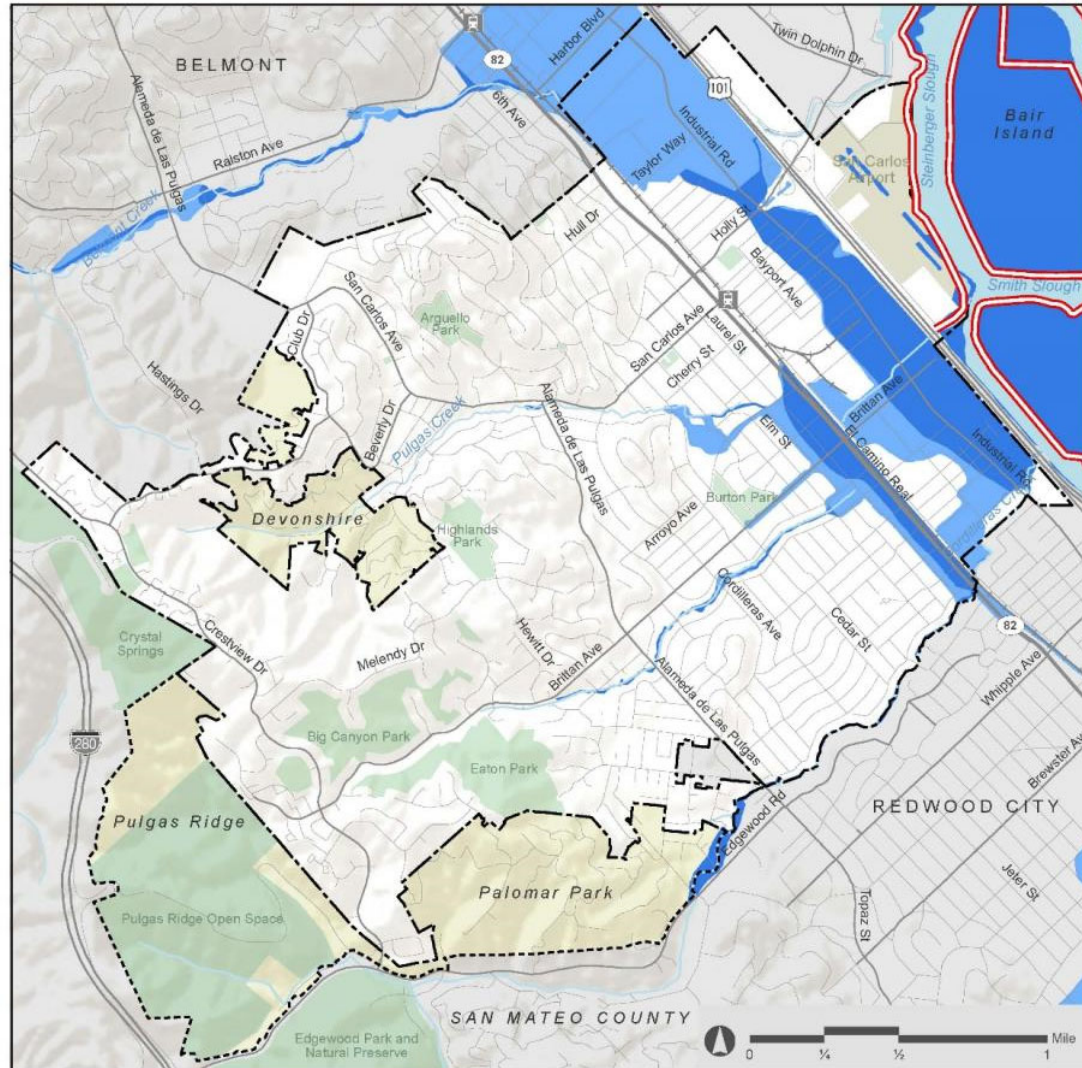
- 1% Annual Chance (100-year flood)
- 0.2% Annual Chance (500-year flood)
- NFHL - Levees

Base Map Features

- City of San Carlos Boundary
- Sphere of Influence
- Major Streets
- Streets
- Caltrain Railroad and Stations
- Surrounding Jurisdictions
- Parks and Open Space
- Waterbodies
- San Carlos Airport

August 2020




Sources: FEMA, 2016; United States Census Bureau, 2019; NOAA, City of San Carlos, County of San Mateo, Urban Footprint, 2020; NFHL

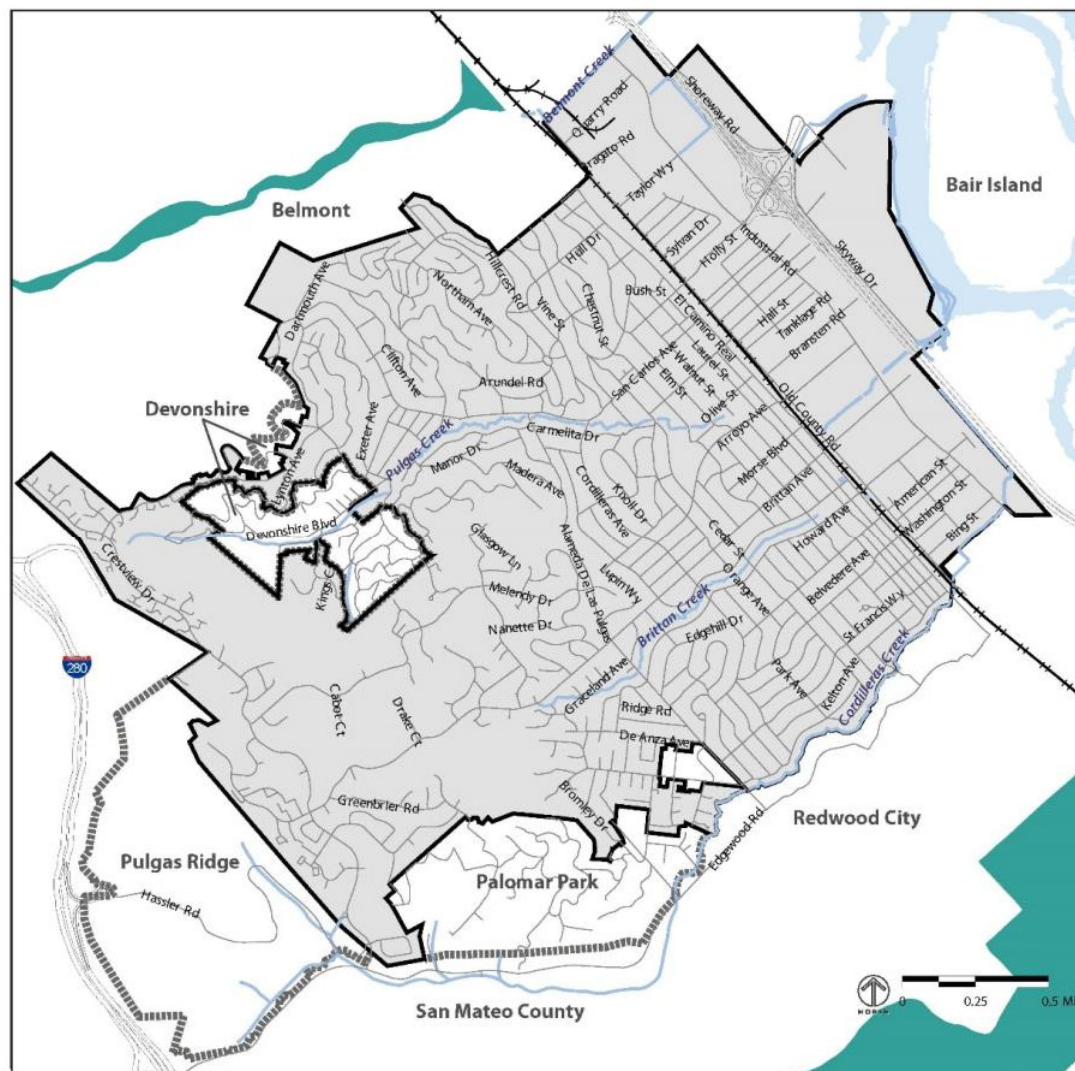


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FIGURE 8-10

Dam Inundation Area

-  City Limit
-  Sphere of Influence Areas
-  Dam Inundation Areas



August 2020
Sources: San Carlos 2030 General Plan, 2007.

Goals, Policies, and Actions



GOAL ESPS-2

Reduce hazards associated with flooding and inundation.

POLICIES

Policy ESPS-2.1 Improve and maintain City storm drainage infrastructure in a manner that reduces flood hazards.

Policy ESPS-2.2 Maintain and prioritize restoration of a healthy riparian corridor in City-maintained flood control channels such as Pulgas Creek and Belmont Creek to reduce the risk of flooding due to erosion, siltation, blockage, and heavy undergrowth; and increase community access to channels with improved stormwater and flood management strategies.

Policy ESPS-2.3 Maintain a strong and enforceable Stream Development and Maintenance Ordinance for all city creeks and their tributaries.

Policy ESPS-2.4 Minimize impervious surfaces to reduce stormwater runoff and increase flood protection.

Policy ESPS-2.5 Evaluate flood hazards on a watershed level, taking into account all sources of water and the eventual end point of each source.

Policy ESPS-2.6 Promote City staff knowledge and training on the relationship between watershed health and flood hazards.

Policy ESPS-2.7 Coordinate with neighboring jurisdictions on approaches to flooding and creek maintenance.

Policy ESPS-2.8 Continue to work with appropriate local, State, and federal agencies (such as FEMA, San Mateo County OneShoreline Program, City/County Association of Governments (CCAG) of San Mateo County, and San Francisco Bay Conservation and Development Commission (BCDC) to: (1) maintain the most current flood hazard and floodplain information and use it as a basis for project review; and (2) create public-private partnerships to guide development in accordance with federal, State, and local standards.

Policy ESPS-2.9 Reduce losses due to flooding by encouraging property owners who experience flood damage to reconstruct their properties in a flood-resistant manner.

Policy ESPS-2.10 Incorporate stormwater drainage systems in development projects to effectively control the rate and amount of runoff to prevent increases in downstream flooding potential.

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Policy ESPS-2.11 Continue to participate in the National Flood Insurance Program. To this end, the City shall ensure that its regulations are in full compliance with standards adopted by the Federal Emergency Management Agency.

ACTIONS

Action ESPS-2.1 Consider participating in a regional Watershed Management Plan to perform technical analysis to understand geotechnical, biological, and hydraulic conditions to model the hydrography of the city and identify options to reduce flooding risk and where opportunities exist to restore creeks within the watershed to a more naturalized condition. Options could include detaining or retaining stormwater runoff in upper portions of the watershed, adding capacity in the lower portions of the watershed and maintaining existing creek and channel capacity through improved maintenance. The Watershed Management Plan would seek to balance the two primary functions of creeks: flood control and riparian habitat.

Action ESPS-2.2 Amend the Stream Development and Maintenance Ordinance to: (1) include all creeks and tributaries, including Pulgas Creek and Belmont Creek, to strengthen the

effectiveness of existing policies and to create vital and accessible community open space with improved stormwater and flood management strategies; (2) increase the required setbacks and landscaping provisions from the existing creek top to improve stormwater detention capacity and to help address flooding issues and creek restoration; (3) prohibit general vehicle access along the creek within the Stream Development Ordinance overlay district.

Action ESPS-2.3 Develop preferred streambank stabilization methods, which will guide private property owners in making repairs.

Action ESPS-2.4 Establish incentives for property owners to stabilize creek banks with natural methods.

Action ESPS-2.5 Work with private property owners who own creek frontage and educate the public on bio-engineering of creeks to stabilize banks and maintain natural creek forms.

Action ESPS-2.6 Seek to have property owners downstream of city limit maintain drainage channels in a responsible manner to avoid flooding.

Action ESPS-2.7 Initiate flood insurance rate map revisions for City projects.

Wildfire Hazards

This section describes the risk of wildland fires within San Carlos and its SOI.

Background Information

San Carlos' foothill neighborhoods west of Alameda de las Pulgas are designated Very High Fire Hazard Severity Zones (VHFHSZ) by the California Department of Forestry and Fire Protection (CAL FIRE) (Figure 8-11) or as provided by the most current Fire Hazard Severity Zone map published by California Department of forestry and Fire Protection's Fire and Resources Assessment Program (FRAP). All areas within San Carlos are served by the Redwood City Fire Department and San Mateo County Sheriff Department.

Fire protection in California is the responsibility of either the federal, state, or local government. In State Responsibility Areas (SRA), which are defined as those lands within California that meet specific geographic and environmental criteria. These are areas where CAL FIRE has legal and financial responsibility for wildland fire protection and where CAL FIRE administers fire hazard classifications and building standard regulations. SRAs are defined as lands that 1) are county unincorporated areas, 2) are not federally owned, 3) have wildland vegetation cover rather than agricultural or ornamental plants, 4) have watershed and/or range/forage value, and 5) have housing densities not exceeding three units per acre. Similar to the Federal Responsibility Areas (FRAs), where SRAs contain built environment or development, the responsibility for fire protection of those improvements (non-wildland) is that of a local government agency. Local Responsibility Areas (LRA) include incorporated cities and

cultivated agriculture lands. In LRA, fire protection is provided by city fire departments, fire protection districts, or counties, or by CAL FIRE under contract to local government. All VHFHSZ area in San Carlos is LRA. Additional information regarding fire hazards, including wildfire historical data, is found in the County of San Mateo 2021 Multijurisdictional Local Hazard Mitigation Plan (LHMP).

The Heather Elementary School and many homes in the western hills are located within the VHFHSZ. Other nearby schools include Carlmont High School, Tierra Linda Middle School, Mariposa Upper Elementary School, and San Carlos Charter Learning Center. Additionally, the Bayview Villa, an assisted living community, is within the unincorporated Devonshire Area. Several California Water Services (Bay Area Region) water tanks are located in the western hills, including at the intersection of Los Vientos Way and Crestview Drive, off of Crestview Drive near Crestview Park, on Melendy Drive near Crestview, on Melendy Drive near Heather School, and off of Heather Drive near Melendy Drive.

Wildfire smoke increases air pollution levels and creates a significant health risk. This health risk is particularly pronounced under weather conditions that prevent smoke from clearing, such as those during the lightning complex fires in 2020. In addition, essential roadways, such as evacuation routes and single-access roads, can potentially be blocked by wildfire flames or debris, making it difficult for residents to evacuate and emergency personnel to reach certain areas of the San Carlos. The entire energy delivery system, including electric transmission lines and natural gas pipelines, can also be damaged by wildfires. Coastal scrub and oak woodlands, although somewhat adapted to

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wildfires, can be substantially harmed by more frequent and severe fires that prevent ecosystems to fully recover.

San Carlos fire service is provided under contract by the City of Redwood City Fire Department. It provides fire protection, hazardous materials response, disaster preparedness, and emergency medical response. The Department of Forestry and Fire Protection (CAL FIRE) has a legal responsibility to provide fire protection to all within the State Responsibility Area. A portion of the San Carlos Sphere of Influence is under the State Responsibility Area.

San Carlos implements the San Mateo County's Zonehaven evacuation system. Zonehaven determines the most efficient and effective evacuation routes based on the emergency type and location. Evacuation routes will vary; however, Figure 8-12 identifies the roadways most frequently used for evacuations.

Historical fire information is provided in the County of San Mateo 2021 Multijurisdictional Local Hazard Mitigation Plan; it is incorporated by reference.

The City's key strategies for minimizing the toll of seasonal wildfires are as follows.

Prevention and Awareness. San Carlos's western neighborhoods exist along the urban/wildfire interface. Because these interface conditions will continue, educating the public about the natural role of fire and measures they can take to best protect properties from wildfires ("home hardening") will be critical to minimizing potential property damage and loss of life. Education and enforcement campaigns need to occur year-round, with extra

Wildland Urban Interface (WUI)

The WUI is the zone of transition between unoccupied land and human development. It is the line, area, or zone where structures and other human development meet or intermingle with undeveloped wildland or vegetative fuels.

Source: U.S. Fire Administration

effort expended prior to the fire season. Prevention can include fuel modification and defensible space strategies, restricting construction of new structures in wildfire zones, building wildfire resistance structures, and modifying existing structures.

Protection. The goal in any firefighting operation is to provide adequate fire suppression service to protect buildings and infrastructure in immediate danger from a wildfire. In San Carlos, many structures lie within the Very High Fire Hazard Severity Zone (VHFHSZ). Coordination among multiple firefighting agencies and mutual aid agreements are needed to fight major wildfires in the San Cruz Mountains and foothills. Ensuring adequate water supplies and pressure is critical. Additionally, warning systems and clear delineation of evacuation routes can protect lives.

Recovery. Following a major fire, the community may face the need to fix damaged infrastructure. Addressing repair/replacement of burned homes needs to include a thorough assessment of how to minimize recurrences.

Water Supply

San Carlos' water supply is provided by CalWater, which prepared an Urban Water Management Plan (UWMP) through 2045. CalWater's Mid-Peninsula District shows supply capacity through 2045. CalWater's Individual Supply guarantee is 35.68 MGD (million gallons per day) or 3,993 AF (acre feet) from the SFPUC. The 2020 UWMP estimates 2045 demand will be 36,396 AF. The 2020 UWMP shows adequate supply to meet projected demand through 2045 in normal years. In dry years, UWMP shows a deficit, however, the UWMP outlines strategies to reduce/restrict use and/or augment supply.

8 ENVIRONMENTAL SAFETY AND PUBLIC SERVICES ELEMENT

FIGURE 8-11

Fire Hazard Severity Zones

Fire Hazard Severity Zones

- Moderate
- High
- Very High
- Local Responsibility Area (SRA)
- State Responsibility Area (SRA)

All fire hazard severity zones within San Carlos city limits are within the San Carlos Local Responsibility Area for fire emergency response. All other fire hazard severity zones illustrated in this map are within the State Responsibility Area or other Local Responsibility Areas.

At Risk Development and Infrastructure

- Residential Uses
- Clifford Elementary & Heather Elementary
- Alternative Energy Fueling Stations
- Bus Stops
- California Water Service Water Tanks
- Emergency Shelters
- Bayview Villa Assisted
- FM
- Microwave
- Water Tank

April 2022

Sources: United States Census Bureau, 2019; State of California Department of Forestry and Fire Protection, City of San Carlos, County of San Mateo, Urban Footprint, 2020.

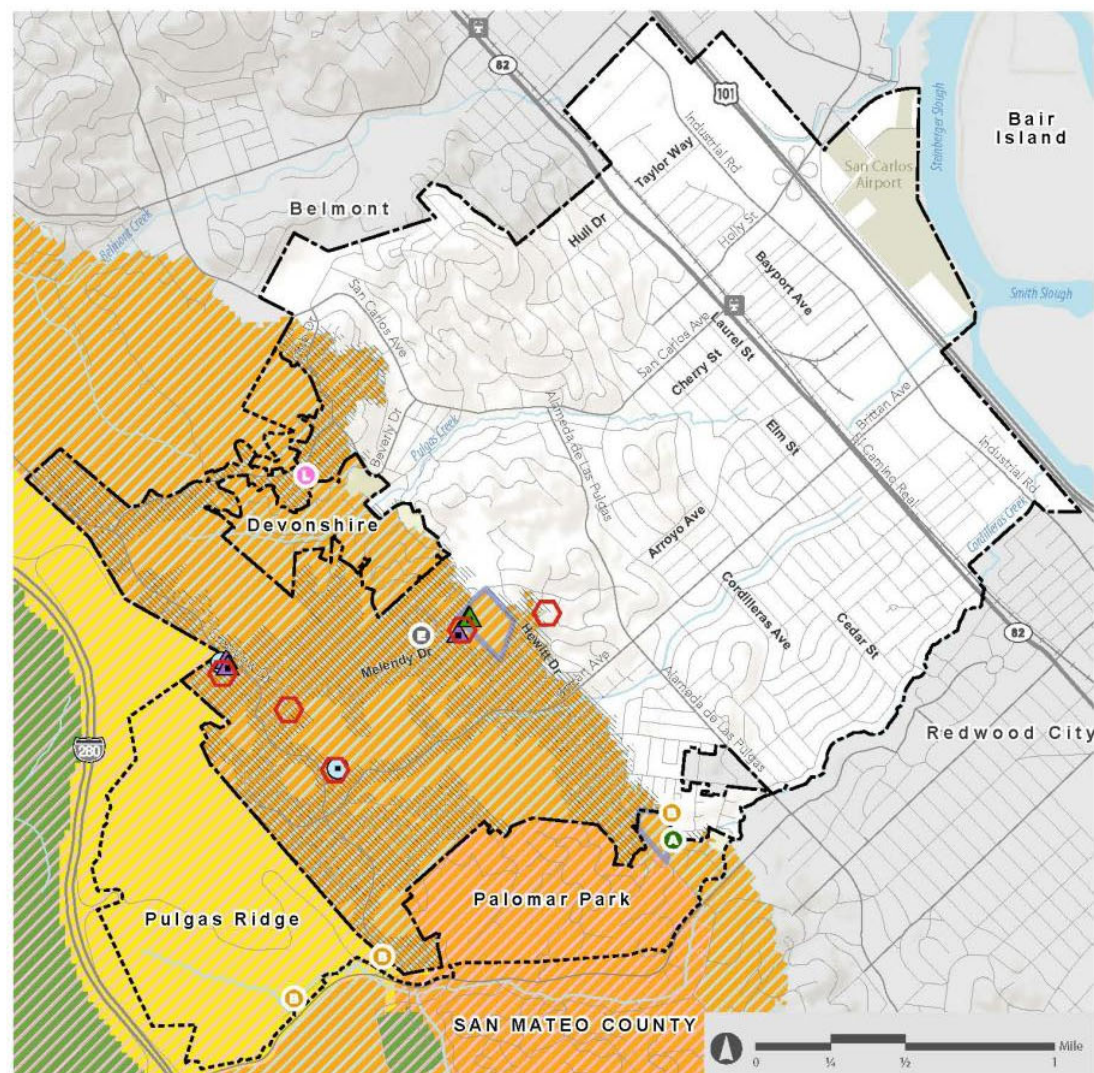


FIGURE 8-12
Evacuation
Routes

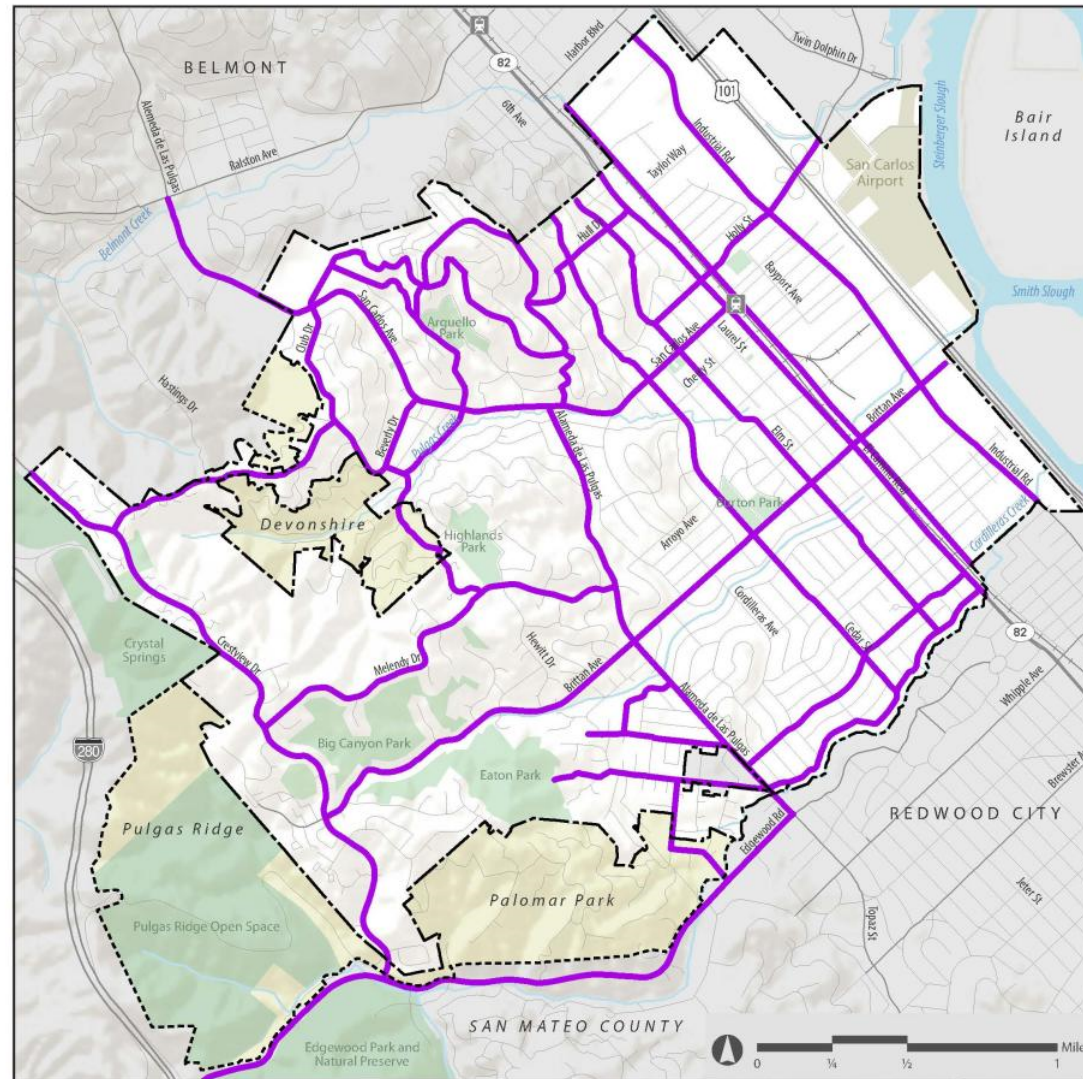
Evacuation Routes



Base Map Features

- City of San Carlos Boundary
- Sphere of Influence
- Major Streets
- Streets
- Caltrain Railroad and Stations
- Surrounding Jurisdictions
- Parks and Open Space
- Waterbodies
- San Carlos Airport

January 2022
Sources: United States Census Bureau, 2019.
City of San Carlos, County of San Mateo, Urban Footprint, 2020.



8 ENVIRONMENTAL SAFETY AND PUBLIC SERVICES ELEMENT



FIGURE 8-13

Single Access Roads

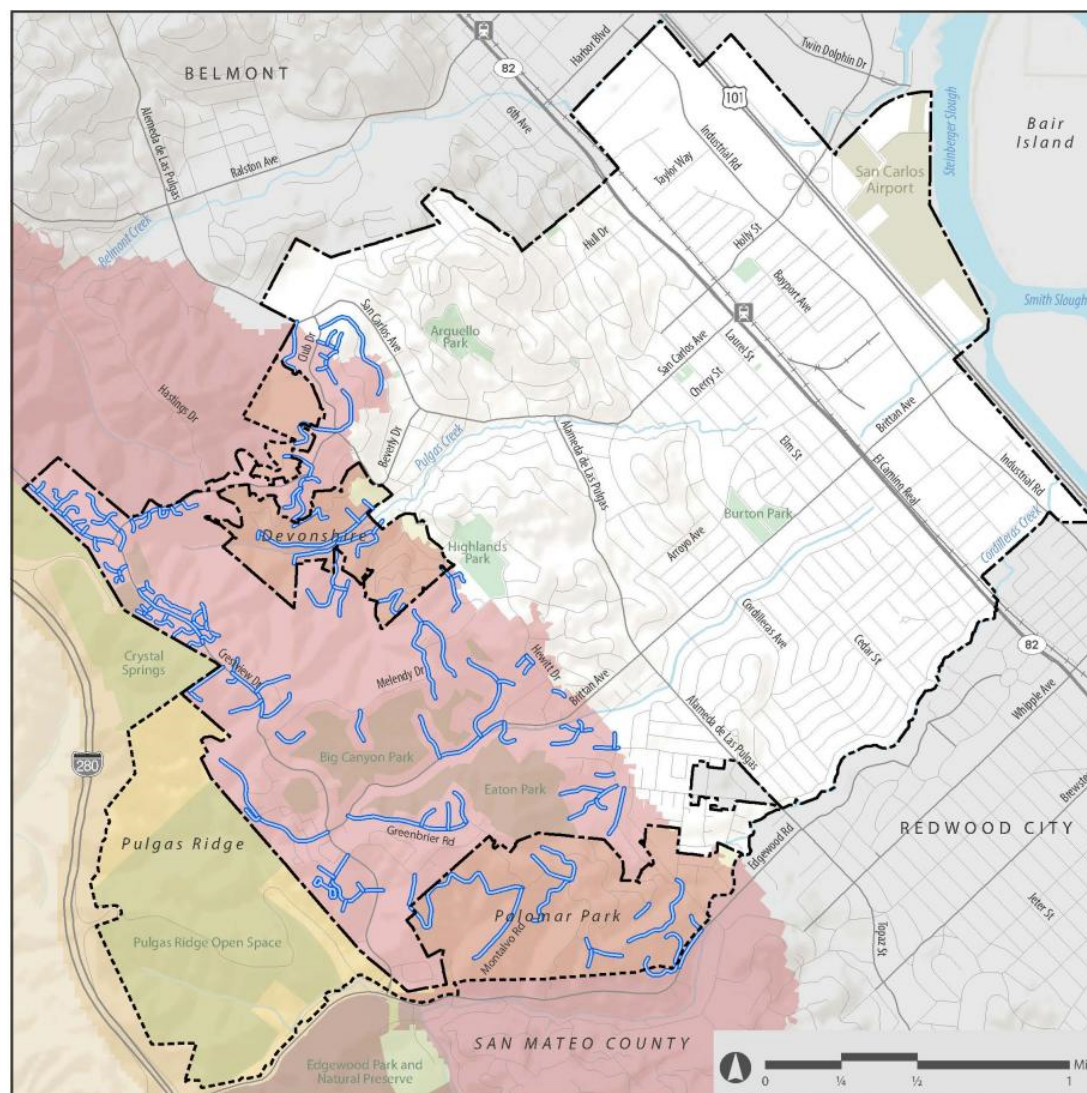
Wildfire Hazards

- Very High
- High
- Moderate
- Single Access Roads

Base Map Features

- City of San Carlos Boundary
- Sphere of Influence
- Major Streets
- Streets
- Caltrain Railroad and Stations
- Surrounding Jurisdictions
- Parks and Open Space
- Waterbodies
- San Carlos Airport

January 2022
Sources: United States Census Bureau, 2019.
City of San Carlos, County of San Mateo, Urban Footprint, 2020.



Goals, Policies, and Actions



GOAL ESPS-3

Agency Coordination: A resilient San Carlos is well prepared to minimize risks associated with wildfire.

Agency Coordination and Fire Prevention Planning

POLICIES

Policy ESPS-3.1 Promote and improve, as necessary, inter-jurisdictional fire prevention assessment, planning, and projection; and consultation and communication regarding disaster or emergency plans of San Carlos and Mutual Aid with adjacent agencies including but not limited to San Mateo County, Redwood City, Belmont, and CAL FIRE.

ACTIONS

Action ESPS-3.1 Maintain participation in the Joint Powers Authority Agreement with all fire departments in San Mateo County to ensure

required response times for initial emergency deployment personnel and equipment.

Action ESPS-3.2 Preserve the local government agreement with California Department of Forestry and Fire Protection (CAL FIRE) for responses in the Mutual Threat Zone (MTZ) within the Wildland Urban Interface (WUI) areas of the city. Continue to provide equipment and personnel under the mutual aid agreement, with the State of California Office of Emergency Service (OES) Region II. This continued “reverse support” enables the City of San Carlos to receive “no cost” statewide mutual aid in the event of a declared large-scale emergency.

Action ESPS-3.3 Collaborate with the regional fire agencies on strategies available to maintain defensible space, diverse plant composition (e.g., less combustible native plants), undertake appropriate thinning of vegetation, and maintain fuel breaks without permanently damaging native habitat.

8 ENVIRONMENTAL SAFETY AND PUBLIC SERVICES ELEMENT



Facilities and Training

POLICIES

Policy ESPS-3.2 Conduct annual training for fire, emergency medical, and police staff including cross training with adjacent automatic or mutual aid emergency response departments. Regularly maintain, test, and update training and equipment to meet current standards.

Policy ESPS-3.3 Ensure adequate Fire Department resources (fire stations, personnel, and equipment) to meet response time standards, keep pace with growth, and provide a high level of service to the community.

ACTIONS

Action ESPS-3.4 Continue to work with the Redwood City Fire Department to ensure that fire services are maintained at adequate levels. With subsequent Safety Element updates, assess and project future emergency service needs. Continue to monitor service area to ensure that all San Carlos areas have fire service. Monitor the City of San Carlos' fire protection rating and work with the

Redwood City and San Mateo County Fire Departments to correct deficiencies and to ensure ongoing training, including cross training is conducted.

Action ESPS-3.5 Train and educate public volunteers in basic fire safety response.

Land Use Planning

POLICIES

Policy ESPS-3.4 Locate essential public facilities out of high-risk, wildfire-prone areas including the VHFHSZ unless mitigation measures, above the minimum fire protection standards, are installed.

Policy ESPS-3.5 Prioritize infill development opportunities to prevent increased development in the WUI and Very High Fire Severity Zones (VHFHSZ).

Policy ESPS-3.6 Minimize new development (residential and nonresidential) within the VHFHSZ.

Policy ESPS-3.7 Consider the preservation of undeveloped ridgelines to reduce fire risk and improve fire protection.

Policy ESPS-3.8 Regularly review and confirm the City's re-development policy for all

structures in VHFHSZs after large fires. If the City has an unwritten policy, adopt a written re-development policy.

Policy ESPS-3.9 Incorporate or require the incorporation of fire safety features in new development and re-development.

Policy ESPS-3.10 Require new residential developments to:

- have adequate fire protection; and
- be more wildfire resistant by establishing greenbelt zones for fire resistant landscaping.

Policy ESPS-3.11 Require new residential development to be designed in such a manner that reduces wildfire hazard and improves defensibility (e.g. clustering lots, managed greenbelts, water storage, fuel modification zones, and vegetation setbacks.)

ACTIONS

Action ESPS-3.6 Discourage critical facilities being in the VHFHSZ.

Action ESPS-3.7 Adopt a formal written policy regarding the City's policy allowing rebuilding in the VHFHSZ. Periodically, re-evaluate the

policy to assure consistency with State law and local preferences.

Action ESPS-3.8 When a fire has occurred in the VHFHSZ, evaluate if street design and size can be reconfigured to improve emergency access and evacuation efficiency.

Action ESPS-3.9 If development is permitted within the VHFHSZ, require:

- a Fire Protection Plan addressing: risk analysis, fire response capabilities, fire safety requirements (defensible space, infrastructure, and building ignition resistance), mitigation measures and design considerations for non-conforming fuel modification, and wildfire education maintenance and limitations;
- landscape/fuel modification installation, incorporating open areas to complement defensible spaces, identifying possible refuge areas, and mapping and providing multiple ingress and egress routes;
- resident evacuation plans and ways to effectively communicate those plans, including identifying the location and direction of evacuation routes and at least two points of ingress and egress; and
- a roadside fuel reduction plan to prevent fires along public roads caused by vehicles.

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Action ESPS-3.10 Enforce fire standards and regulations while reviewing building plans and conducting building inspections.

Water Supply

POLICY

Policy ESPS-3.12 Ensure adequate water supply is available.

ACTIONS

Action ESPS-3.12 Require new development projects have adequate water supplies to meet the fire-suppression needs of the project without compromising existing fire suppression services to existing uses.

Action ESPS-3.13 Work with water suppliers (Cal Water) to:

- maintain and ensure the long-term integrity of future water supply for fire suppression needs;
- ensure that water supply infrastructure adequately supports existing and future development and redevelopment;
- provide adequate water flow to combat structural and wildland fires, including during peak domestic demand periods. Water systems

shall equal or exceed the standards of the latest edition of National Fire Protection Association (NFPA) 1142, "Standard on Water Supplies for Suburban and Rural Fire-Fighting-";

- ensure water infrastructure can provide for peak fire flow; and
- identify where water infrastructure does not allow for peak fire flow and develop a plan to mitigate the deficiencies.

Construction and Property Maintenance

POLICY

Policy ESPS-3.13 Ensure new and existing public and privately owned properties are constructed and maintained in a manner that minimizes and reduces fire hazard threats and has adequate fire protection.

ACTIONS

Action ESPS-3.14 Condition all new development and redevelopment to have adequate fire protection, incorporate and maintain fire safe design, including fuel modification zones, defensible space, two ingress/egress points, emergency vehicle access, and visible home addressing and street signage.

Action ESPS-3.15 Require the use of fire-retardant roofing material for all new construction and major remodels involving roof additions. Encourage property owners with shake shingle roofs to upgrade to fire-retardant materials.

Action ESPS-3.16 Continue to enforce the brush clearance/weed abatement program for both private and public roads as well as City-owned open spaces.

Action ESPS-3.17 Continue code enforcement programs requiring private and public property owners to maintain buildings and properties to prevent blighted conditions, remove excessive or overgrown vegetation (e.g., trees, shrubs, weeds), and remove litter, rubbish, and illegally dumped items from properties.

Action ESPS-3.18 Seek grants and other funding sources to assist low-income residents with home hardening efforts.

Action ESPS-3.19 Adopt an ordinance or update existing ordinances to require development standards that meet or exceed title 14, CCR, division 1.5, chapter 7, subchapter 2, articles 1-5 (commencing with section 1270) (SRA Fire Safe Regulations) and title 14, CCR, division 1.5, chapter 7, subchapter 3, article 3 (commencing with section 1299.01) (Fire

Hazard Reduction Around Buildings and Structures Regulations) for SRAs and/or VHFHSZs.

Action ESPS-3.20 Within the VHFHSZ, the City's building and planning departments will work with local fire departments, community organizations, and other responsible organizations to require and ensure:

- the installation of fire protection water system for all new construction projects including fire hydrant installation, fire sprinkler, or suppression systems, and providing adequate fire flow;
- the long-term maintenance of defensible space clearances around structures, subdivisions, and fire breaks; and
- all structures rebuilt/re-developed after a large fire to comply with building and fire codes in effect at the time of the re-development.

Action ESPS-3.21 Conduct a survey of existing residential structures (including vegetation) within the VHFHSZ identifying buildings that do not comply with fire safety standards. Consult with property owners to bring those properties into compliance with the most current building and fire safety standards.

Action ESPS-3.22 Consider developing or improving structure hardening standards for community refuges (such as schools, hospitals, evacuation centers).

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Action ESPS-3.23 Evaluate the City's roadways regarding access, alignments, etc. to facilitate fire, police, and ambulance access and resident egress in case of an emergency.

Access and Evacuation Policies

POLICIES

Policy ESPS-3.14 Provide adequate evacuation routes and access for fire and emergency service vehicles to all San Carlos areas.

Policy ESPS-3.15 Identify and implement measures to mitigate the single access roads and non-conforming roadways, as feasible.

ACTIONS

Action ESPS-3.24 Identify streets and key intersections that, due to pavement width, hairpin turns, and tight curves, if not cleared of vehicles, may interfere with emergency vehicle access and/or resident evacuation during a fire.

Action ESPS-3.25 Identify the potential for street widening and improvement during regular Capital Improvement project maintenance, e.g., emergency access, utility undergrounding, resurfacing,

and American with Disabilities (ADA) compliance.

Action ESPS-3.26 Prohibit parking on one or both sides of a street identified as having the potential to interfere with emergency vehicle access and/or resident evacuation during a fire, when Red Flag alerts have been issued.

Action ESPS-3.27 In conjunction with the use of the Zonehaven system, supplement the evacuation plan as shown in Figure 8-12, with special emphasis placed on the areas that do not have sufficient access and egress identified on Figure 8-13. Recommend improvements to ensure adequate evacuation capabilities.

ACTIONS

Action ESPS-3.28 Conduct a study to review evacuation routes, their capacity, safety, and viability under a range of emergency scenarios as set forth in AB 747. Determine remedial actions, as appropriate. Update evacuation plans with each update of the Safety Element to address changes in at-risk areas and populations.



GOAL ESPS-4

Develop a community that proactively prevents wildfires and protects life, property, and infrastructure from urban and wildfire impacts.

POLICIES

Policy ESPS-4.1 Provide public education to promote community awareness and preparedness for self-action in the event of a major disaster or emergency.

Action ESPS-4.1 Partner with Redwood City Fire Department, San Mateo Sheriff Department, neighboring cities, regional agencies, local school districts, local businesses, and community organizations to:

- conduct emergency and disaster preparedness exercises that test operational and emergency response plans (including evacuation routes); and
- prepare and conduct public outreach regarding evacuation procedures and routes and defensible space.

Action ESPS-4.2 Identify at-risk populations that would be vulnerable during wildfire evacuations and provide information to the at-risk residents regarding defensible space and evacuation routes.

Action ESPS-4.3 Prepare and make available to the public a current map of areas subject to wildland fires as provided by the California Department of Forestry and Fire Protect (CAL FIRE).

Action ESPS-4.4 Implement a fire hazards education program to minimize risk for residential, commercial, and institutional uses.

- Provide training opportunities for residents for fuel modification methods, practices, and materials.
- Prepare and distribute two vegetation lists - one identifies recommended vegetation in the VHFHSZ and the other identifies prohibited vegetation in the VHFHSZ.

Action ESPS-4.5 Create and promote enrollment in a San Carlos emergency reverse dial program. Work with vulnerable populations to ensure enrollment.

Action ESPS-4.6 Consider establishing an outdoor warning system in the VHFHSZ designed to alert residents about possible fire danger.

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Hazardous Materials and Waste

A “hazardous material” is defined by the California Health and Safety Code Section 25501 as, “any material that, because of its quantity, concentration, or physical or chemical characteristics, poses a significant present or potential hazard to human health and safety or to the environment if released into the workplace or the environment.” Products as diverse as gasoline, paint solvents, film solvents, household cleaning products, refrigerants and radioactive substances are categorized as hazardous materials. What remains of hazardous material after use, or processing, is considered to be a hazardous waste.

Background Information

This section describes hazardous material sites, hazardous waste collection, and hazardous materials response in San Carlos.

Hazardous Material Sites. Due to San Carlos’ history of industrial use, hazardous materials may be present in the soils and groundwater in or near these areas, especially in the East Side and along portions of El Camino Real. Common hazardous materials in industrial areas include oils, fuels, paints, solvents, acids and bases, disinfectants, and metals. Legacy pollutants used in industrial practices up to the 1970s, such as polychlorinated biphenyl (PCB), may also be present in these areas. The State Department of Toxic Substances Control (DTSC) is responsible for maintaining a list of sites with active hazardous material users and/or generators and sites with

historical or current environmental contamination. The Department is also responsible for coordinating the cleaning-up of contaminated sites. Figure HAZ-1 in Appendix A shows the locations of hazardous materials sites in San Carlos according to the DTSC’s records. Table HAZ-1, in Appendix A, lists the hazardous materials sites with current or historic environmental contamination.

Hazardous materials have also been known to infiltrate the groundwater, in some cases contaminating entire groundwater systems. There are currently no known regional plumes of contaminated groundwater, according to the County of San Mateo Health Services Agency and the State Water Board.

Hazardous Materials Response. The Hazardous Materials Response Team of San Mateo County responds to hazardous materials emergencies throughout the county. The team is comprised of the South County Fire Hazmat Team, the Environmental Health Division of the County Health Services Agency, and the Sheriff’s Office of Emergency Services.

Household Hazardous Waste (HHW). Hazardous waste generated by San Carlos residences is collected in part by the recycling and solid waste services management company at the Shoreway Recycling and Disposal Center, in part through San Mateo County Environmental Health HHW monthly drop-off appointment events in San Mateo, and in part through other collection facilities. There are several other convenient locations for drop off of HHW including:

- A mercury thermometer exchange at the South Bayside System Authority wastewater treatment plant. Fluorescent bulb recycling bins at certain lighting retailers.
- A pharmaceutical drop-box is also available at the San Carlos Police Department.
- Batteries, mobile phones and motor oil can be recycled curb-side at homes or businesses.

Some HHW, including medical wastes, asbestos, tires, and explosives are not readily disposable within San Carlos

Goals, Policies, and Actions



GOAL ESPS-5

Protect the community from the harmful effects of hazardous materials.

POLICIES

Policy ESPS-5.1 Prohibit uses involving the manufacturing of hazardous materials throughout the city. Hazardous materials are defined in Chapter 6.95, Section 25501 0-1 of the Health and Safety Code. This policy applies only to the direct manufacture of hazardous substances. It does not apply to the storage or use of such

materials in conjunction with permitted commercial and industrial uses.

Policy ESPS-5.2 Require producers of and users of hazardous materials in San Carlos to conform to all local, State and federal regulations regarding the production, disposal, and transportation of these materials.

Policy ESPS-5.3 Mitigate hazard exposure to and from new development projects through the environmental review process, design criteria, and standards enforcement.

Policy ESPS-5.4 Mitigate indoor air intrusion potential in areas of new development or redevelopment where the property is located above known volatile compound plumes.

Policy ESPS-5.5 Where deemed necessary, based on the history of land use, require site assessment for hazardous and toxic soil contamination prior to approving development project applications.

Policy ESPS-5.6 Require that new development proposals are reviewed for legally required remediation by authorities with jurisdictional authority over groundwater and surface water contamination including but not limited to San Mateo County Environmental Health, State Water Quality Control Board and the Army Corps of Engineers, where waters of the United States are involved, and

8 ENVIRONMENTAL SAFETY AND PUBLIC SERVICES ELEMENT



collaborate with authorities to ensure all relevant remediation requirements are met.

- Policy ESPS-5.7** Prohibit new non-residential uses that are known to release or emit toxic waste at levels that are harmful to human health while continuing to allow life science, research and development, medical, and other necessary services such as dry cleaners.
- Policy ESPS-5.8** Require the preparation of emergency response plans as part of use applications for all large generators and users of hazardous waste as required by federal law.
- Policy ESPS-5.9** Actively promote public education, research, and information dissemination on hazards materials.
- Policy ESPS-5.10** Expand community engagement on remediation. Engage community members in the remediation of toxic sites and the permitting and monitoring of potentially hazardous industrial uses.
- Policy ESPS-5.11** Encourage the use of green building practices to reduce potentially hazardous materials in construction materials.
- Action ESPS-5.1** Provide on-going training for appropriate City personnel in hazardous materials, response, and handling.

ACTIONS

- Action ESPS-5.2** Disseminate information on proper disposal of household hazardous waste.
- Action ESPS-5.3** Coordinate with waste disposal services and other government agencies to increase the convenience of proper disposal of household hazardous waste.
- Action ESPS-5.4** Evaluate opportunities to participate in household hazardous waste collection services.
- Action ESPS-5.5** Prioritize remediation efforts and ensure all relevant remediation requirements are met by requiring new development proposals be reviewed for legally required mediation by San Mateo County Environmental Health, State Water Quality Control Board, and the Army Corp of Engineers.
- Action ESPS-5.6** Prepare regulations that address biosafety levels (BSL) for new life science, biotechnology, or other scientific developments to ensure a healthy and safe San Carlos community.

Airport Operations

This section includes background information about the San Carlos Airport and a goal, a policy, and an action related to airport safety.

Background Information

The San Carlos Airport is located within the San Carlos city limit east of US 101, along the bay shoreline. The 160-acre airport is located on land owned by the County of San Mateo and managed by the County Public Works Department.

Private planes are the primary users of the San Carlos Airport and are utilized for both business and recreation. Due to the airport's 2,600-foot runway, large aircraft, such as commercial

POLICIES

jets, are not permitted to use the airport. The airport also allows private jets under 12,500 pounds to land and take off at any time, but activities such as student training are limited to daytime to meet noise abatement requirements. The airport houses around 500 aircraft and is the place of business for over 25 aviation related businesses, including a helicopter training school. Other airport services include emergency response functions such as Air-Ambulance, Medivac flights and law enforcement patrols.

The City/County Association of Governments of San Mateo County (C/CAG) serves as the State-mandated Airport Land

ACTIONS

Use Commission and is responsible for promoting land use compatibility around the County's airports in order to minimize public exposure to excessive airport noise and safety hazards. The primary means by which this is accomplished is through the San Mateo County Comprehensive Airport/Land Use Plan (CLUP), adopted by C/CAG in 2015. The CLUP is a

State mandated document that addresses airport/land use compatibility related to proposed land use policy actions within the environs of San Carlos Airport.

Goals, Policies, and Actions



GOAL ESPS-6

Minimize risks associated with operations at the San Carlos Airport.

Policy ESPS-6.1 Maintain land use and development in the vicinity of San Carlos Airport that are consistent with the relevant airport/land use compatibility criteria and guidelines contained in the adopted Airport/Land Use Compatibility Plan for the environs of San Carlos Airport, including noise, safety, height, and aviation easement requirements.

Action ESPS-6.1 Submit proposed land use policy actions (general plans/amendments, specific plans/amendments, rezonings, etc.) and related development plans, if any, that affect property located within the Area B portion of the Airport Influence Area (AIA) boundary for San Carlos Airport, to the San Mateo County Airport Land Use Commission for review/action, pursuant to

8 ENVIRONMENTAL SAFETY AND PUBLIC SERVICES ELEMENT



California Public Utilities Code Section 21676(b), prior to final action by the City.

Emergency and Disaster Preparedness

This section addresses disaster preparedness and emergency response plans in San Carlos.

Background Information

As required by State law, the City of San Carlos has established emergency preparedness procedures to respond to a variety of natural and man-made disasters that could affect the community. In the event of an emergency, the City will respond according to the Standardized Emergency Management System (SEMS) developed by the State. The SEMS system establishes a hierarchy of response, with local government as the first responders. If San Carlos does not have sufficient resources to respond to a disaster, the County of San Mateo would lend resources. Mutual Aid agreements between various agencies would be enacted all the way to the State level.

San Carlos established an Emergency Operations Center (EOC) program in 1987. The Emergency Response Plan establishes evacuation routes, identifies agencies responsible for emergency response and summarizes and assesses potential threats and hazards. Additionally, as required by California Government Code 3100, all City employees will report to City Hall, after ensuring the welfare of their families, to assist in emergency response in the event of a disaster.

San Mateo County Sheriff's Office of Emergency Services (OES) is responsible for coordinating emergency response in the county. The OES operates under a Joint Powers Agreement with the 20 incorporated cities in the county. The Emergency Services Council, which consists of a representative from each of the 20 incorporated cities and a member of the County Board of Supervisors, governs the OES.

SMC Alert

SMC Alert is a software application used to send emergency alerts, notifications, and updates to cell phones, mobile devices, home phones, work, and/or e-mail accounts. In the event of an emergency, public safety agencies such as the City of San Carlos are able to provide emergency information directly to the community. These messages provide the community with instructions, orders, and updates.

The SMC Alert system is managed by the San Mateo County Department of Emergency Management (DEM). The service is free to all and is available to all cities, towns, and special districts within San Mateo County. Alerts may also be sent by local fire, police, and emergency operations managers from other cities within San Mateo County. Alert types may include life safety, fire, weather, accidents involving utilities, or roadway or disaster notifications.

Zonehaven

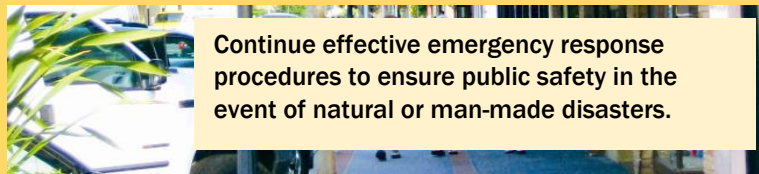
Zonehaven is an application that provides a common operating framework for mutual aid and evacuation planning. Zonehaven's evacuation management platform assists emergency services and increases efficiency with seamless

collaboration between fire agencies, law enforcement, Office of

POLICIES

Emergency Services, and the community. Zonehaven's community evacuation interface promotes safety and security by providing community members with their zone and an up-to-date evacuation status.

Zonehaven incorporates local weather conditions, geographic data, and local knowledge into simulations to provide an accurate emergency situation scenario. Using local traffic data, zones network analysis algorithms identify key intersections and choke points so emergency management agencies can define zones to reduce gridlock and enable fire and law enforcement to support evacuations more easily. In the event of an evacuation, models can be generated to enable fire and law enforcement to look ahead at what may come in the system and the application can be switched over to training mode to run a rapid simulation that provides 1-, 3- and 5-hour predictions to provide recommendations for evacuation zone sequencing.



GOAL ESPS-7

Goals, Policies, and Actions

Policy ESPS-7.1 Display leadership in the preparation for natural and human-made disasters by taking a proactive rather than a reactive approach.

Policy ESPS-7.2 Preserve a Basic Emergency Operation Plan consistent with the National Incident Management System (NIMS).

Policy ESPS-7.3 Maintain City Hall as the Emergency Operations Center (EOC) in San Carlos and provide for fully functional back up EOC for City staff.

Policy ESPS-7.4 Coordinate the preparation for natural and man-made disasters with the San Mateo County Office of Emergency Services, neighboring jurisdictions, and other governmental agencies.

Policy ESPS-7.5 Inform the public about disaster preparedness by providing information on supplies, training, evacuation routes, communication systems, and shelter locations.

Policy ESPS-7.6 Make available to the community, programs and resources relating to disaster preparedness.

Policy ESPS-7.7 Support the efforts of neighborhood and civic organizations to prepare for disasters if City resources are not available.

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Policy ESPS-7.8 Identify and develop communication systems, evacuation methods, shelter locations and other services for special needs populations.

Policy ESPS-7.9 Evaluate safety service limitations on an annual basis to provide for adequate levels of service.

Policy ESPS-7.10 Identify potential emergency routes and suggest methods for operational needs for first responders.

Policy ESPS-7.11 Establish the capability to re-locate critical emergency response facilities such as fire, police, and essential services facilities, if needed, in areas that minimize their exposure to flooding, seismic effects, fire, or explosion.

Policy ESPS-7.12 Develop a procedure to quantify community emergency preparedness levels.

ACTIONS

Action ESPS-7.1 Evaluate the Emergency Operation Plan on an annual basis and revise as needed to promote disaster preparedness.

Action ESPS-7.2 Coordinate emergency response procedures with acute care medical facilities in San Mateo County to ensure

adequate preparedness for hospital patients and staff.

Action ESPS-7.3 Participate in regional disaster event simulations semi-annually by using the primary EOC and methods for implementing a back-up EOC.

Action ESPS-7.4 Create a back-up EOC for City staff. Enter into a shared EOC agreement with a neighboring jurisdiction or County in the event City Hall is rendered inoperable as an EOC.

Action ESPS-7.5 Participate in San Mateo County OES preparedness exercises and disaster simulations.

Action ESPS-7.6 Encourage City employees through a volunteer program to obtain training in disaster preparedness and basic first aid skills.

Action ESPS-7.7 Maintain and enhance the community disaster preparedness programs.

Action ESPS-7.8 Identify the need for community awareness and education programs for residents. Develop programs to respond to identified needs.

Action ESPS-7.9 Disseminate semi-annually, disaster preparedness information to residents

through the city web site, newsletters, e-notify, newspaper articles, or other methods.

Action ESPS-7.10 Make available multi-language disaster preparedness information.

Action ESPS-7.11 Identify and program for emergency supplies through the EOC program in public parks.

Climate Change Resilience

This section is based on the Safety Element's accompanying Vulnerability Assessment, the San Carlos Climate Mitigation and Adaptation Plan, and the San Mateo County Multijurisdictional Local Hazard Mitigation Plan, which are

Resilience

Resilience is the capacity of an individual, community, organization, or natural system to prepare for disruptions, to recover from shocks and stresses, and to adapt and grow from a disruptive experience.

Source: California Adaptation Planning Guide (2020)

incorporated by reference.

Background Information

Climate change is a long-term change in the average meteorological conditions in an area. Currently, the global climate is changing due to a human-induced increase in greenhouse gas (GHG) emissions that trap heat near the Earth's

surface. In San Carlos, climate change is expected to intensify existing hazards, such as sea level rise, wildfire, and drought, and increase the frequency and severity of storms and extreme heat events.

Increasing resilience involves planning and investment to address changing climate conditions and building adaptability and flexibility into systems and infrastructure. Resilience planning requires considering how plans and investments affect people, communities, economic conditions, and natural systems – all of which work together to build resilience. Increasingly, San Carlos is viewing land use policies and tools through the lens of climate resilience to protect public health and safety.

Drought

A drought occurs when conditions are drier than normal for an extended period, making less water available for people and ecosystems. As of the summer of 2022, San Carlos, as with California as a whole, is experiencing extreme drought according to the National Oceanic and Atmospheric Administration (NOAA).

Climate change is expected to cause more frequent and more intense droughts statewide. Overall, annual average precipitation levels are expected to remain similar, with more years of extreme precipitation events and droughts that last longer and are more intense.

All people, property and environments in the City would be exposed to some degree the impacts of moderate to extreme drought conditions. Drought can affect people's health and

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safety, by creating health problems related to low water flows, poor water quality, or dust and prolonged heat. Water shortages or price hikes during extended drought conditions could increase economic instability of low-income residents. Drought conditions can also dry out vegetation and increase wildfire conditions, which could strain firefighting equipment and personnel and present increased hazard to the City's western neighborhoods located in the VHFHS.

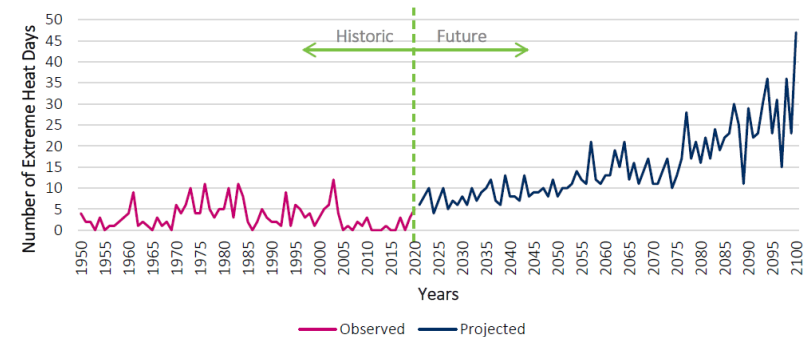
No structures will be directly affected by drought conditions. Drought causes the most significant economic impacts on industries that use water or depend on water for their business, most notably agriculture and related sectors (forestry, fisheries, and waterborne activities), power plants, and oil refineries. The aquatic habitat, wetlands, and riparian habitats that depend on water from the Pulgas, Brittan, Belmont, and Cordilleras Creeks are vulnerable to drought, which can lead to lower baseflows in streams, lower water quality, higher water temperatures, and potential wetland and riparian habitat degradation.

The County of San Mateo, Bay Area Water Supply & Conservation Agency (BAWSCA), regional water purveyors, and other regional stakeholders have devoted considerable time and effort to protect life, safety, and health during times of consecutive dry years. Steps have been taken to analyze and account for anticipated water shortages. San Carlos coordinates with San Mateo County and water purveyors to minimize and reduce drought impacts on community members and water consumers. No significant life or health effects are anticipated because of drought in San Carlos.

Extreme Heat

An extreme heat day in San Carlos occurs when air temperatures reach 94.7°F. The number of extreme heat days in San Carlos is projected to increase from 4 days per year to an average of 11 extreme heat days per year by mid-century and 22 extreme heat days per year by the end of the century (see Figure 8-14).

Figure 8-14 Projected Extreme Heat Days in San Carlos



Sources: Cal-Adapt, 2020, and National Oceanic and Atmospheric Administration, 2020.

Extreme heat can also occur in the form of warmer nights, as temperatures do not cool down overnight and provide relief from the heat. In San Carlos, a warm night occurs when the temperature stays above 59.5°F.

People may develop heat-related illnesses, such as heat stress, exhaustion, heat stroke, and respiratory problems, in response to a hot environment. The most vulnerable populations are those that spend a disproportionately high amount of time outside, such as children, outdoor workers, and persons

Vulnerability

Vulnerability is the exposure of human life and property to damage from natural and human-made hazards. Climate vulnerability describes the degree to which natural, built, and human systems are at risk of exposure to climate change impacts.

Differences in exposure, sensitivity, and capacity to adapt affect an individual's or community's vulnerability to climate change. Vulnerability can increase because of physical (built and environmental), social, political, and/or economic factor(s).

Vulnerability is considered a function of exposure, sensitivity, and adaptive capacity.

Source: California Adaptation Planning Guide (2020)

experiencing homelessness, as well as those with sensitive or compromised immune systems, persons with chronic illnesses, and seniors. Households in poverty are also highly vulnerable due to a lack of financial resources to prepare for or respond to extreme heat conditions.

Energy delivery services and associated infrastructure are highly vulnerable to extreme heat, as high temperatures can stress and overload the grid, causing power outages and damage to the transmission lines. Additional vulnerabilities include outdoor recreation, as people may be deterred from

recreating outdoors in high temperatures, and aquatic and wetland habitats, which can experience decreases in water quality as temperatures increase.

Adaptation solutions to heat include community sites serving as cooling centers, urban forestry programs, adding tree cover to transit stations, adopting building codes to address rising heat, and battery backups to address power shutoffs.

Severe Weather

Severe weather includes windstorms, hail, lightning, thunderstorms, and heavy rainfall. Severe weather is usually caused by intense storm systems, although types of strong winds can occur without a storm. New evidence suggests that severe storms may occur more often and become more intense than in the past because of climate change. Severe winds can damage or destroy buildings and infrastructure. Hail can damage buildings and plants, and lightning can spark fires, injure people, or cause fatalities. Heavy rainfall can lead to flooding in both the eastern and western portions of San Carlos. Strong winds and heavy rainfall are the most common types of severe weather in the San Carlos.

The most vulnerable to severe weather are persons experiencing homelessness; those who may live in less structurally resilient buildings, such as households in poverty and undocumented persons; and those who may have difficulty preparing or responding to severe weather due to mobility or language barriers. These populations include linguistically isolated populations, persons living on single-access roads, persons with chronic illnesses, and seniors living alone.

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The energy delivery system is especially vulnerable to windstorms, which can damage transmission lines or cause public safety power shutoffs (PSPS). Windstorms can also damage warehouses that hold harmful materials and prevent people from traveling to work, which can harm important economic drivers within the city.

Severe local storms are likely the most common widespread hazard in the city. They affect large numbers of residents when they occur and could overwhelm City and County resources.

Measures can be taken to mitigate the effects of severe weather. Critical facilities can be hardened to prevent damage during an event. The secondary effect of flooding can be addressed through decreasing runoff and water velocity. Debris, including downed trees, can be removed promptly and forested areas can be managed to reduce debris impacts. Public education can inform community members how to prepare for severe weather events.

Sea Level Rise

As global temperatures heat up, glaciers and other land ice near the north and south poles melt. The water flows into the ocean, increasing sea levels across the globe. Higher temperatures also cause water to expand in oceans, causing further rising of sea levels. Sea level rise is a gradual process, taking place over years or decades. In California, guidance suggests that sea levels will increase in most places by 6 to 10 inches by 2030, 13 to 23 inches by 2050, and 41 to 83 inches by 2100. However, it is possible that sea levels could rise faster than these projections. Along the San Carlos Bay shoreline, sea levels are projected to rise

approximately 24 inches by 2050 and 84 inches by 2100. Figures 8-15 and 8-16 show projected sea level rise along the Bayshore in San Carlos in 2050 and 2100.

Eventually, sea level may increase enough to permanently flood low-lying areas in the eastern part of San Carlos along the bayshore. Sea level rise threatens important buildings and key pieces of infrastructure that support the main economic drivers in San Carlos, such as Highway 101, the San Carlos Airport, the Hiller Aviation Museum, the Shoreway Environmental Center (solid waste transfer station), and the Silicon Valley Clean Water Wastewater Treatment Plant in Redwood City.

Flooding from sea level rise can damage building foundations, cause bridges and roadways to become impassable, flood control infrastructures to not work effectively, and hazardous material facilities to increase the risk of accidentally releasing harmful substances.

Natural systems, such as wetlands and tidal marshes, will be disrupted by higher tide levels. Many of the tidal marshes in eastern San Carlos are expected to convert to another habitat type, a process called "downshifting," which will lead to different plant and animal species, and some features of wetlands may be altered or lost. The current sea level rise projections would result in much of the existing wetlands along the San Carlos Bay shoreline being completely underwater and lost as habitat for wetland plants and animals sometime between 2050 and 2100.

Rising sea levels can also cause the bay shoreline to flood more frequently and severely, particularly during storm events when creeks and sloughs are discharging stormwater into the Bay. Because ocean levels are higher during normal conditions due to sea level rise, shoreline floods from king tides and storm surges, can reach further onto land. For example, a storm that has a 1 in 10 chance of occurring in a given year (known as a 10-year storm), can create a temporary increase in sea levels of approximately 28 to 30 inches. This means that if sea levels rise by 24 inches during normal conditions, a 10-year storm event would create a temporary sea level rise of around 52 inches. Sea level rise and bayshore flooding in 2050 and 2100 is shown in Figures 8-15 and 8-16. Higher sea levels can also give a "boost" to smaller floods that would not have been large enough to flood dry land during normal conditions, making shoreline flooding more frequent.

In addition to contributing to increased overland flooding, sea level rise can lead to the intrusion of salt water into groundwater aquifers, causing shallow groundwater tables to rise. This phenomenon can in turn cause ponding of water or flooding in low lying areas with little to no past flooding occurrences; infiltrate underground water, sanitary sewer, and storm drain pipelines; increase soil liquefaction risk during seismic events; and remobilize old soil contaminants. This effect of sea level rise has been studied less in coastal communities compared to increased overland flooding.

Several populations and assets face particularly high risks from flooding events exacerbated by sea level rise. Persons experiencing homelessness, households in poverty, and linguistically isolated persons are more vulnerable to the effects

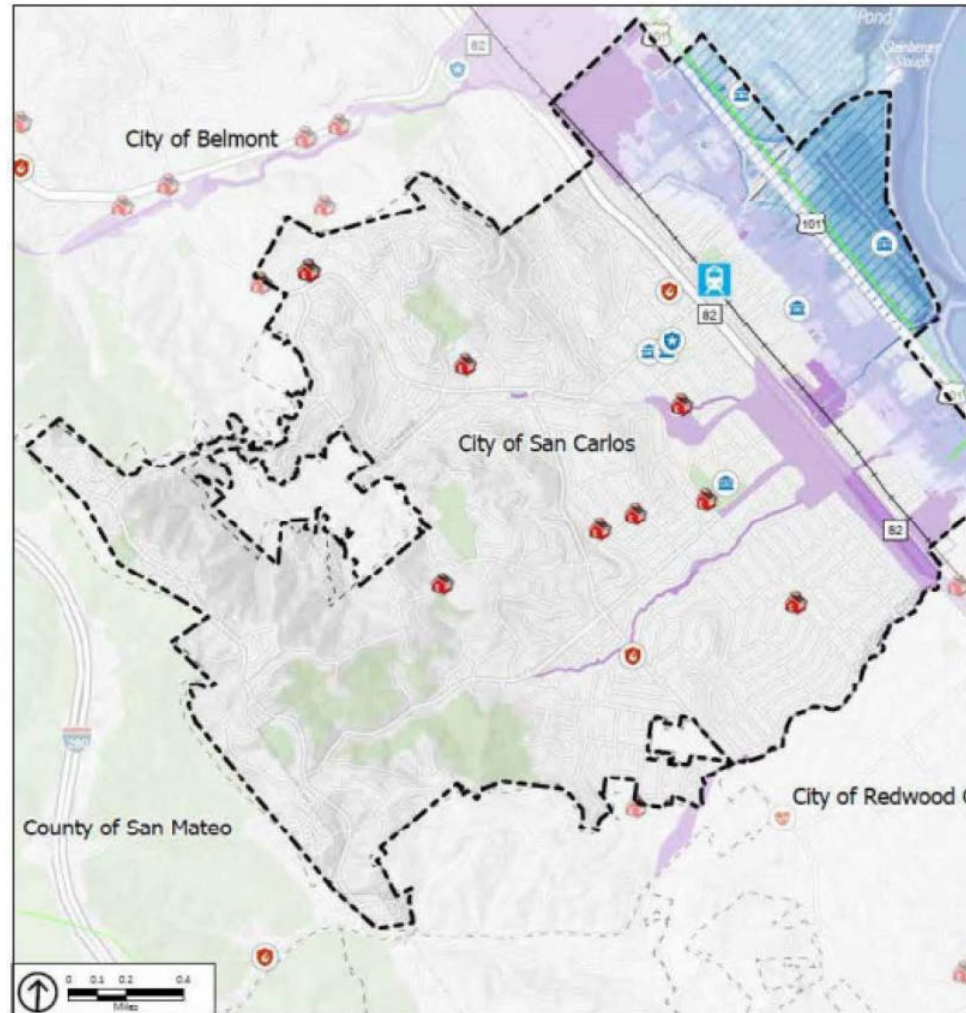
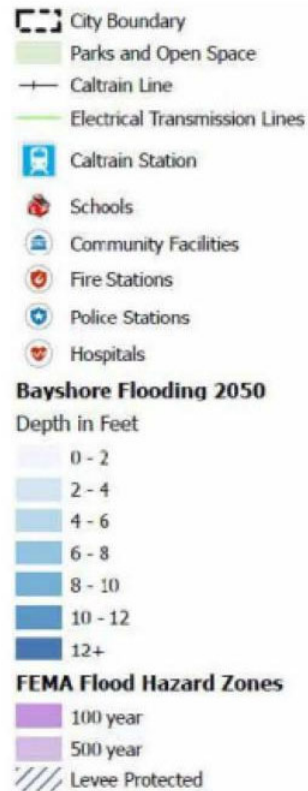
of flooding, as they may live in or near flood hazard areas, lack financial resources to protect their homes, or have difficulty receiving adequate evacuation notices because of language barriers. Persons with limited mobility and those without access to lifelines (persons without access to a car, transit, or communication systems) may have difficulty evacuating prior to a flooding event, and therefore are also highly vulnerable.

Buildings and facilities at risk of damage from sea level rise and increased flooding are shown in Figure 8-17.

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FIGURE 8-15

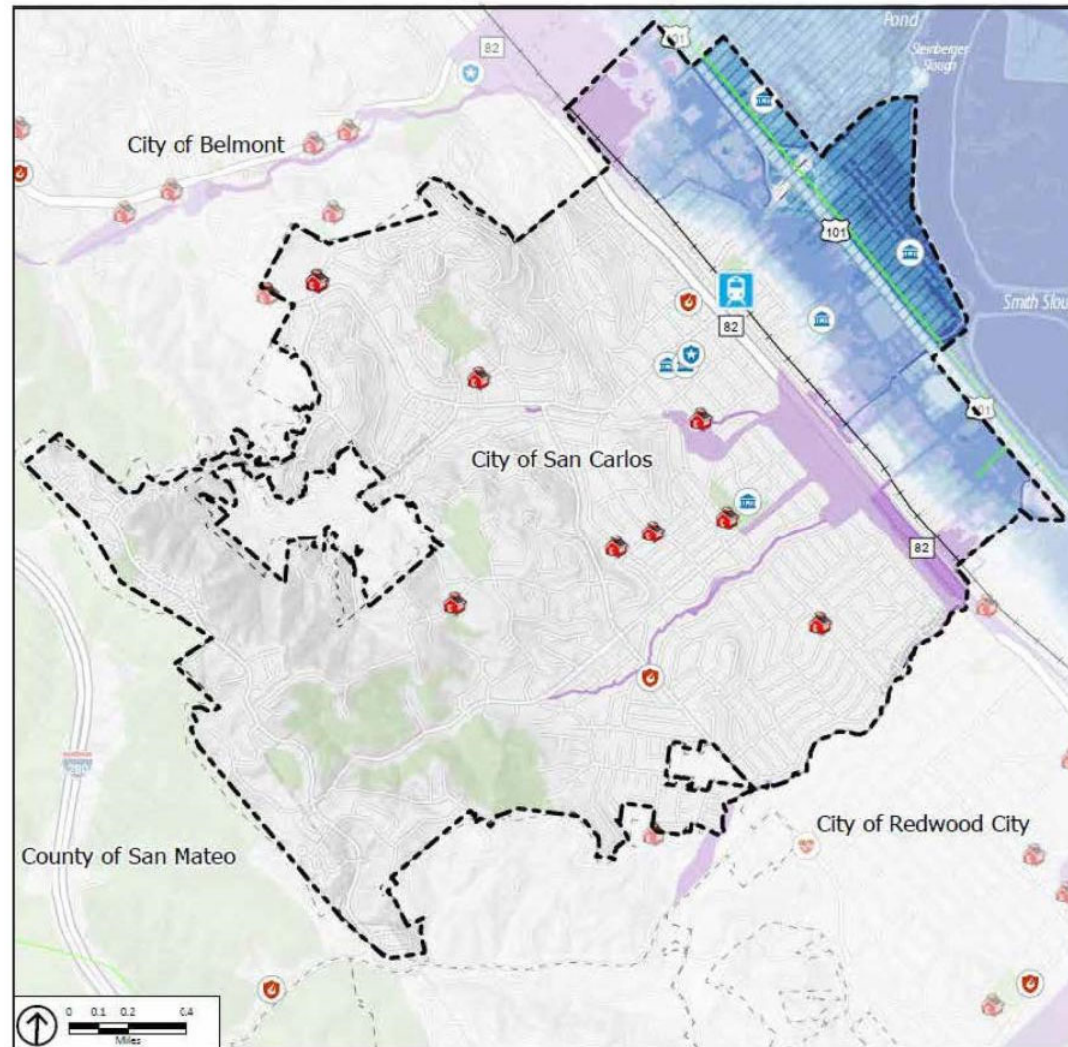
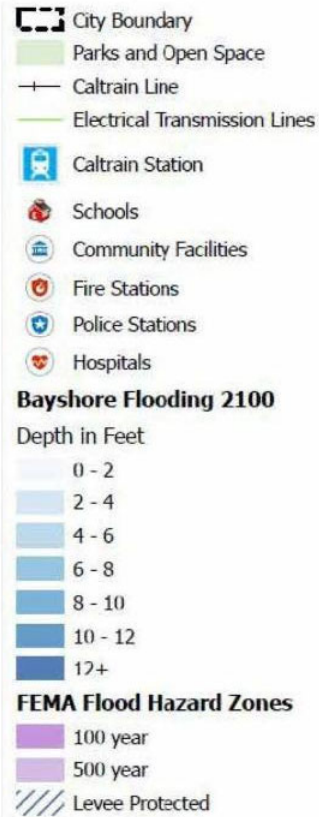
Sea Level Rise
2050



Source: San Francisco Bay Conservation and Development Commission, 2017; Federal Emergency Management Agency, 2018; San Carlos Climate Mitigation and Adaptation Plan (CMAP) (2021)

FIGURE 8-16

Sea Level Rise
2100



Source: San Francisco Bay Conservation and Development Commission, 2017; Federal Emergency Management Agency, 2018;

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FIGURE 8-17

At Risk due to Sea Level Rise

Risks

- 1% Annual Chance (100-year flood)
- 0.2% Annual Chance (500-year flood)
- 24" Sea Level Rise +5-year Storm

Infrastructure

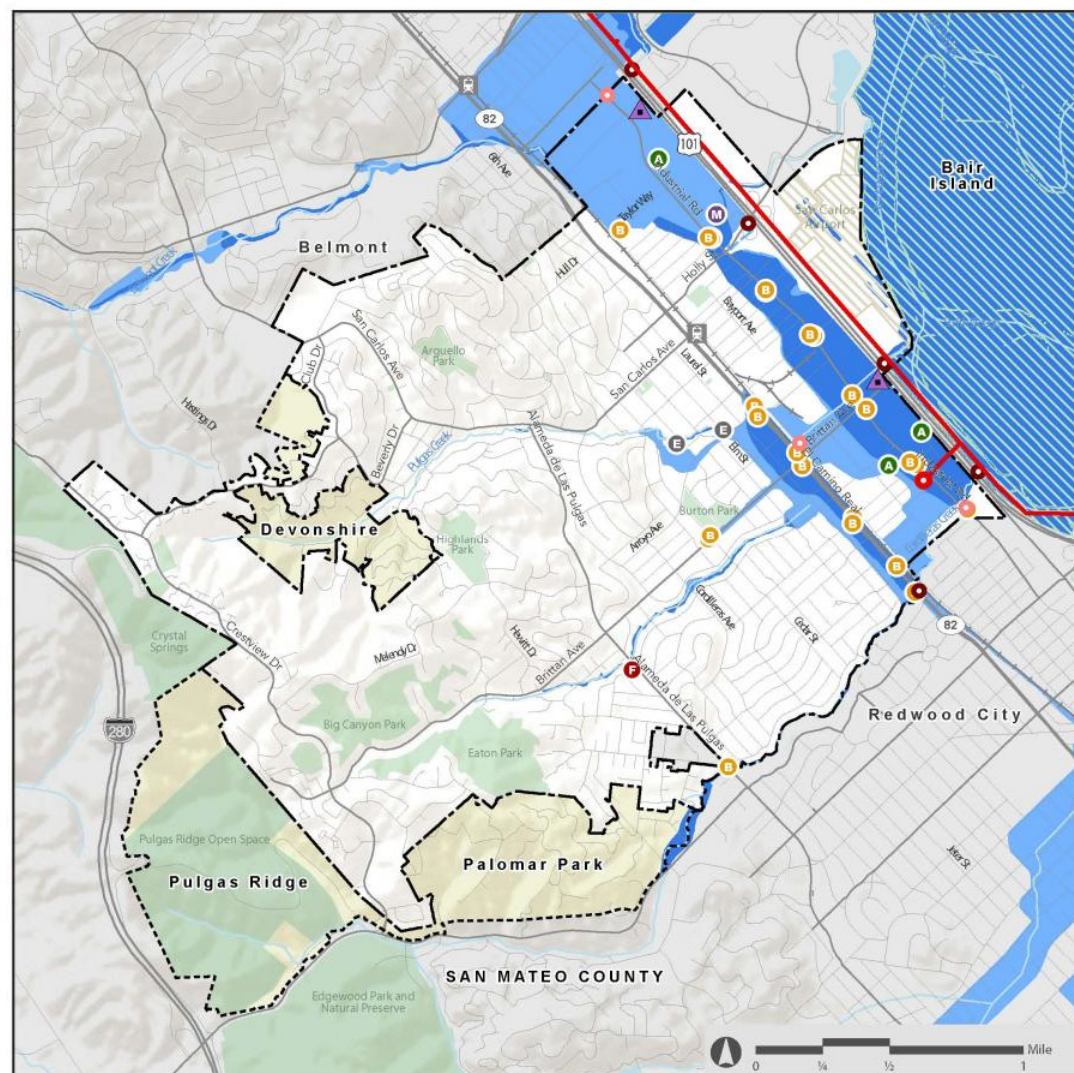
- Railway Stops
- Microwave Tower
- Electrical Substation
- Transmission Line

Transportation Facilities and Infrastructure

- Local Bridges
- Highway Bridges
- Alternative Energy Fueling Stations

At Risk Buildings and Facilities

- Fire Station
- Medical Facility
- Emergency Shelter



Goals, Policies, and Actions



GOAL ESPS-8

A community that is resilient against changing climate conditions.

POLICIES

Policy ESPS-8.1 Ensure that new structures and substantial retrofits are planned and designed to accommodate extreme weather events.

Policy ESPS-8.2 Facilitate retrofitting existing structures to accommodate extreme weather events.

Policy ESPS-8.3 Ensure consistent climate change resilience strategies between City of San Carlos' plans and across department implementation programs; other public agencies; and through local and regional partnerships.

Policy ESPS-8.4 Continuously improve resilience planning and stay up to date on best practices, including outreach efforts, emphasizing outreach to non-English speaking, lower-income, and other vulnerable populations.

Policy ESPS-8.5 Support emergency service providers and critical facilities' operations and adequate

response times should hazard events increase in frequency and severity.

ACTIONS

Action ESPS-8.1 Evaluate and amend, if necessary, City of San Carlos building codes, zoning ordinance, and other development standards to ensure site planning, building design, and construction materials for new development and substantial retrofits accommodate extreme weather events. Regularly review and update the City's codes, zoning ordinance, and development standards to align with best practices.

Action ESPS-8.2 Share information about existing energy efficiency and weatherization programs, including BayREN, San Mateo County Energy Watch, HomeIntel, and CaliforniaFIRST, to encourage private home and business retrofits to reduce energy demand, make buildings safer to shelter in, and make buildings more resilient during power outages.

Action ESPS-8.3 Develop and share a building retrofit guide for extreme heat that includes guidance on:

- Adaptive measures, such as shading, adequate ventilation and green or white roofs.

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- Insulating and improving the air tightness of buildings to increase resilience against extreme cold and heat.
- Using passive cooling and energy efficiency design requirements or allowing manual overrides (e.g., openable windows) when mechanical elements are in place to increase resilience, especially in the event of power outages.

Action ESPS-8.4 Work with providers of existing weatherization programs to identify opportunities for additional funding and other support services that could help provide assistance and resources for economically disadvantaged residents to adapt their properties to climate change hazards.

Action ESPS-8.5 Review and update as necessary the Climate Mitigation and Adaptation Plan and the Safety Element concurrently, in tandem with the Housing Element Update, to increase efficiency and improve implementation.

Action ESPS-8.6 Periodically, review and update the General Plan as necessary to incorporate new or revised climate change resilience strategies.

Action ESPS-8.7 Develop a climate change-specific outreach program to inform community members

how to prepare for, withstand, and recover after climate hazard events. Incorporate methods to overcome language, technological, and other barriers in reaching vulnerable communities.

Action ESPS-8.8 Develop and maintain an emergency notification system (e.g., SMC Alert) for the most vulnerable community members before, during, and after a climate hazard event and assist in their evacuation, if needed. This includes coordination with the San Mateo County OneShoreline program on its early flood warning notification system.

Action ESPS-8.9 Regularly update and supply the latest technical information to emergency service providers and critical facility operators to assist in their planning for and provision of services.

Action ESPS-8.10 Collaborate with communication providers to promote the installation of additional or upgraded facilities, if needed, to reduce the occurrence of coverage gaps and service outages, especially for facilities providing essential services.



GOAL ESPS-9

The City of San Carlos has a sustainable and resilient water supply despite the potential for more frequent and severe drought conditions.

POLICIES

Policy ESPS-9.1 Support Cal Water’s efforts to increase water storage capacity and water supply reliability, including meeting fire flow requirements.

Policy ESPS-9.2 Support and partner with Cal Water’s efforts to achieve water demand reductions of 10 percent below State requirements to reduce future constraints during droughts.

ACTIONS

Action ESPS-9.1 Support Cal Water’s efforts to construct additional water storage tanks within City limits, if needed.

Action ESPS-9.2 Upgrade City waste and wastewater systems to accommodate projected drought-induced changes in water quality and availability and ensure long-term integrity of water supplies.

Action ESPS-9.3 Partner with Cal Water to increase customer participation in water conservation programs to reduce water use throughout San Carlos.

Action ESPS-9.4 Require all new development, reconstruction, and remodel projects to install water saving infrastructure and systems minimizing water use.

Action ESPS-9.5 Require public and private development projects to design sites, buildings, and structures that minimize water use and increase water recycling.

Action ESPS-9.6 Develop a San Carlos’ Recycled Water program to nonresidential users.

Action ESPS-9.7 Consider extending the recycled water pipes from Redwood City into East San Carlos.

Action ESPS-9.8 Determine best methods to use recycled water to irrigate San Carlos public parks, medians, and other publicly owned landscaped areas.

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GOAL ESPS-10

A community that is resilient during and after extreme heat and severe weather events.

POLICIES

Policy ESPS-10.1 Provide San Carlos residents and businesses with information about climate change hazards, extreme heat, and severe weather events. Information should include technical information, preparation guidance, and public service availability.

Policy ESPS-10.2 Ensure the provision of emergency shelter or cooling centers/hubs for the San Carlos community.

Policy ESPS-10.3 The City of San Carlos will take steps to ensure that all residents can access emergency centers.

Policy ESPS-10.4 Improve utility and transportation infrastructure, if needed, to ensure functionality during and following extreme heat and severe weather events, which may bring extreme precipitation and flooding.

ACTIONS

Action ESPS-10.1 Consider establishing resilience cooling centers/hubs where community members can obtain information on how to prepare for climate change hazards and/or receive services (e.g., water, food, bed, charging stations, and clean air) during extreme heat and severe weather events. This includes:

- Identifying public facilities, such as community centers, libraries, and schools where cooling centers and resilience hubs can be co-located to support vulnerable communities;
- Identifying possible partners, including business owners, property owners, religious and civic organizations, emergency service agencies, and others who may be able to contribute privately-owned space to create pop-up cooling centers to cover gaps in coverage of public-owned cooling centers. Update the contact lists annually.

- Setting and publishing standardized temperature or air quality triggers for when cooling centers and resilience hubs will open; and
- Tracking and monitoring cooling center and locations' usage related to extreme heat events, power loss, and public safety power shutoff events; and install back-up power prioritizing solar and batteries.

Action ESPS-10.2 Consider publishing emergency supply lists and other preparation information and distribute to local civic and social organizations, service providers, and via City information outlets.

Action ESPS-10.3 Identify ways for individuals with limited mobility to reach cooling centers and resilience hubs prior to or during hazard events. Work with transportation providers to ensure public transportation is provided during the hazard events.

Action ESPS-10.4 Establish an environmental reverse calling center or continue to participate in the San Mateo County (SMC) ALERT emergency alert system. If participating in the SMC ALERT system, ensure that the system will provide information to all residents, including those who have not registered, and ensure that the alerts include fire, flooding, temperature (excessive cold or

heat), earthquake, and severe weather events. Ensure the SMC ALERT system provides information regarding the locations of emergency shelters, cooling centers, and emergency services. Develop outreach strategies to reach individuals not registered with the SMC ALERT system.

Action ESPS-10.5 Work with responsible agencies to ensure the design and construction of utility infrastructure, including water supply, wastewater, and storm drain lines, and transportation infrastructure, including streets, trails, shared-use paths, and rail lines, can withstand projected increases in extreme precipitation and storm events.

Action ESPS-10.6 Identify and address deficiencies in existing utility and transportation infrastructure that may fail or suffer severe damage during extreme precipitation, flooding, and storm events.



GOAL ESPS-11

A community that is protected against sea level rise and safeguards the natural and built environment from inundation due to rising sea levels

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POLICIES

Policy ESPS-11.1 Coordinate with State, regional, and local agencies, including the City/County Association of Governments of San Mateo County, the Bay Conservation and Development Commission, and the San Mateo County Flood and Sea Level Rise Resiliency District (OneShoreline) on planning for sea level rise and developing response options, including a regionally coordinated sea level rise adaptation plan. Consider participating in partnerships that can provide technical assistance and potential funding for sea level rise resiliency planning.

Policy ESPS-11.2 Continue to work with appropriate local, State, and federal agencies (such as FEMA, San Mateo County OneShoreline Program, City/County Association of Governments (CCAG) of San Mateo County, and San Francisco Bay Conservation and Development Commission (BCDC) to maintain the most recent sea level rise mapping and information and use it as a basis for project review.

Policy ESPS-11.3 Encourage the use of environmentally sensitive sea level rise adaptation strategies

through the recognition of long-term habitat and biodiversity values.

Policy ESPS-11.4 Provide protection to or relocate critical facilities in the sea level rise zone to prevent damage from inundation.

Policy ESPS-11.5 Integrate sea level rise planning into City processes.

Policy ESPS-11.6 Ensure all new development and substantial retrofit projects are planned and designed to accommodate increases in sea level rise.

ACTIONS

Action ESPS-11.1 Consistent with State recommendations and OneShoreline, identify mid-century and end of century sea level rise projections that would be consistently used by the city in planning efforts and to evaluate all private and public development applications to ensure projects in sea level rise inundation zones are protected from inundation over the life of the project. OneShoreline's standard for its shoreline project is to protect against the FEMA 100-year storm, plus six feet of sea level rise.

Action ESPS-11.2 Continue to review and use current and best available sea level rise science and projections and regularly identify natural

resources, development, infrastructure, and communities that are vulnerable to sea level rise impacts. Use this information to continue to develop or adjust planning and adaptation strategies.

Action ESPS-11.3 Seek funding sources and collaborate with local and regional public and private entities that can assist communities and businesses with technical assistance and potential funding for sea level rise resiliency planning. Technical assistance may include supporting business resiliency through preparedness education, trainings, and resources to protect properties from the effects of sea level rise.

Action ESPS-11.4 Identify City staff who will be responsible for leading the City's sea level rise planning efforts, coordinating with outside agencies, and coordinating with City departments on preparing and planning for sea level rise.

Action ESPS-11.5 Cooperate with FEMA in its efforts to incorporate predictions of sea level rise in its Flood Insurance Studies and Flood Insurance Rate Maps (FIRM).

Action ESPS-11.6 Incorporate the most current sea level rise mapping into the City's geographic information system to identify areas at risk of increased flooding from sea level rise.

Action ESPS-11.7 In coordination with OneShoreline, regional planning efforts, and State guidance, sea level rise adaptation strategies should use or restore natural features and ecosystem processes where feasible and appropriate as a preferred approach to the placement of hard shoreline protection. This includes systems and practices that use or mimic natural processes, such as permeable pavements, bioswales, and other engineered systems, such as levees that are combined with restored natural systems, to provide clean water, conserve ecosystem values and functions, and provide a wide array of benefits to people and wildlife.

Action ESPS-11.8 Existing shoreline or creek bank protective devices should be removed when the structure(s) requiring protection are redeveloped, removed, or no longer require a protective device.

Action ESPS-11.9 Incorporate sea level rise in the development of watershed management plans and flood control infrastructure with a focus on nature based solutions.

Action ESPS-11.10 Advocate, with State and federal resource agencies, for new policies and implementation programs that make living shoreline projects more feasible.

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Action ESPS-11.11 Identify critical facilities and City-owned buildings and infrastructure – including roads, trails, parks, and other public access and recreation facilities - in hazard-prone areas and work to site, design, and upgrade these facilities with consideration for hazards from sea level rise and storm surges that may occur over the anticipated life of the development. In cases where facilities cannot be substantially maintained, relocation should be evaluated. Where facilities can be safely sited for the near term, but future impacts are likely, require an adaptive management plan detailing steps for maintenance, retrofitting and/or relocation.

Action ESPS-11.12 Include sea level rise and adaptation planning in other City planning documents. Coordinate future updates of the Safety Element with the Climate Mitigation Action Plan and the City's Hazard Mitigation Action Plan as specified in the San Mateo County Multi-Jurisdictional Local Hazard Mitigation Plan, Volume II.

Action ESPS-11.13 Actively coordinate with San Mateo County and OneShoreline to implement proposed mitigation actions related to sea level rise outlined in the San Mateo County Multi-

Jurisdictional Local Hazard Mitigation Plan (LHMP). Implement the City's Hazard Mitigation Action Plan as specified in the LHMP, Volume II.

Action ESPS-11.14 Regularly review and update the City's municipal code and building code requirements for projects in a sea level rise inundation zone to ensure projects adequately account for sea level projections.

Action ESPS-11.15 Ensure the development application process reflects the City's sea level rise planning requirements.

Action ESPS-11.16 Actively promote public education, research, information dissemination, and mitigation options on flooding hazards to the community including neighborhood associations, realtors, community-based organizations, and property owners in areas subject to increased flooding due to sea level rise.



GOAL ESPS-12

A community protected against rising groundwater levels caused by sea level rise.

POLICIES

Policy ESPS-12.1 Study the effects of rising groundwater on people and the built environment.

Policy ESPS-12.2 Ensure the San Carlos municipal code protects development from rising groundwater levels. This may include measures to protect underground utilities from constant submersion, the construction of building foundations and roadbeds in saturated soils, the protection of underground structures, and the management of groundwater dewatered during construction.

ACTIONS

Action ESPS-12.1 Coordinate with OneShoreline local jurisdictions, regional, and state agencies to study sea level rise's potential impacts on

rising groundwater levels. The study could consider the impacts of rising groundwater levels on:

- Saltwater intrusion into near shore groundwater aquifers
- Overland flooding
- Underground utility infrastructure and underground structures
- Increased soil liquefaction and subsidence risk; and
- Movement or transport of toxic or hazardous materials at old contamination sites

Action ESPS-12.2 Continue to enforce the San Carlos Municipal Code requirements for development in areas of rising groundwater. Regularly update San Carlos' policies and codes to reflect the most recent technical and building/safety studies' findings regarding groundwater levels.

Public Services

Existing Public Services

Background Information

This section addresses schools, police service, fire service and libraries in San Carlos.

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Adult Community and Youth Center

The Adult Community Center (ACC)/Senior Services provides a wide variety of classes, programs, activities, and services to promote healthy lifestyles, lifelong learning, and independence for adults 50 and over. The ACC is also available for private rental. The Youth Center is a recreation facility at Burton Park. Primarily used for youth and teen activities, the Youth Center is also programmed for adult use when not in use by youth. The facility includes a full-size Gymnasium, Game Room, lounge room, Learning Kitchen, Multi-use Studio and computer-equipped Homework Center.

Schools

Two school districts serve San Carlos students, the San Carlos School District and the Sequoia Union High School District (Figure 8-18).

San Carlos School District. The San Carlos School District (SCSD) administers elementary and middle school services within the City of San Carlos. There are four elementary schools, two upper elementary schools, two middle schools and a charter school within the city limit. The schools include:

- Arundel School (K-3)
- Brittan Acres School (K-3)
- Heather School (K-3)
- White Oaks School (K-3)
- Arroyo School (4-5)
- Mariposa School (4-5)
- Central Middle School (6-8)
- Tierra Linda Middle School (6-8)

- San Carlos Charter Learning Center (K-8)

Revenues for public schools are provided from Local Control funding formula, federal and state funds and the remainder from local funding such as parcel tax funds and other monies donated by the San Carlos Education Foundation and PTAs.

Sequoia Union High School District. San Carlos high school students attend schools in Belmont and Redwood City; these schools are under the jurisdiction of the Sequoia Union High School District (SUHSD). Students attend either the Carlmont High School or Sequoia High School. The Sequoia Union High School District serves about 8,000 Midpeninsula students in four comprehensive high schools and one continuation high school, and in other specialized services and programs. Funding for the SUHSD comes from the Revenue Limit funding, federal funds, and from State and local funds.

Private Schools. There are two private schools in San Carlos. St. Charles School is a K-8 Catholic school located at 850 Tamarack Avenue. West Bay High School is a non-profit high school for transitional students. The high school is based on an independent study program with the option of weekly personalized class time.

Adult Education. The City Parks and Recreation Department offers a variety of arts, fitness and sports, music, cooking, language, computer, and gardening classes for adult residents. The San Mateo Community College District also offers adult education courses. The district includes three community colleges: Cañada College in Redwood City, College of San

Mateo in San Mateo and Skyline College in San Bruno. Students can obtain an Associate in Arts or Sciences, participate in vocational programs, or receive a Certificate of Proficiency in a chosen field.

Police

On November 1, 2010, the City of San Carlos began contracting Police Services with the San Mateo County Sheriff's Office. Under the direction of the Chief of Police (a Sheriff's Captain), Police Services consists of 26 employees of the San Mateo County Sheriff's Office and 6 Communications Officers from the San Mateo County Public Safety Communications Office. In addition, the full resources of the San Mateo County Sheriff's Office support all aspects of police operations in San Carlos. San Carlos is one of the safest cities in the Bay Area, with the Police Services preventing and suppressing crime, providing timely and effective services to the community, and coordinating important community outreach activities to enhance safety and security. The Sheriff's Office service areas are shown in Figure 8-19.

Fire

The San Carlos/Redwood City Fire Department provides fire and emergency response services to the cities of San Carlos and Redwood City, the unincorporated portion of the Harbor Industrial Area and unincorporated portions within San Carlos. The San Carlos and Redwood City Fire Department is responsible for fire response, advanced life support (ALS) and paramedic response and hazardous material response for San Carlos. In addition, the Fire Department is also responsible for other services such as plan checks, fire prevention and fire hydrant testing. The transportation component of ALS services

is contracted out to American Medical Response (AMR) through the County of San Mateo.

As shown in Figure 8-20, there are two fire stations within the city. Fire Station 13, located on Laurel Street, was built in 1995. A new fire station was constructed to replace Fire Station #16, located on Alameda de las Pulgas, in 2023. Together, these two fire stations provide emergency response services to San Carlos residents.

Library

The San Carlos branch of the San Mateo County library system is located at 610 Elm Street. In addition to book circulation, the library offers child, adult, and family programming and also has computer work stations that are available for public use. The library also has conference rooms that may be reserved. Funding for the library comes from the County Library Joint Powers Authority, which is comprised of the cities of Atherton, Belmont, Brisbane, East Palo Alto, Foster City, Half Moon Bay, Millbrae, Pacifica, Portola Valley, San Carlos, and Woodside, as well as unincorporated areas of the County of San Mateo. San Mateo County provides staffing and materials, and the individual cities are responsible for the buildings and maintenance.

Childcare Facilities

There are 24 registered childcare facilities in San Carlos, and 12 family childcare homes. These childcare facilities offer services for a range of ages starting with infants and continuing through grade school.

Community Building Activities

Numerous civic organizations sponsor events that help to build community in San Carlos. Some of these organizations and events are described below.

Sister Cities. San Carlos currently has two sister cities: Okotoks, Canada; and Metepec, Mexico. The purpose of a sister city relationship is to encourage a global perspective among the people, institutions and businesses of San Carlos and to create a forum for fellowship between San Carlos residents and the residents of sister cities.

Week of the Family. The city celebrates the annual Week of the Family during the first week of January. Hundreds of families take part in a number of free activities to celebrate and strengthen the values of a family centered community. The goals of the Week of the Family are to strengthen family relationships, provide families with tools that help families function, promote family life, educate families on the roles and responsibilities of family members and honor and pay tribute to families in San Carlos.

Non-Profits and Volunteerism. San Carlos residents support community in a broad array of associations, community groups, service clubs, faith based organizations, neighborhood associations and through other means. This community support and volunteerism significantly enhances the City's sense of community.

Community Theater. There are several community theater activities to promote local involvement in the arts. The Kiwanis

Show and Chicken's Ball are Bi-annual events that are developed, created and cast by local community members for local fundraising charters. The San Carlos Children's Theater conducts classes and workshops throughout the year, with local youth participating as actors, crew members and creative teams. The Children's Theater performs four or five major productions at local school sites each year.

Summer Concert Series. Summer Concert Series is held in Burton Park each summer. These concerts help to build community by providing a family-friendly environment where San Carlos residents can congregate and enjoy music in a public setting. Local businesses and interest groups can demonstrate their civic commitment by sponsoring concerts.

San Carlos Together. San Carlos Together is a citizens' group dedicated to building community by bringing people who live and work in San Carlos together to socialize, share ideas and volunteer their services for a better community.

San Carlos Villagers. The San Carlos Villagers were formed in April 1949 to preserve the history of San Carlos. The goal was to collect documents, photos and memorabilia that reflected San Carlos' rich background and safeguard it for the future. The City Council appointed the Villagers as docents for the Museum of San Carlos in 1981, after the San Carlos Lions Club gifted the renovated Museum Building to the city. The Villagers compile, collect and assemble letters, photographs, personal articles, and relics of historical interest detailing the city's heritage.

Hometown Days. Hometown Days was originally sponsored by a group of dedicated volunteers to promote a sense of community spirit in San Carlos. The City of San Carlos took on even operations and management in 2022. This event brings the community together and provides an opportunity for schools, service clubs, local businesses, and other organizations to connect with residents. Hometown Days typically includes a parade through downtown San Carlos followed by a festival, pancake breakfast and fun run at Burton Park, where families enjoy games, food, local arts and crafts, and entertainment.

Art and Wine Faire. The City of San Carlos hosts the Art and Wine Faire one weekend every October. Held in the central core of downtown Laurel Street and San Carlos Avenue, the event features juried art and crafts by Pacific Fine Arts Association. San Carlos residents, business owners, vendors, and sponsors participate in the two-day event, typically attended by more than 75,000 people. A variety of gourmet food, beverages, family activities and music adds to the festive atmosphere.

Sunday Farmers' Market. The San Carlos Farmers' Market occurs weekly on Laurel Street in Downtown San Carlos. In 2021 the City took on the operations and management of the market and features a variety of produce, flowers and specialty food vendors set up on Laurel Street, which is closed to traffic. Visitors also can enjoy live music during the Farmers' Market.

Goblin Walk. The City hosted the first Goblin Walk in 2009 to provide a safe location for young children to trick-or-treat down Laurel Street. A success from its launch, the Goblin Walk turned into a community-wide event where San Carlans and neighboring community members would dress in costume and parade up and down Laurel Street. Businesses generously hand

out candy to the children while residents dine on outdoor tables to witness the parade of costumes. Goblin Walk occurs on the last Friday of October.

Night of Holiday Lights. Night of Holiday Lights evolved from the City's annual tree lighting ceremony to a downtown event extravaganza. More than 5,000 community members stroll downtown listening to festive carolers, watch the engaging holiday stage show and wait for snow to fall on Laurel Street. Located on the 600 & 700 blocks of Laurel Street, there are craft booths, carnival rides and holiday entertainment. Many residents dine and shop downtown during extended holiday hours.

Movies in the Park. Warm summer nights are best when spent with friends and family, and Movies in the Park give residents the perfect way to gather in a casual setting for a movie under the stars. Attendees bring picnic blankets and snacks, then settle in at Burton Park's Flanagan Field to wait for the evening's film to begin at sundown.

Block Party. What better way to gather with neighbors than by hosting a community block party? The San Carlos Block Party brings the feel of a neighborhood get-together downtown. San Carlans pick up takeout from their favorite downtown restaurants, dine al fresco at tables along Laurel Street, and listen to music while playing lawn games and sipping beer and wine served by the Parks & Recreation Foundation of San Carlos.

Community Pride Event. In celebration of the city's commitment to unity and diversity, San Carlos residents fill Burton Park to listen to music and hear from speakers during the Pride in the

8 ENVIRONMENTAL SAFETY AND PUBLIC SERVICES ELEMENT



Park event in June. LGBTQ+ vendors and inclusive community organizations host informational booths, and attendees play lawn games and contribute to communal art projects during this afternoon event.

FIGURE 8-18

Elementary School Districts

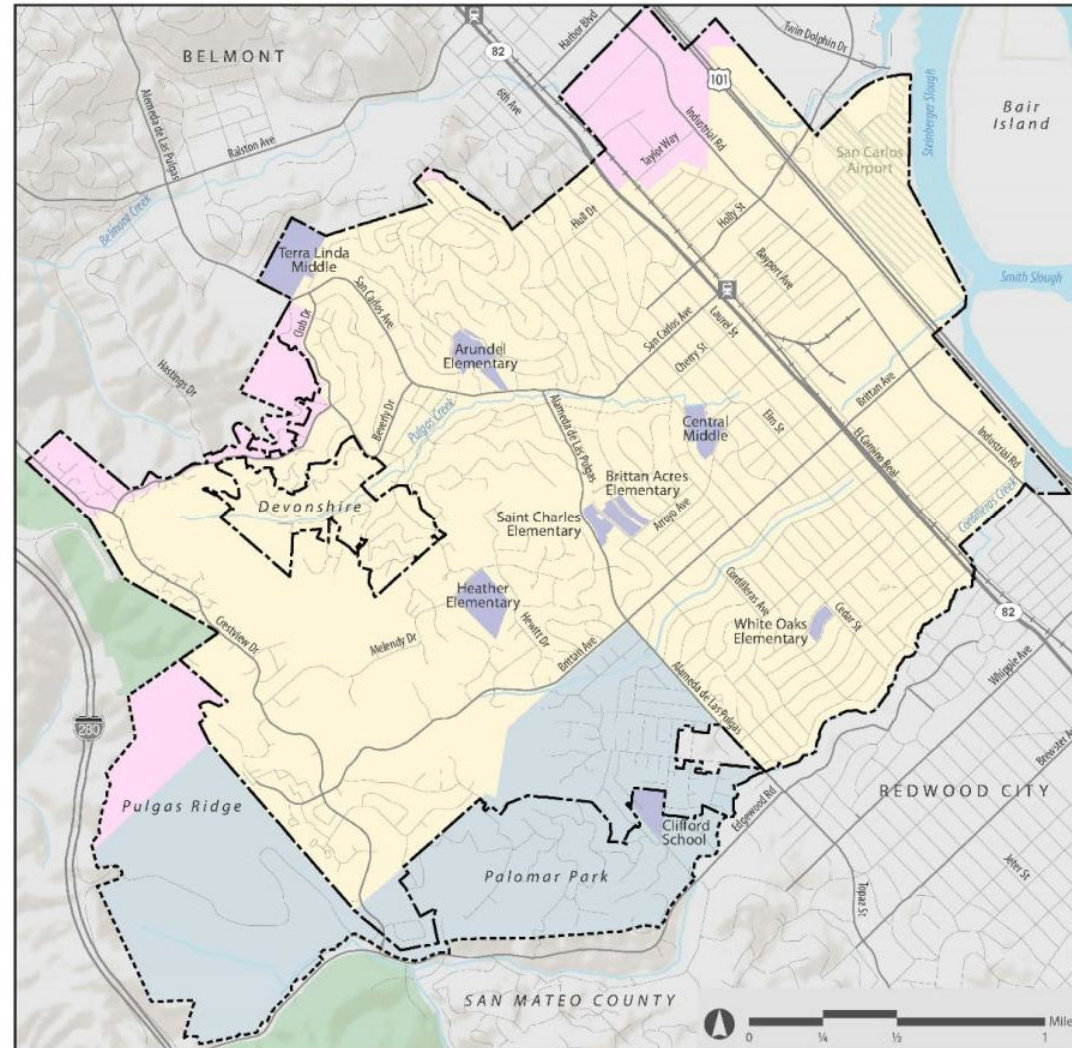
Elementary School Districts

- Belmont-Redwood Shores
- Redwood City
- San Carlos
- Schools (K-8)

Base Map Features

- City of San Carlos Boundary
- Sphere of Influence
- Major Streets
- Streets
- Caltrain Railroad and Stations
- Surrounding Jurisdictions
- Parks and Open Space
- Waterbodies
- San Carlos Airport

August 2020
Sources: FEMA, 2016; United States Census Bureau, 2019; City of San Carlos, County of San Mateo, Urban Footprint, 2020.



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FIGURE 8-19

Sheriff Station Service Areas

Sheriff Service Areas

- Within One-Mile Driving Distance
- Within Two-Mile Driving Distance
- Sheriff Station

Base Map Features

- City of San Carlos Boundary
- Sphere of Influence
- Major Streets
- Streets
- Caltrain Railroad and Stations
- Surrounding Jurisdictions
- Parks and Open Space
- Waterbodies
- San Carlos Airport

August 2020
Sources: United States Census Bureau, 2019;
City of San Carlos, County of San Mateo, Urban Footprint, 2020.

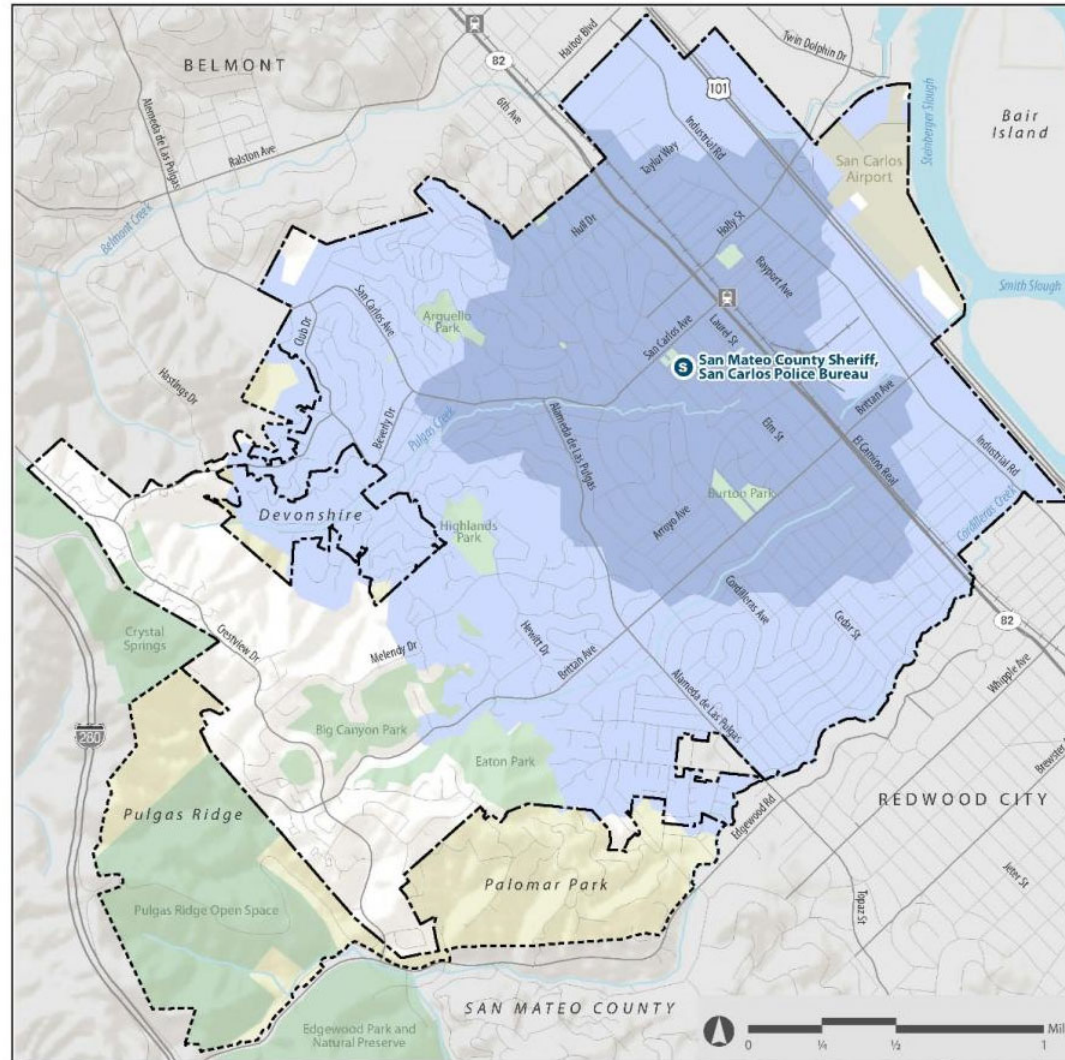
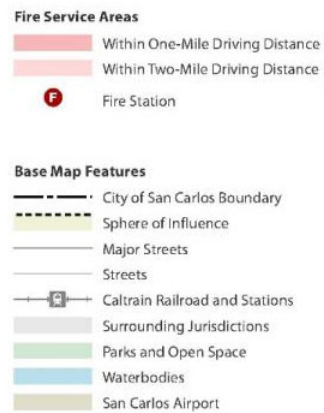
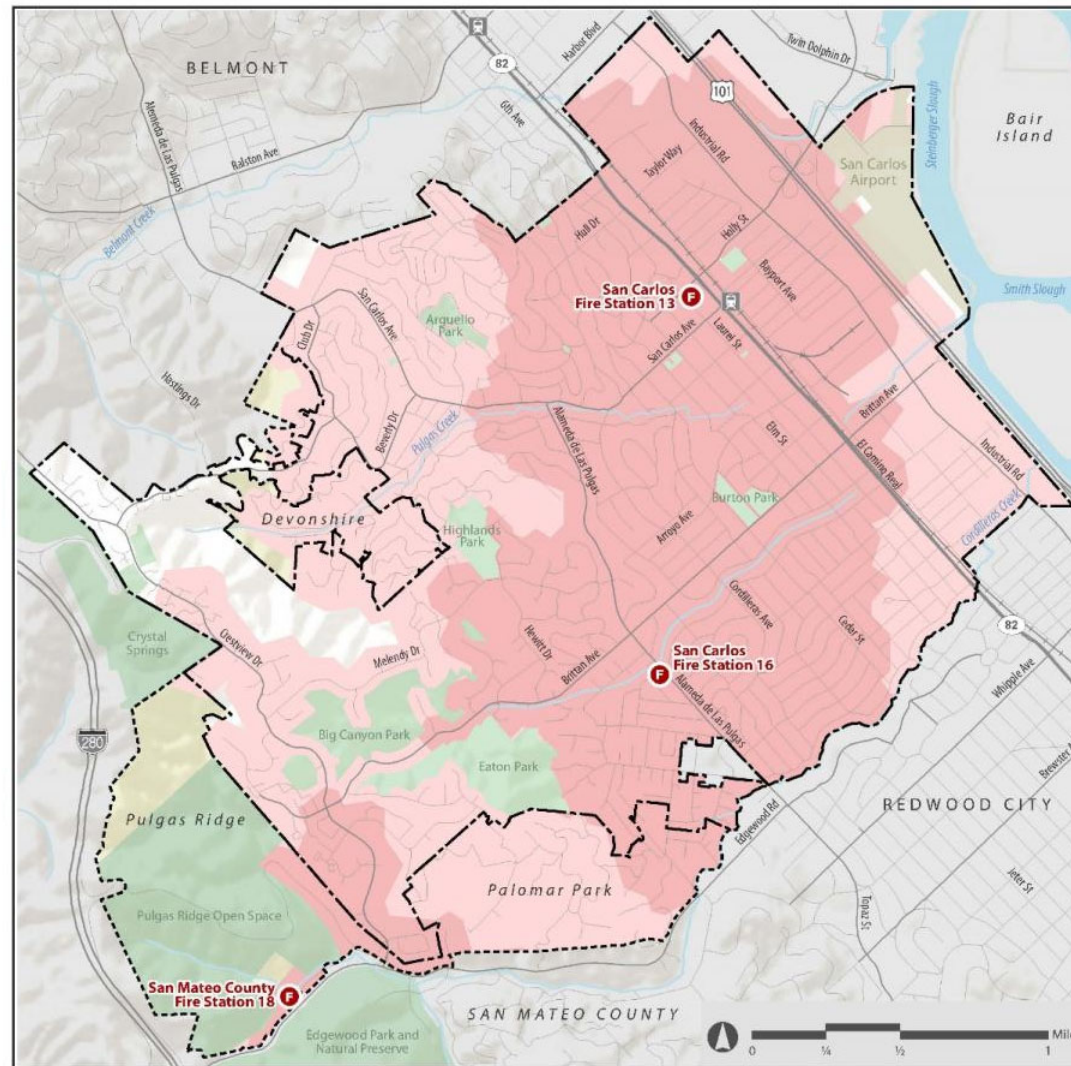


FIGURE 8-20

Fire Station Service Areas



August 2020
 Sources: United States Census Bureau, 2019.
 City of San Carlos, County of San Mateo, Urban Footprint, 2020.



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Goals, Policies, and Actions



GOAL ESPS-13

Ensure adequate public services and high-quality design of public facilities to make San Carlos a safe, enjoyable, and quality community in which to live, work and shop.

POLICIES

Policy ESPS-13.1 Provide efficient and timely processing of development review and building permit applications, while maintaining quality standards in accordance with City Ordinances. Look for solutions to problems, be responsive to community concerns, promote positive communications at all levels of review and provide analysis and advice to decisionmakers to help them make informed decisions. Encourage early public input.

Policy ESPS-13.2 Establish and regularly monitor levels of service of San Carlos' public facilities and services.

Policy ESPS-13.3 Adopt public improvement standards to achieve high-quality public facilities. Excellence in the appearance of public facilities shall be of utmost importance and consideration. New development and redevelopment shall be designed with complementary public and private amenities. Streetlights, benches, accessory structures, public art and public and private spaces shall be designed in a complementary fashion. Landscaping shall be an important and significant design component of development and landscaping of areas visible from public streets and nearby residences shall be part of the initial development. The City's design guidelines and standards shall establish the objectives, techniques and programs to implement the location, amount and type of landscaping material appropriate to these objectives. Encourage native plants and trees.

Policy ESPS-13.4 Work with all special districts, including the school districts, to ensure that development within the city is coordinated with provision of services.

Policy ESPS-13.5 Maintain neighborhood schools wherever possible. Evaluate City potential to acquire any surplus school sites. If redeveloped, sites

shall be used for purposes which are compatible with the surrounding neighborhood and consistent with the General Plan Land Use Map and shall strive to retain school recreation facilities for neighborhood use.

Policy ESPS-13.6 Maintain existing library facilities as an important activity center within the community.

Policy ESPS-13.7 Continue to locate City administrative functions in the Elm Street Civic Center area and consider joining other service providers for administrative functions when presented.

Policy ESPS-13.8 Approve rezoning and development permits only when adequate services are available, or when a program to provide services has been approved by the applicable district and the City.

Policy ESPS-13.9 Ensure that adequate public services and facilities are planned and constructed to accommodate the population of the city.

Policy ESPS-13.10 Require existing overhead utility lines be placed underground in new development and redevelopment through a phased program of conversion in existing overhead areas.

Policy ESPS-13.11 Retain a City Corporation Yard.

Policy ESPS-13.12 Support the dedication and preservation of rights-of-way for future transit service along the rail corridor.

ACTIONS

Action ESPS-13.1 Define acceptable service levels for San Carlos' public facilities and services.

Action ESPS-13.2 Annually update the City's long-range Capital Improvements Program. The Program shall continue to address all City facilities that are included in the development impact fee program, facilities needed to solve existing deficiencies and to accommodate projected growth and shall include a funding and phasing program for provision of facilities in not less than five-year increments through the end of the updated planning period. Encourage all special districts serving San Carlos to do the same.

Action ESPS-13.3 Create and implement a planting and beautification program for public facilities.

Action ESPS-13.4 Provide online access, as well as a hard copy on reserve in the San Carlos Library, of the complete General Plan and all its amendments.

8 ENVIRONMENTAL SAFETY AND PUBLIC SERVICES ELEMENT



Action ESPS-13.5 Establish a network of equitably located community resilience hubs at community facilities to make San Carlos a safe, enjoyable, equitable, and quality community in which to live work and shop.



GOAL ESPS-14

Provide educational opportunities for all ages.

POLICIES

Policy ESPS-14.1 Support schools and educational institutions as a key component of San Carlos' identity.

Policy ESPS-14.2 Support the availability of all types of educational opportunities, both formal and informal, for residents of all ages and abilities.

Policy ESPS-14.3 Ensure that all residents have access to library services including access to computers and other technology.

Policy ESPS-14.4 Evaluate through the California Environmental Quality Act (CEQA) process how new development impacts schools, as the quality of San Carlos schools is a primary asset of the city.

Policy ESPS-14.5 Participate in the long-range planning activities with San Carlos Unified School District and Sequoia Union High School District.

ACTIONS

Action ESPS-14.1 Study establishing additional educational uses in the Civic Center area.

Action ESPS-14.2 Advocate for reestablishing a high school within San Carlos for San Carlos residents.

Action ESPS-14.3 Maintain and enhance City Council collaboration with the San Carlos School District and other appropriate educational entities.



GOAL ESPS-15

Establish San Carlos' position as a community cultural and arts center.

POLICIES

Policy ESPS-15.1 Provide diverse, high-quality experiences for cultural activities and the arts.

Policy ESPS-15.2 Provide functionally well-designed, conveniently-located facilities for cultural activities and the arts, both indoors and outdoors.

Policy ESPS-15.3 Encourage galleries and artists' studios to locate in San Carlos.

Policy ESPS-15.4 Continue and enhance alternative funding strategies for providing additional cultural and arts facilities including naming rights and sponsorships, grants and endowments.

ACTIONS

Action ESPS-15.1 Provide for temporary and permanent public art displays and cultural programs

on City properties and facilities, in accordance with a Public Art Master Plan.

Action ESPS-15.2 Encourage voluntary installation of easily viewable public art on private properties in accordance with a Public Art Master Plan.

Action ESPS-15.3 Encourage art fairs and other cultural events Downtown and elsewhere in the community.

Action ESPS-15.4 Prepare a feasibility study, including program needs and site identification, for a performing arts center.

Action ESPS-15.5 Work collaboratively with local schools and the community to build on the availability of performing arts facilities at local schools.

Action ESPS-15.6 Identify sites for and study the feasibility of outdoor performing arts spaces.

Action ESPS-15.7 Maximize the accessibility of all arts facilities with convenient access, drop off, pickup, parking, and delivery.

Action ESPS-15.8 Look for opportunities to develop a work center for artists. Study alternatives for providing gallery spaces capable of hosting exhibitions and display space for artists.

8 ENVIRONMENTAL SAFETY AND PUBLIC SERVICES ELEMENT



GOAL ESPS-16

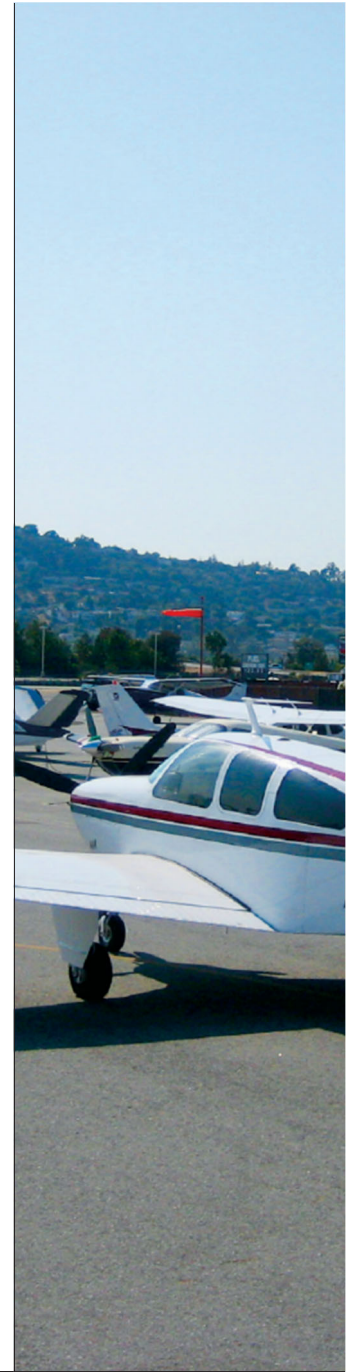
Promote Community Building activities in San Carlos.

POLICIES

Policy ESPS-16.1 Continue to support and recognize the role of community groups and organizations.

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Noise Element 9



9 NOISE ELEMENT

The purpose of the Noise Element is to identify sources of noise in San Carlos and to define strategies for reducing the negative impact of noise to the community. Noise is an environmental pollutant that can threaten the quality of life and human health by causing annoyance or disrupting sleep and everyday activities. With the presence of significant noise sources in San Carlos, including Highway 101, El Camino Real, the Caltrain corridor and the San Carlos Airport, reducing the negative impact of unwanted and excessive noise is an important aspect of maintaining the city's high quality of life and community character.

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	Noise Control Ordinance 1086
	Land Use Compatibility
	Existing Noise
	Future Noise
239	Goals, Policies and Actions



Introduction

State law requires that the General Plan include a Noise Element, which is to be prepared according to guidelines adopted by the California Office of Noise Control (ONC). In accordance with State law requirements, this Noise Element provides a systematic approach to limiting community exposure to noise, including the following components:

- Quantitative analysis, based on noise measurements and modeling of major existing and future noise sources in the community, including both mobile and stationary sources;
- Mapping of generalized noise level contours to be used as a basis for land use decision-making; and

- Goals, policies and actions to address community exposure to existing and projected noise sources.

The Noise Element describes compatible land uses for varying noise levels, provides background information on existing sources of noise and projects noise conditions in 2030.

The Noise Element is divided into two basic sections:

- Background Information
- Goals, Policies and Actions

Background Information

The following provides a discussion of existing and future noise sources within San Carlos, as well as how these noise sources affect the various land use types in the city. Major noise sources that will be addressed include transportation sources such as traffic, public transit and airport and industrial operations.

The Noise Element should provide a systematic approach to the measurement and modeling of noise; the establishment of noise standards; the control of major noise sources; and community planning for the

regulation of noise. This Noise Element provides baseline information on the existing noise environment based on noise measurements taken throughout the city and identifies noise-sensitive uses in San Carlos.

According to State Government Code and the State Office of Noise Control Guidelines, the following major noise sources should be considered in the preparation of a Noise Element:

- Highways and freeways.
- Primary arterials and major local streets.
- Railroad operations.
- Aircraft and airport operations.
- Local industrial facilities.
- Other stationary sources.

The Noise Element establishes uniformity between City policy and programs undertaken to control and abate environmental noise. The California Government Code and State Office of Noise Control Guidelines require that certain major noise sources and areas containing noise-sensitive land uses be identified and quantified by preparing generalized noise exposure contours

for current and projected levels of activity within the community. The noise exposure information developed for the Noise Element is incorporated into the General Plan to serve as a basis for achieving land use compatibility with respect to noise. Noise exposure information is also used to provide baseline levels and noise source identification for use in the development and enforcement of a local noise control ordinance and for ensuring compliance with the State's noise insulation standards, which are discussed in more detail below.

Noise Terminology

The discussion of noise requires the use of a number of technical terms. Some of the key noise-related terms used in this Element include:

- **Decibel (dB).** A decibel is a unit of measurement which indicates the relative amplitude of a sound. The zero on the decibel scale is based on the lowest sound level that the healthy, unimpaired human ear can detect. Sound levels in decibels are calculated on a logarithmic basis. Each 10 decibel increase in sound level is perceived as approximately a doubling of loudness over a fairly wide range of intensities.
- **A-weighted sound level (dBA).** The A-weighted sound level is the most common method to characterize sound in California. This scale gives greater weight to the frequencies of sound to which the human ear is most sensitive. All sound levels in this chapter are A-weighted, unless reported otherwise.
- **Energy-equivalent sound/noise level (L_{eq}).** L_{eq} describes the average level that has the same acoustical energy as the summation of all the time-varying events. This descriptor is useful because sound levels can vary markedly over a short period of time. The most common averaging period for L_{eq} is hourly, but it can be of any duration.
- **Day/night average sound level (L_{dn}).** Since the sensitivity to noise increases during the evening and at night, 24-hour descriptors have been developed that incorporate artificial noise penalties added to quiet-time noise events. L_{dn} is a measure of the cumulative noise exposure in a community, with a 10 dB addition to nocturnal (10:00 p.m. to 7:00 a.m.) noise levels.

This is the measurement that the City of San Carlos normally uses in noise evaluations and analysis.

- **Community Noise Equivalent Level (CNEL).** CNEL is the energy average of the A-weighted sound levels occurring during a 24-hour period, with 10 dB added to the A-weighted sound levels occurring between 10:00 p.m. and 7:00 a.m. and 5 dB added to the A-weighted sound levels occurring between 7:00 p.m. and 10:00 p.m.

Noise Control Ordinance 1086

The City of San Carlos' noise ordinance is intended to protect residents and visitors to San Carlos from unreasonable noise associated with machines, persons, or devices. It specifies that unreasonable noise is that which exceeds 10 dBA above local ambient noise levels. Noise levels are measured at a distance of 49 feet from the property lines of either public or private property. Some noise sources are exempt from these regulations, including transportation, construction, home workshops or gardening tools and solid waste pick-up. Violations of the specified noise levels are monitored by the San Carlos Police Department and are considered misdemeanors.

Land Use Compatibility

Land uses deemed as noise sensitive by the State of California include schools, hospitals, rest homes, long-term care and mental care facilities. Many jurisdictions consider residential uses particularly noise sensitive because families and individuals expect to use time in the home for rest and relaxation and noise can interfere with these activities. Some variability in standards for noise sensitivity may apply to different densities of residential development; single-family uses are frequently considered the most sensitive. Jurisdictions may identify other uses as noise sensitive such as churches, libraries, day care centers and parks.

Land uses that are relatively insensitive to noise include some office, commercial and retail developments. There is a range of insensitive noise receptors which generate significant noise levels or where human occupancy is typically low. Examples of insensitive uses include industrial and manufacturing uses, utilities, agriculture, vacant land, parking lots and transit terminals.

To assist with evaluating the compatibility of land uses with various noise levels, the California General Plan

Guidelines compare the compatibility of noise levels with various land uses. Figure 9-1 summarizes the Guidelines' recommendations.

Research determined how much noise is acceptable for different land uses. In the mid-1970s, the Environmental Protection Agency concluded that a noise level of 55 dBA L_{dn} (including a 5 dBA margin of safety) would have "no impact" on a residence. The State of California built upon this information and established guidelines suggesting 60 dBA L_{dn} as an upper limit for acceptable environmental noise in a residential setting. Certain land uses are sensitive to noise outdoors and exterior noise thresholds are appropriate.

Other land uses are only sensitive to noise indoors (e.g. professional office spaces, high-density housing in a downtown area).

One of the requirements of a Noise Element is to facilitate the noise insulation standards contained in the State Building Code that are applicable to new multi-family housing development. Where the exterior noise exposure level is 60 dBA L_{dn} or greater, the residential building must attenuate the interior noise level to 45

dBA L_{dn} or less in residential living areas. The intent of the Noise and Land Use Compatibility Guidelines is to achieve an interior noise level of 45 dBA L_{dn} or less in all new residential housing. Three acceptability categories are identified: normally acceptable, conditionally acceptable and unacceptable. In the normally acceptable category, a use would be acceptable without additional mitigation measures. In the conditionally acceptable category, the use would be acceptable with the application of mitigation measures. In the unacceptable category, the use may be unacceptable even after the application of available mitigation measures.

Existing Noise

A noise study was completed as part of the General Plan update and included noise measurements along major roadways. The major noise sources in San Carlos are vehicular traffic on major roadways, railroad operations along the Caltrain corridor and the San Carlos Airport. Table 9-2 details the current traffic noise levels for major roadways in San Carlos.

FIGURE 9-1 LAND USE COMPATIBILITY FOR COMMUNITY NOISE ENVIRONMENT

Land Use Category	Exterior Noise Exposure (L_{dn})					
	55	60	65	70	75	80
Single-Family Residential						
Multi-Family Residential, Hotels and Motels		a				
Outdoor Sports and Recreation, Neighborhood Parks and Playgrounds						
Schools, Libraries, Museums, Hospitals, Personal Care, Meeting Halls, Churches						
Office Buildings, Business, Commercial and Professional						
Auditoriums, Concert Halls, Amphitheaters						

^a See Policy NOI-1.5.



NORMALLY ACCEPTABLE. Specified land use is satisfactory, based upon the assumption that any buildings involved are of normal conventional construction, without any special insulation requirements.



CONDITIONALLY ACCEPTABLE. Specified land use may be permitted only after detailed analysis of the noise reduction requirements and needed noise insulation features included in the design.



UNACCEPTABLE. New construction or development should generally not be undertaken because mitigation is usually not feasible to comply with noise element policies.

TABLE 9-1 NON-TRANSPORTATION NOISE STANDARDS

Land Use Receiving the Noise	Hourly Noise-Level Descriptor	Exterior Noise-Level Standard In Any Hour (dBA)		Interior Noise-Level Standard In Any Hour (dBA)	
		Daytime (7am-10pm)	Nighttime (10pm-7am)	Daytime (7am-10pm)	Nighttime (10pm-7am)
Residential	L _{eq}	55	45	40	30
	L _{max}	70	60	55	45
Medical, convalescent	L _{eq}	55	45	45	35
	L _{max}	70	60	55	45
Theater, auditorium	L _{eq}	--	--	35	35
	L _{max}	--	--	50	50
Church, meeting hall	L _{eq}	55	--	40	40
	L _{max}	--	--	55	55
School, library, museum	L _{eq}	55	--	40	--
	L _{max}	--	--	55	--

Notes:

1. The Residential standards apply to all residentially zoned properties.
2. Each of the noise levels specified above shall be lowered by 5 dBA for tonal noises characterized by a whine, screech, or hum, noises consisting primarily of speech or music, or recurring impulsive noises.
3. In situations where the existing noise level exceeds the noise levels indicated in the above table, any new noise source must include mitigation that reduces the noise level of the noise source to the existing level.
4. The exterior noise standards are measured at any point on the receiving property where there is, or could be in the future, frequent human use and quiet would be beneficial.
5. These standards do not apply to temporary sources such as construction activities.

TABLE 9-2 2009 VEHICULAR TRAFFIC NOISE ON MAJOR ROADWAYS

Major Roadway	Segment	L_{dn} at 75 ft, dBA* 2009 Existing
El Camino Real	North of Holly St	69
	San Carlos Ave to Brittan Ave	68
	Brittan Ave to Howard Ave	69
	South of Howard Ave	69
Holly Street	West of El Camino Real	62
	Old County Rd to Industrial Way	65
	East of Industrial Way	68
Old County Road	North of Holly St	63
	Holly St to Brittan Ave	64
	Brittan Ave to Howard Ave	64
	South of Holly St	62
Industrial Road	North of Holly St.	61
	Holly St to Brittan Ave	66
	South of Brittan Ave	66

Major Roadway	Segment	L_{dn} at 75 ft, dBA* 2009 Existing
San Carlos Avenue	North of Club Dr	63
	Club to Alameda de Las Pulgas	65
	Alameda de Las Pulgas to El Camino Real	62
	East of El Camino Real	59
	West of Alameda de Las Pulgas	61
Brittan Avenue	Alameda de Las Pulgas to El Camino Real	62
	Old County Rd to Industrial Way	64
	East of Industrial Way	64
Howard Avenue	West of El Camino Real	59
	East of Old County Rd	60
Dartmouth Avenue	East of San Carlos Ave	59
Club Drive	West of San Carlos Ave	57
Alameda de Las Pulgas	San Carlos Ave to Brittan Ave	62
	South of Brittan Ave	63

* Noise levels are given at a distance of 75 feet from the center of the roadway.

Vehicular

Traffic continues to be the most significant source of noise within San Carlos. Highway 101, as the dominant traffic noise source and El Camino Real (State Route 82), a major contributor to the noise environment, exhibit noise levels from 70 to 77 dBA L_{dn} at land uses immediately joining these roadways. Interstate 280 carries high volumes of traffic but does not affect existing developed areas within the city. Major arterials, including Holly Street, San Carlos Avenue, Alameda de Las Pulgas, Brittan Avenue, Old Country Road and Edgewood Road are significant noise sources and exhibit noise levels from 65 to 70 dBA L_{dn} at nearby land uses. Neighborhood streets such as Crest-view Drive and Devonshire Boulevard exhibit noise levels from 60 to 65 dBA L_{dn} at nearby receivers. Residential neighborhoods insulated from through traffic have noise levels less than 60 dBA L_{dn} which is an acceptable level.

Railroad

The Caltrain railway roughly parallels Highway 101 and follows El Camino Real in the northeastern portion of the city. The San Carlos Caltrain station is near the intersection of El Camino Real and San Carlos Avenue.

In 2009, there were 35 scheduled weekday northbound stops per day and 35 scheduled weekday southbound stops per day at the San Carlos Caltrain Station. Day-night average noise levels are estimated to range from 67 to 69 dBA L_{dn} at a distance of 100 feet from the tracks. Train warning whistles can generate maximum noise levels of approximately 105 dBA at 100 feet and would be audible throughout the community. Trains are required to blow their horns at railroad stations, so L_{dn} noise levels in the station area will be substantially higher unless the City of San Carlos and Caltrain obtain Quiet Zone designations.

Trains are also a source of perceptible ground borne vibration within approximately 50 to 100 feet of the tracks. Ground-borne vibration occurs in areas adjacent to fixed rail lines when railroad trains pass through San Carlos. Ground vibration levels along the railroad corridors are proportional to the speed and weight of the trains as well as the condition of the tracks, train engine and car wheels. Vibration measurements conducted in San Carlos indicate that the acceptable vibration levels occur about 65 feet from the center of the near railroad track for the maximum measured train vibration level and about 55 feet from the center of the near railroad track for typical train passbys.

Airport

Aircraft using San Carlos Airport intermittently contribute to ambient noise levels in the city. This general aviation airport is located in the northeast portion of the City of San Carlos east of Highway 101. The airport averages about 425 aircraft operations per day. Approximately 49 percent of aircraft operations are local general aviation, 48 percent are transient general aviation, 2 percent are air taxi operations and less than 1 percent are military operations. San Mateo County and the San Carlos Airport Pilot's Association promote noise reduction practices by airport users, including avoiding flying over sensitive areas. Existing noise contours for the San Carlos Airport are shown on Figure 9-2 (Revised October, 2024). Noise compatibility is regulated by the City/County Association of Governments of San Mateo County (C/CAG) in its role as the Airport Land Use Commission for the County's airports. The Comprehensive Airport Land Use Compatibility Plan for the Environs of San Carlos Airport (ALUCP)~~San Mateo County Comprehensive Airport/Land Use Plan (CLUP)~~, adopted by C/CAG in 1996~~2015~~, is a State-mandated document that promotes airport/land use compatibility. Table IV-24-3 of the CLUP-ALUCP includes noise compatibility standards.

Aircraft noise in California is described in terms of the CNEL. The noise levels measured in CNEL are approximately equivalent to noise measured with the day/night average noise level (L_{dn}) but include an additional 5 dB weighting factor for the evening hours (7:00 p.m. to 10:00 p.m.).



Jet aircraft to and from the Mineta, San José and San Francisco International Airports generate intermittent noise when passing over the City of San Carlos. Noise generated by these over-flights, although audible and noticeable in quiet areas above other ambient noise sources, do not contribute to daily average noise levels in the city.

Non-Vehicular

There are no known stationary noise sources that make a significant contribution to the community's noise environment. The majority of commercial and industrial land uses within San Carlos are located east-northeast of El Camino Real and may be minor contributors to

FIGURE 9-2

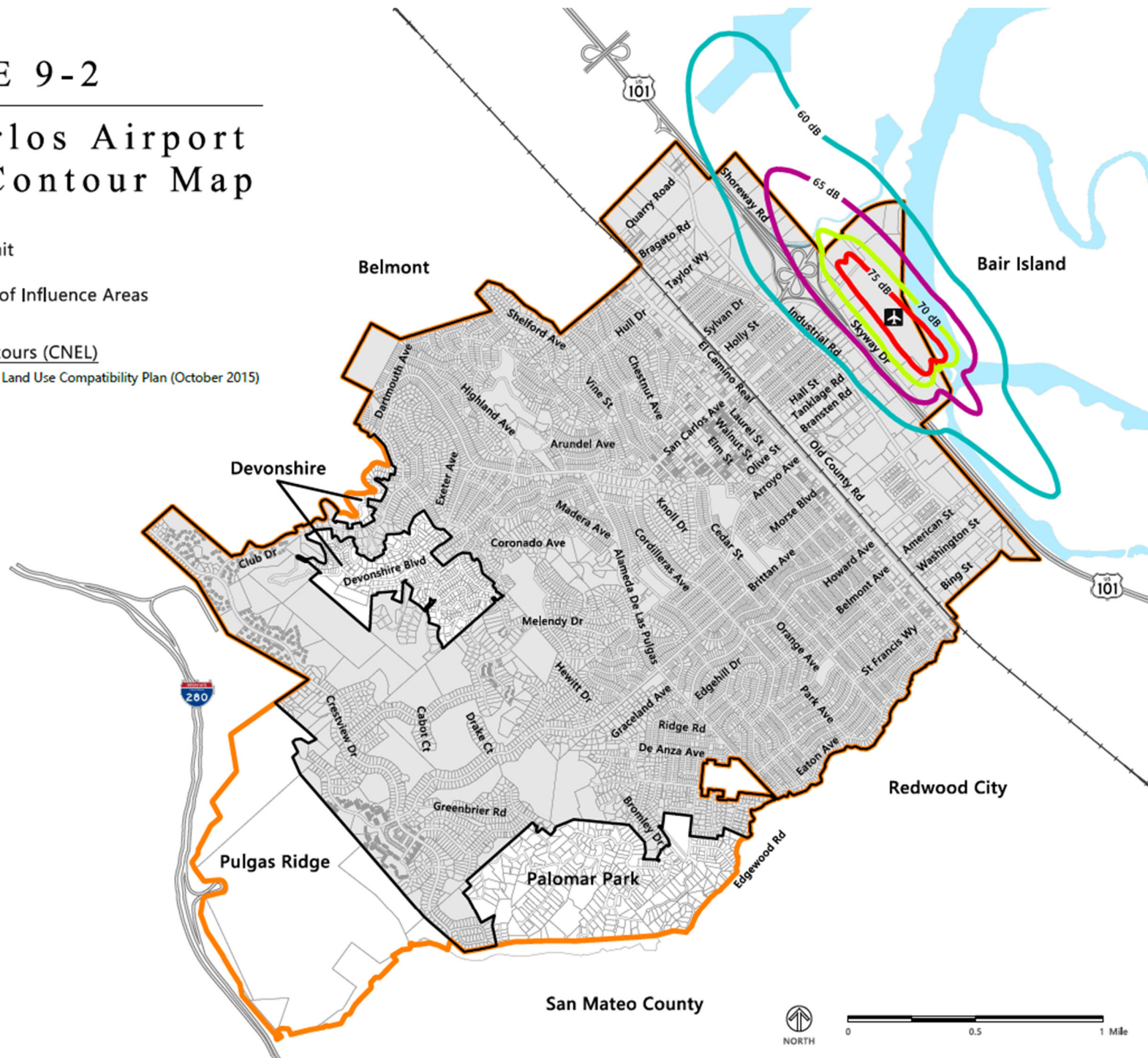
San Carlos Airport Noise Contour Map

-  City Limit
-  Sphere of Influence Areas

Airport Noise Contours (CNEL)

Source: San Carlos Airport Land Use Compatibility Plan (October 2015)

-  60 dB
-  65 dB
-  70 dB
-  75 dB



the noise environment, while Highway 101, major arterial roadways and the railroad contribute significantly.

Future Noise

The noise environment in San Carlos is not expected to change as a result of the implementation of the General Plan. Vehicular traffic noise, the dominant source throughout the city, is not anticipated to change substantially along local streets or major through routes, including Highway 101 and El Camino Real. Aircraft noise in the region and sources of non-transportation noise are similarly not anticipated to increase in the community. Figure 9-3 shows the projected noise contours at buildout of the General Plan.

Currently, California is considering construction of a high-speed train system that would link the San Francisco Bay Area and Los Angeles. The plan would be for high-speed trains to operate through San Carlos on or near the existing Caltrain right-of-way. Numerous at-grade crossings along the Caltrain corridor would need to be eliminated in order to facilitate the high speed trains, which would reduce noise from the sounding of railroad train horns. The high-speed trains would likely use electric power cars, which would

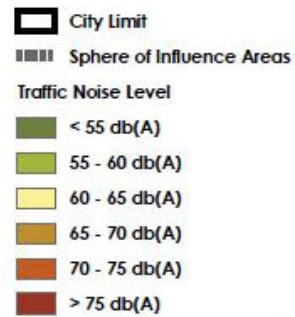
eliminate the low frequency rumble associated with diesel-powered locomotives. However, overall high-speed train noise levels may increase over conventional trains due to the aerodynamic effects. Vibration of the ground caused by the passby of high-speed trains is expected to be similar to that caused by conventional steel wheels/steel rail trains. As information becomes available, it should be incorporated into the Noise Element and utilized accordingly in noise/ vibration and land use planning.



View of Downtown from San Carlos train station

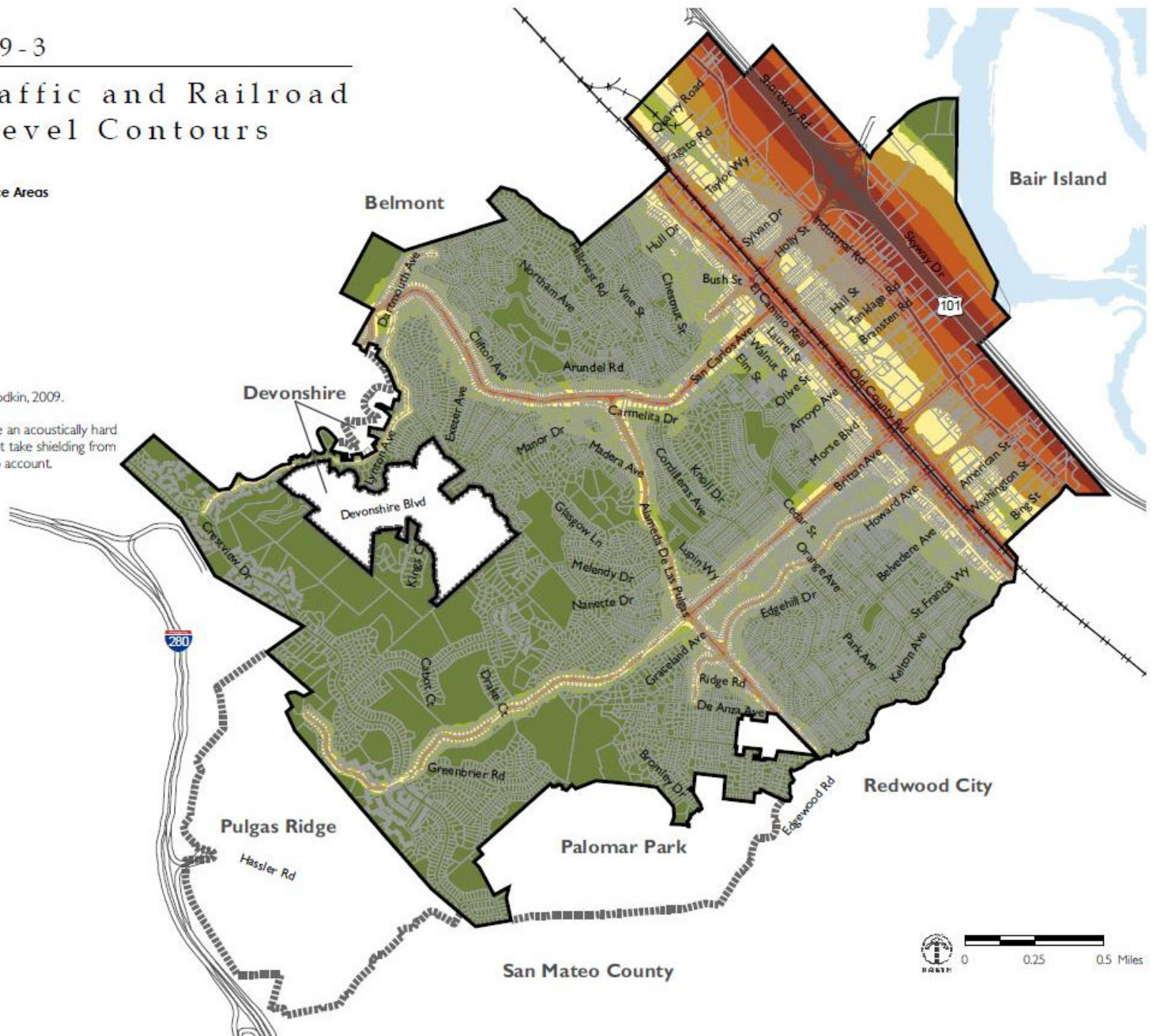
FIGURE 9-3

2030 Traffic and Railroad Noise Level Contours



Source: Illingworth and Rodkin, 2009.

Note: Calculations assume an acoustically hard ground surface and do not take shielding from structures or barriers into account.





Guiding Principles

The Guiding Principles are a set of key objectives that articulate San Carlos' core values relating to noise. The following Guiding Principle establishes a framework for the basic intent of this Element and is a broad statement of overall community value relating to noise in San Carlos:

- Maintain a community with a noise environment that supports a high quality of life.



Caltrain platform

Goals, Policies and Actions



GOAL NOI-1

Encourage compatible noise environments for new development and control sources of excessive noise citywide.

POLICIES

POLICY NOI-1.1 Use the Noise and Land Compatibility Standards shown in Figure 9-1, the noise level performance standards in Table 9-1 and the projected future noise contours for the General Plan shown in Figure 9-3 and detailed in Table 9-2, as a guide for future planning and development decisions.

POLICY NOI-1.2 Minimize noise impacts on noise-sensitive land uses. Noise-sensitive land uses include residential uses, retirement homes, hotel/motels, schools, libraries, community centers, places of

Public assembly, daycare facilities, churches and hospitals.

POLICY NOI-1.3 Limit noise impacts on noise-sensitive uses to noise level standards as indicated in Table 9-1.

POLICY NOI-1.4 Require a detailed acoustic report in all cases where noise-sensitive land uses are proposed in areas exposed to exterior noise levels of 60 CNEL L_{dn} or greater. If recommended in the report, mitigation measures shall be required as conditions of project approval.

POLICY NOI-1.5 New development of noise-sensitive land uses proposed in noise-impacted areas shall incorporate effective mitigation measures into the project design to reduce exterior and interior noise levels to the following acceptable levels:

a. For new single-family residential development, maintain a standard of 60 L_{dn} (day/night average noise level) for exterior noise in private use areas.

- b. For new multi-family residential development maintain a standard of 65 L_{dn} in community outdoor recreation areas. Noise standards are not applied to private decks and balconies and shall be considered on a case-by-case basis.
- c. Interior noise levels shall not exceed 45 L_{dn} in all new residential units (single- and multi-family). Development sites exposed to noise levels exceeding 60 L_{dn} shall be analyzed following protocols in Appendix Chapter 12, Section 1208, A, Sound Transmission Control, 2001 Building Code Chapter 12, Appendix Section 1207.11.2 of the 2007 California Building Code (or the latest revision).
- d. Where new residential units (single- and multi-family) would be exposed to intermittent noise levels generated during train operations, maximum railroad noise levels in-

9 NOISE ELEMENT



side homes shall not exceed 50 dBA in bedrooms or 55 dBA in other occupied spaces. These single event limits are only applicable where there are normally four or more train operations per day.

POLICY NOI-1.6 Where noise mitigation measures are required to achieve the noise level standards, the emphasis of such measures shall be placed upon site planning and project design. The use of noise barriers shall be considered after practical design-related noise mitigation measures have been integrated into the project.

POLICY NOI-1.7 The City shall seek to reduce impacts from ground-borne vibration associated with rail operations by requiring that vibration-sensitive buildings (e.g. residences) are sited at least 100 feet from the centerline of the railroad tracks whenever feasible. The development of vibration-sensitive buildings within 100 feet from the centerline of

the rail-road tracks would require a study demonstrating that ground borne vibration issues associated with rail operations have been adequately addressed (i.e. through building siting, foundation design and construction techniques).

POLICY NOI-1.8 ~~During all phases of construction activity, reasonable noise reduction measures shall be utilized to minimize the exposure of neighboring properties to excessive noise levels.~~

~~a. All construction activities shall comply with the City's noise ordinance. Development projects that require an acoustical study shall incorporate reasonable noise and vibration reduction measures and best management practices to minimize excessive noise levels during all phases of construction activity. Reduction measures and best management practices may include, but are not limited to, noise control techniques for construction tools and equipment,~~

9 NOISE ELEMENT



construction site management techniques, temporary noise barriers, noise monitoring and reporting, and/or construction traffic management.

POLICY NOI-1.9 Minimize potential transportation-related noise through the use of setbacks, street circulation design, coordination of routing and other traffic control measures and the construction of noise barriers and consider use of “quiet” pavement surfaces when resurfacing roadways.

POLICY NOI-1.10 Ensure that mixed-use development projects are designed to minimize noise impacts on residential units.

POLICY NOI-1.11 Ensure that proposed noise sensitive land uses include appropriate mitigation to reduce noise impacts from air- craft operations at San Carlos Airport. Work with the San Carlos Airport Pilots Association and San Mateo County to continue to refine and implement the Airport’s noise abatement procedures.

POLICY NOI-1.12 Ensure consistency with the noise compatibility policies and criteria contained in the ~~San Carlos Airport~~

~~Land Use~~

Plan Comprehensive Airport Land Use Compatibility Plan for the Environs of San Carlos Airport.

POLICY NOI-1.13

Require a noise analysis for new residential uses located within the 55 CNEL impact area of the San Carlos Airport. If recommended in the report, mitigation measures shall be required as conditions of project approval.

POLICY NOI-1.14

The Federal Transit Administration vibration impact criteria and assessment methods shall be used to evaluate the compatibility of train vibration with proposed land uses adjoining the UPRR (Caltrain) corridor. Site specific vibration studies shall be completed for vibration-sensitive uses proposed within 100 feet of active railroad tracks.

ACTIONS

ACTION NOI-1.1 Establish a noise abatement protocol for existing sensitive land uses located in areas anticipated to experience significant noise increases with the implementation of the General Plan. Cumulative traffic noise impacts on existing noise-sensitive uses could be reduced through the inclusion of exterior and/or interior sound-reduction measures such as set-backs, noise barriers, forced-air mechanical ventilation and sound rated window construction. The City should research sources of funding for these actions.

ACTION NOI-1.2 Revise the City's Noise Ordinance to be consistent with this Element.

ACTION NOI-1.3 Require residents of new mixed-use developments to be informed of potential noise from refuse collection and other activities typically associated with commercial activity.

ACTION NOI-1.4 Require the evaluation of mitigation measures for projects that would cause the following criteria to be exceeded or would cause a significant adverse community response:

- a. Cause the L_{dn} at noise-sensitive uses to increase by 3 dB or more and exceed the "normally acceptable" level.
- b. Cause the L_{dn} at noise-sensitive uses to increase 5 dB or more and remain "normally acceptable."
- c. Cause noise levels to exceed the limits in Table 9-1.

ACTION NOI-1.5 Enforce Section 27007 of the California Motor Vehicle Code that prohibits amplified sound that can be heard 50 or more feet from a vehicle.

ACTION NOI-1.6 Enforce Section 27150 of the California Motor Vehicle Code that addresses excessive exhaust noise.

9

NOISE ELEMENT



ACTION NOI-1.7 Update and review procedures for dealing with noise complaints in the community.

ACTION NOI-1.8 Evaluate the necessity of requesting Caltrain to establish a Quiet Zone designation for San Carlos.

General Plan Preparers

10



10 GENERAL PLAN PREPARERS



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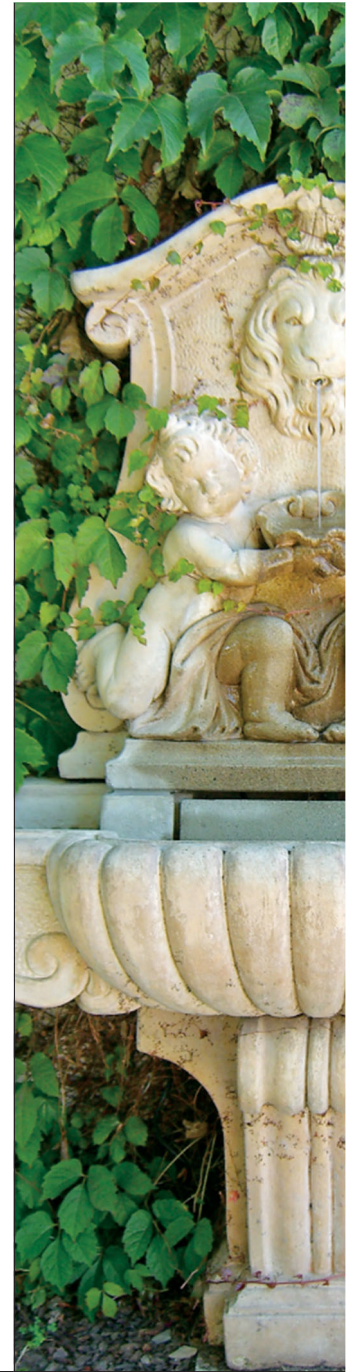
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Appendices



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A P P E N D I X A

H A Z A R D O U S M A T E R I A L S I T E S

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SITES WITH ACTIVE ENVIRONMENTAL CONTAMINATION IN SAN CARLOS

Site Name	Address	Database Listing(s)	Affected Media
Stewart Alsop	115 Dale Avenue	LUST, Cortese, HAZNET, San Mateo County BI	S/GW
Claremont High School	1400 Alameda de Las Pulgas	LUST	Uk
Shell Oil	500 El Camino Real	LUST	S/GW
San Carlos Tire and Car Clinic	260 El Camino Real	LUST, CA FID UST, SWEEPS UST, San Mateo County BI	S/GW
Auto Pride Car Wash	195 El Camino Real	LUST, RCRA-SQG, FINDS, HAZNET, Cortese, CA FID UST, San Mateo Co. BI, SWEEPS UST	GW
The Lighthouse	734 El Camino Real	LUST, SWEEPS UST	S/GW/SV
Unocal #293	90 El Camino Real	LUST, HAZNET, Cortese, HIST UST, SWEEPS UST	S/GW/SV
Garden Supply	803 Old County Road	LUST	S/GW
RMC-Reed Roofing	789 Old County Road	LUST, San Mateo BI	Uk
J. Wing Partners	939 Laurel Street	LUST, SLIC, HAZNET, Cortese	S/GW
Nielsen's Automotive, Inc.	888 El Camino Real	LUST, RCRA-SQG, FINDS, HAZNET, Cortese, San Mateo Co. BI, HIST UST, SWEEPS UST	S/GW
Carlos Cleaners	1000 Laurel Street	LUST, HAZNET, SLIC, San Mateo Co. BI, Drycleaners	Uk
Peninsula Laboratories	601 Taylor Way	LUST, SLIC, San Mateo Co. BI	S/GW
RMC Lonestar	1026 Bransten Road	LUST	GW
Stop N' Go	980 El Camino Real	LUST, Cortese	S/GW/SV
Carey Property	580 Bragato Road	LUST	S/GW

SITES WITH ACTIVE ENVIRONMENTAL CONTAMINATION IN SAN CARLOS

Site Name	Address	Database Listing(s)	Affected Media
Norman & Elaine Strom	1008 Bransten Road	LUST, HAZNET, San Mateo Co. BI	Closure Pending
BP Oil #11201	906 Holly Street	LUST San Mateo Co. BI	GW
Bragato Paving	535 Bragato Road	LUST, HAZNET, San Mateo Co. BI	GW
B&H Technical Ceramics	306 Industrial Boulevard	LUST, Cortese	GW
Teigal Family Trust	495 Bragato Road	LUST	S/GW
Delta Star	270 Industrial Road	LUST, SLIC, HAZNET, Cortese, San Mateo Co. BI, EMI	Uk
Shell Oil Co.	1098 El Camino Real	LUST, RCRA-SQG, Cortese, San Mateo Co. BI, SWEEPS UST	S/GW
Matagrano, Inc.	610 Quarry Road	LUST, HAZNET	S/GW/SV
Olympian San Carlos	200 Industrial Boulevard	LUST, San Mateo Co. BI	S/GW
Liquid Carbonic Specialty Gas	767 Industrial Boulevard	LUST, CA WDS	Uk
BFI Waste Systems	225 Shoreway Road	LUST	GW
City of San Carlos	1113 Industrial Road	LUST, HAZNET, Cortese	GW
State Plumbing Supply	1000 American Street	LUST, Cortese, San Mateo Co. BI	GW
Beco Inc.	620 Airport Drive	LUST, HAZNET, San Mateo Co. BI, CA WDS, SWEEPS UST	Closure received
Eaton Cleaners and Dyers	1752-4 Laurel Street	LUST, SLIC	S/GW/SV
Goodyear #1693	290 El Camino Real	SLIC	S/GW

SITES WITH ACTIVE ENVIRONMENTAL CONTAMINATION IN SAN CARLOS

Site Name	Address	Database Listing(s)	Affected Media
G N Renn, Inc.	833 Old County Road	SLIC, FINDS, EMI	Uk
Kelly More Paint Co.	919 Old Country Road	SLIC, SWEEPS UST, HIST UST	Uk
Peninsula Laboratories, Inc.	901 Taylor Way	SLIC, LUST, San Mateo Co. BI	S/GW
Circuits Facility	641 Quarry Road	SLIC, San Mateo Co. BI.	Uk
Kelly More Paint Co.	1015 Commercial Street	SLIC, RCRA-SQG, FINDS, HAZNET, CERC-NFRAP, HIST UST, FTTS, CA WDS, SWEEPS UST, HIST FTTS, San Mateo Co. BI	Uk
Tiegel Manufacturing Co.	495 Bragato Road	SLIC, San Mateo Co. BI	S/GW
Spencer Kellogg Industries	952 Bransten Road	SLIC	GW
301 Industrial Way	301 Industrial Way	SLIC, HAZNET, EMI	S
Liquid Carbonic Corp	767 Industrial Road	SLIC, HAZNET, Cortese, San Mateo Co. BI	GW
Litton Electron Devices	960 Industrial Boulevard	SLIC, CHMIRS, CA WDS	GW
Appert Facility Harris Corp	850 Bransten Road	SLIC, HIST UST	Uk
Home Depot	1000 Howard Street	SLIC	S

A P P E N D I X B

GLOSSARY AND ACRONYMS

.....

This glossary explains the technical terms used in the City of San Carlos General Plan. Definitions come from several sources, including existing San Carlos codes, the California Office of Planning and Research and the American Planning Association Glossary of Zoning, Development and Planning Terms.

Glossary

Acreage, Gross

The land area that exists prior to any dedications for public use, health and safety purposes.

Acreage, Net

The portion of a site that can actually be built upon, which is the area remaining after dedication of ultimate rights-of-way for:

- Exterior boundary streets.
- Flood ways.
- Public parks and other open space developed to meet minimum standards required by City ordinance.
- Rights-of-way may not be counted as net acreage.

Action

An action is a program, implementation measure, procedure, or technique intended to help to achieve a specified goal. (See “Goal”)

Adverse Impact

A negative consequence for the physical, social, or economic environment resulting from an action or project.

Appropriate

An act, condition, or state that is considered suitable.

Archaeological Resource

Material evidence of past human activity found below the surface of the ground or water, portions of which may be visible above the surface.

Arterials

Major thoroughfares intended to serve as the major routes of travel within the city. Arterials are typically

larger roadways designed to gather traffic from the collector system and provide major connections between regional destinations, highway and freeway systems.

Bicycle Path (Class I facility)

A paved route not on a street or roadway and expressly reserved for bicycles traversing an otherwise unpaved area. Bicycle paths may parallel roads but typically are separated from them by landscaping.

Bicycle Lane (Class II facility)

A corridor expressly reserved for bicycles, existing on a street or roadway in addition to any lanes for use by motorized vehicles.

Bicycle Route (Class III facility)

A facility shared with motorists and identified only by signs, a bicycle route has no pavement markings or lane stripes.

Bikeways

A term that encompasses bicycle lanes, bicycle paths and bicycle routes.

Best management practices

Management practices (such as nutrient management) or structural practices (such as terraces) designed to reduce the quantities of pollutants -- such as sediment, nitrogen, phosphorus and animal wastes -- that are washed by rain and snow melt from farms.

CalVeg

A classification system of ecological subregions used by the U.S. Forest Service.

Capital Improvements Program

A Capital Improvements Program (CIP) is administered by a City. A CIP schedules permanent improvements, usually for a minimum of five years in the future, to fit the projected fiscal capability of the local jurisdiction. The program generally is reviewed annually for conformance to and consistency with the General Plan.

California Environmental Quality Act (CEQA)

The California Environmental Quality Act (California Public Resources Code section 21000 et seq.) was passed in 1970, shortly after the Federal Government

passed the National Environmental Policy Act (NEPA). Under CEQA, projects are reviewed for the purpose of evaluating potential environmental impacts of new development to the State.

City

City with a capital “C” generally refers to the San Carlos city government or administration. City with a lower case “c” may mean any city or may refer to the geographical area of San Carlos (e.g. the city bikeway system).

City Limit

The legal boundaries of the geographical area subject to the jurisdiction of San Carlos’ City government. For example, development applications for properties located within the city limit are reviewed by the City.

Collectors

Intermediaries between arterials and local roads; collecting traffic from local roads and distributing it to the arterial system. Collector roadways also provide direct access to residential subdivisions as well as shopping

centers and industrial complexes and should be spaced at quarter-mile to half-mile intervals.

Community Noise Equivalent Level (CNEL)

A 24-hour energy equivalent level derived from a variety of single-noise events, with weighting factors of 5 and 10 dBA applied to the evening (7 PM to 10 PM) and nighttime (10 PM to 7 AM) periods, respectively, to allow for the greater sensitivity to noise during these hours.

Compatible

Capable of existing together without conflict or ill effects.

Conditional Use Permit

The discretionary and conditional review of an activity, function or operation on a site or in a building or facility.

Cul-de-sac

A short street or alley with only a single means of ingress and egress at one end and with a large turn-around at its other end.

Cultural Resources

Includes historic, archaeological and paleontological resources, as well as human remains.

dB

Decibel; a unit used to express the relative intensity of a sound as it is heard by the human ear. The lowest volume a normal ear can detect under laboratory conditions is 0 dB, the threshold of human hearing. Since the decibel scale is logarithmic, 10 decibels are ten times more intense and 20 decibels are a hundred times more intense than 1 db.

dBA

The “A-weighted” scale for measuring sound in decibels; weighs or reduces the effects of low and high frequencies in order to simulate human hearing. Every increase of 10 dBA doubles the perceived loudness even though the noise is actually ten times more intense.

Dedication

The offer of land or easements for public use by an owner or developer of private land. Offers of

dedication for roads, parks, school sites, or other public uses often are made conditions of approval of development by a city or county.

Dedication, In lieu of

Cash payments that may be required of an owner or developer as a substitute for a dedication of land, usually calculated in dollars per unit measurement of land and referred to as in lieu fees or in lieu contributions.

Density

The amount of development on a property. (See also “Density, Residential” and “Floor Area Ratio”)

Density, Residential

The number of permanent residential dwelling units per acre of land. Densities specified in the General Plan are expressed in dwelling units per gross acre. (See “Acres, Gross”)

Development

The physical extension and/or construction of land uses. Development activities may include: subdivision of land; construction or alteration of structures, roads,

utilities and other facilities; grading; deposit of refuse, debris, or fill materials; and clearing of natural vegetative cover.

Downtown

The Downtown is generally defined as Laurel Street from Holly Street to Arroyo Street, including properties west to Walnut Street and the Civic Center.

Dwelling Unit

The place of customary abode of a person or household which is either considered to be real property under State law or cannot be easily moved.

Element

California State Government Code Section 65302 requires each General Plan to contain seven separate “elements” that set goals, policies and actions for each mandated subject. Topics can sometimes be combined or included into other elements, as allowed by State law. Other elements are optional.

Environmental Impact Report (EIR)

A report required pursuant to the California Environmental Quality Act (CEQA) that assesses all the environmental characteristics of an area, determines what effects or impacts will result if the area is altered or disturbed by a proposed action, and identifies alternatives or other measures to avoid or reduce those impacts. (See “California Environmental Quality Act”)

Fault

A fracture in the earth’s crust that forms a boundary between rock masses that have shifted.

Floor Area Ratio (FAR)

The size of a building in square feet (gross floor area) divided by net land area, expressed as a decimal number. For example, a 60,000 square foot building on a 120,000 square-foot parcel would have a floor area ratio of 0.50. The FAR generally is used in calculating the building intensity of non-residential development.

Form Based Ordinance

Document regulating development to achieve a specific urban form by controlling physical form, with a

lesser focus on land use regulations presented in both diagrams and words, keyed to a regulating plan that designates the appropriate form and scale of development. It addresses the relationship between building facades and the public realm, the form and mass of buildings in relation to one another and the scale and types of streets and blocks.

Floodplain, (100-year)

The area which has a one percent chance of being inundated during any particular 12-month period. The risk of this area being flooded in any century is 1 percent, but statistically, the risk is almost 40 percent in a 50-year period.

Gateway

An area located where a major street meets the city limit. It is a point along a roadway at which a pedestrian, motorist or cyclist gains a sense of having entered the city.

General Plan

A compendium of City policies regarding its long-term development, in the form of maps and accompanying

text. The General Plan is a legal document required of each local agency by the State of California Government Code Section 65301 and adopted by the City Council. In California, the General Plan has seven mandatory elements (Circulation, Conservation, Housing, Land Use, Noise, Open Space, Public Safety) and may include any number of optional elements.

Goal

A description of the general desired results that San Carlos seeks to create through the implementation of the General Plan. Goals are included in each element of the Plan and may include the key physical or community characteristics that the City and its residents wish to maintain or develop.

Groundwater

Water that exists beneath the earth's surface, typically found between saturated soils and rock and is used to supply wells and springs.

Habitat

The physical location or type of environment in which an organism or biological population lives or occurs.

Household

All persons occupying a single dwelling unit.

Impact Fee

A fee charged to a developer by the City specific to the proposed development project, typically by number of units, square footage or acreage. The fee is often used to offset costs incurred by the municipality for infrastructure such as schools, roads, wastewater facilities, police and fire services and parks.

Implementation

Actions, procedures, programs, or techniques that carry out policies.

Infill Development

Development that occurs on vacant or underutilized land within areas that are already largely developed.

Landmark Site

Sites designated General Commercial/Industrial adjacent to Holly Street and Industrial Road are considered Landmark Sites with high visibility and uses drawing from a regional market-base are encouraged.

Land Use

The occupation or utilization of an area of land for any human activity or purpose.

Land Use Designation

One specific category in a classification series of appropriate use of properties. A designation has an associated list of applied land use and management policies.

Level of Service Standard

A standard used by government agencies to measure the quality or effectiveness of a municipal service, such as police, fire, or library, or the performance of a facility, such as a street or highway.

Level of Service (LOS) for Traffic

A scale that measures the amount of traffic that a roadway or intersection can accommodate, based on such factors as maneuverability, driver dissatisfaction and delay.

LOS A

A relatively free flow of traffic, with little or no limitation on vehicle movement or speed.

LOS B

Describes a steady flow of traffic, with only slight delays in vehicle movement and speed.

LOS C

Denotes a reasonably steady, high-volume flow of traffic, with some limitations on movement and speed and occasional backups on critical approaches.

LOS D

Designates the level where traffic nears an unstable flow. Intersections still function, but short queues develop and cars may have to wait through one cycle during short peaks.

LOS E

Represents traffic characterized by slow movement and frequent stoppages. This level of service is considered to be the limit of acceptable delay.

LOS F

Describes unsatisfactory stop-and-go traffic characterized by "traffic jams" and stoppages of long duration.

Local Agency Formation Commission (LAFCo)

A five- or seven-member commission within San Mateo County that reviews and evaluates all proposals for formation of special districts, incorporation of cities, annexation to special districts or cities, consolidation of districts and merger of districts with cities. San Mateo County's LAFCo is empowered to approve, disapprove or conditionally approve such proposals.

Local Street

Provides direct access to properties and connects travelers to collectors and arterials.

Manufactured Housing

Residential structures that are constructed entirely in the factory, and that since June 15, 1976, have been regulated by the federal *Manufactured Home Construction and Safety Standards Act of 1974* under the administration of HUD.

Mobile Home

A structure, transportable in one or more sections, built on a permanent chassis and designed for use as a single-family dwelling unit.

Modular Unit

A factory-fabricated, transportable building or major component designed for use by itself or for incorporation with similar units onsite into a structure for residential, commercial, educational, or industrial use. The modular unit differs from mobile homes and manufactured housing by (in addition to lacking an integral chassis or permanent hitch to allow future movement) being subject to California housing law design standards. California standards are more restrictive than federal standards in some respects (e.g. plumbing and energy conservation). Also called Factory Built Housing.

Mobile Home Park

A parcel of land under one ownership that has been planned and improved for the placement of two or more mobile homes for rental purposes for non-transient use.

Mixed Use

Any mixture of land uses, including mixtures of residences with commercial, offices with retail, or visitor accommodation with offices and retail. As distinguished from a single use land use designation or zone, mixed use refers to an authorized variety of uses for buildings and structures in a particular area.

Parcel

A lot, or contiguous group of lots, in single ownership or under single control, usually considered a unit for purposes of development.

Pedestrian-Oriented Design

An approach to architectural design intended to facilitate movement on foot in an area, as opposed to design that primarily serves automobile movement. Examples of pedestrian-oriented design include pathways following the most direct route from sidewalk to front door, continuous building street walls with shop windows, outdoor cafes, street trees and benches and with architectural enhancement in the first two floors that are at human scale.

Planning Area

The Planning Area is the land area addressed by the General Plan. The Planning Area does not lead to regulatory powers outside of the city limit. During the General Plan Update process, the City identified distinctive areas that have the greatest potential to experience land use changes and have specific policies and programs targeted towards them. The unincorporated land within the City of San Carlos will remain under the jurisdiction of the County of San Mateo unless annexed to the City. (See also Sphere of Influence)

Policy

A specific statement of principle or of guiding actions that implies clear commitment but is not mandatory. A general direction that a governmental agency sets to follow, in order to meet its goals and objectives before undertaking an implementing action or program. (See "Action")

Sensitive Receptors

Uses sensitive to noise, odor and particulate matter such as residential areas, hospitals, convalescent homes and facilities and schools.

Specific Plan

Under Article 8 of the Government Code (Section 65450 et seq), a legal tool for detailed design and implementation of a defined portion of the area covered by a General Plan. A Specific Plan may include all detailed regulations, conditions, programs and/or proposed legislation which may be necessary or convenient for the systematic implementation of any General Plan element(s).

Sphere of Influence

Under State law, the term used for the area outside of the city limit which plans for the probable physical boundaries and service area of a local agency, as determined by the Local Agency Formation Commission (LAFCo). (See also Planning Area)

Traffic Calming

Measures designed to reduce motor vehicle speeds and to encourage pedestrian use, including:

- narrow streets,
- tight turning radii,
- sidewalk bulbouts,

- parking bays,
- textured paving at intersections, and
- parkways between sidewalks and streets.

Unincorporated Area

Encompasses properties that are located outside of cities. Development in the unincorporated area is subject to County jurisdiction.

Use

The purpose for which a lot or structure is or may be leased, occupied, maintained, arranged, designed, intended, constructed, erected, moved, altered and/or enlarged in accordance with the City zoning ordinance and General Plan land use designations.

Vehicle Miles Traveled

The sum of distances traveled by all motor vehicles in a specified system of highways for a given period of time.

Wastewater

Water that has already been used for washing, flushing, or in a manufacturing process and therefore

contains waste products such as sewage or chemical by-products.

Watershed

The land area extending from the topographic high points where water collects, such as ridges, down to the topographic low point where the area drains into a creek, river, bay, ocean, or other waterbody.

Zoning

The division of a City by ordinance or other legislative regulation into districts, or zones, which specify allowable uses for real property and size restrictions for buildings constructed in these areas; a program that implements the land use policies of the General Plan.

Zoning District

A designated area of the City for which prescribed land use requirements and building and development standards are or will be established.

Acronyms

ABAG	Association of Bay Area Governments
ADT	average daily traffic

AERA	Avigation Easement Review Area	Db	decibel
AYSO	American Youth Soccer Organization	dBA	A-weighted decibels
BAAQMD	Bay Area Air Quality Management District	DPM	diesel particulate matter
BART	Bay Area Rapid Transit	DTSC	California EPA, Department of Toxic Substances Control
BMP	best management practices	EIR	Environmental Impact Report
B-PAC	Bicycle and Pedestrian Advisory Committee	EOC	Emergency Operations Center
C/CAG	City/County Association of Governments	EPA	US Environmental Protection Agency
CAA	Clean Air Act	FAR	floor area ratio
CAAQS	California Ambient Air Quality Standards	FEMA	Federal Emergency Management Agency
CAL FIRE	California Department of Forestry and Fire Protection	GHG	greenhouse gas
CAP	Climate Action Plan	GPAC	General Plan Advisory Committee
CARB	California Air Resources Board	IPM	integrated pest management
CEQA	California Environmental Quality Act	LAFCo	Local Agency Formation Commission
CLUP	San Mateo Co. Comprehensive Airport/Land Use Compatibility Plan	L _{dn}	day-night average sound level
CNEL	Community Noise Equivalent Level	LEED	Leadership in Energy and Environmental Design
CO	carbon monoxide	L _{eq}	equivalent sound level
CO _{2e}	carbon dioxide equivalent	L _{max}	maximum sound level
		LOS	level of service
		MGD	million gallons per day

APPENDIX B



MPROSD	Midpeninsula Regional Open Space District	SEMS	Standardized Emergency Management System
MTBE	Methyl-tert-butyl-ether	SOI	sphere of influence
MTZ	mutual threat zone	SRDC	Shoreway Recycling and Disposal Center
Mw	Moment magnitude	SSO	sanitary sewer overflow
NAAQS	National Ambient Air Quality Standards	TAC	toxic air contaminant
NFPA	National Fire Protection Association	TDM	transportation demand measures
ng/m ³	nanograms per cubic meter	ug/m ³	micrograms per cubic meter
NIMS	National Incident Management System	USDA	United States Department of Agriculture
OES	Office of Emergency Services	USGS	United States Geological Survey
ONC	Office of Noise Control	V/C	volume to capacity ratio
PAH	polycyclic aromatic hydrocarbon	VHFSZ	very high fire severity zone
PCB	polychlorinated biphenyls	VMT	Vehicle miles traveled
PDA	priority development area	VTA	Santa Clara Valley Transportation Authority
PM ₁₀	particulate matter of 10 micrometers or less in size		
PM _{2.5}	particulate matter of 2.5 micrometers or less in size		
Ppb	parts per billion		
SBSA	South Bayside System Authority		
SBWMA	South Bayside Waste Management Authority		