

DRAFT

DRAFT ENVIRONMENTAL IMPACT REPORT

MOUNTAIN VISTA/SYCAMORE GLEN
SUBDIVISIONS



STATE CLEARINGHOUSE No. 2003042068

LSA

October 2004

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SUBDIVISIONS**

STATE CLEARINGHOUSE No. 2003042068

Submitted to:

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I. INTRODUCTION

A. PURPOSE OF THE EIR

In compliance with the California Environmental Quality Act (CEQA), this Draft Environmental Impact Report (EIR) describes the environmental consequences of the proposed Mountain Vista / Sycamore Glen Subdivisions Project (the Project). This EIR is designed to fully inform the City of Chico (City), other responsible agencies, and the general public of the proposed project and the potential consequences of project approval. The EIR also examines various alternatives to the proposed project and recommends a set of mitigation measures to reduce or avoid potentially significant impacts. The City is the lead agency for environmental review of the proposed project. This EIR will be used by the City and the public in their review of the proposed project. It may also be used by other agencies, such as the State Department of Fish and Game, whose discretionary approval may also be required to allow the project to be constructed (see Table III-2 in Chapter III, Project Description).

B. PROPOSED PROJECT

The proposed project consists of two vesting tentative subdivision maps and related permits and approvals necessary for the implementation of the proposed subdivisions. Combined, the subdivisions would allow for the development of up to 679 residential units (409 single-family homes and 270 multi-family units) and up to approximately 25,000 square feet of leaseable commercial area. The project includes a request for a zone change and General Plan amendment to permit multi-family uses in an area currently designated for low density use. No specific commercial uses are proposed at this time. The project also includes preservation, restoration and enhancement of approximately 56 acres of permanent open space at the north side of the site to reduce impacts to wetlands and to create a greenway along Sycamore Creek. (Approximately 4 acres of the preserve area would be used for stormwater detention and treatment.) Consistent with Municipal Code Section 19.52.060, the open space preserve shall be rezoned OS1; Primary Open Space with a Resource Management (-RM) Overlay. A bike path would be located adjacent to the open space area, at the perimeter of the residential lots. The project also includes the abandonment of unbuilt portions of the previously dedicated rights-of-way for Mariposa Avenue and Lassen Avenue at the northwest and central portions of the site. The project would also abandon multiple irrevocable offers of street/easement dedications interior to the Mountain Vista subdivision. The project is described in greater detail in Chapter III, Project Description.

C. EIR SCOPE

The City circulated a Notice of Preparation (NOP) that included a list of potential environmental effects that could result from the proposed project. The NOP was published on April 8, 2003, and was distributed to local, regional, and State agencies.

It should be noted that since the NOP was circulated, there have been refinements to the project. The most substantial refinement is that while the project may acquire off-site property as mitigation for impacts to biological resources, the project does not include the preservation of the entire 400-acre Hamilton Ranch in Tehama County. Refer to Chapter III for the complete project description.

A public scoping session was held on May 8, 2004. The written comments received in response to the NOP and comments presented at the public scoping meeting were taken into account during the preparation of the EIR. The NOP, written comments received on the NOP, and summary of verbal comments received at the scoping meeting are included in Appendix A.

This Draft EIR focuses on the areas of concern identified in the NOP and comments received on the NOP and at the public scoping session. The following environmental topics are addressed in this EIR:

- A. Aesthetics
- B. Air Quality
- C. Biological Resources
- D. Cultural Resources
- E. Hazards and Hazardous Materials
- F. Hydrology
- G. Land Use and Planning
- H. Noise
- I. Public Services
- J. Transportation and Circulation
- K. Utilities

D. REPORT ORGANIZATION

- *Chapter I – Introduction:* Discusses the overall EIR purpose; provides a summary of the proposed action and environmental review process; identifies potentially significant issues and concerns; and summarizes the organization of the EIR.
- *Chapter II – Summary:* Provides a summary of the impacts that would result from implementation of the proposed project, and describes mitigation measures recommended to reduce or avoid significant impacts.
- *Chapter III – Project Description:* Provides a description of the project objectives, project site, site development history, required approval process, and details of the project itself.
- *Chapter IV – Setting, Impact and Mitigation Measures:* Describes the following for each environmental topic; existing conditions (setting); potential environmental impacts and their level of significance; and mitigation measures recommended to mitigate identified impacts. Potential adverse impacts are identified by levels of significance, as follows: less-than-significant impact (LTS), significant impact (S), and significant and unavoidable impact (SU). The significance of each impact is categorized before and after implementation of any recommended mitigation measures(s).

- *Chapter V – Alternatives:* Provides an evaluation of three alternatives to the proposed project in addition to the No Project alternative.
- *Chapter VI – CEQA-Required Assessment Conclusions:* Provides the required analysis of cumulative impacts, growth-inducing impacts, significant unavoidable impacts, significant irreversible changes, and effects found not to be significant.
- *Chapter VII – Report Preparation:* Identifies preparers of the EIR, references used, and the persons and organizations contacted.
- *Appendices:* The appendices contain the NOP and comments on the NOP, technical reports, and other documentation prepared in conjunction with this EIR.

II. SUMMARY

A. PROJECT UNDER REVIEW

This EIR has been prepared to evaluate the environmental impacts of the proposed Sycamore Glen and Mountain Vista subdivisions project, which would be located in northeast Chico. The project would result in the development of up to 679 residential units and up to approximately 25,000 square feet of leasable commercial area. The project also includes the preservation of approximately 56 acres of open space on-site.

B. SUMMARY OF IMPACTS AND MITIGATION MEASURES

This summary provides an overview of the analysis contained in Chapter IV, Setting, Impacts and Mitigation Measures. CEQA requires a summary to include discussion of: (1) potential areas of controversy; (2) significant impacts; (3) recommended mitigation measures; and (4) alternatives to the project.

1. Potential Areas of Controversy

Comments received in response to the Notice of Preparation (NOP) included concerns regarding the following issue areas: water quality, traffic, biological resources, public services (schools), noise, land use compatibility (airport).

In response to the comments received on the NOP and at the public scoping meeting, as well as the City's identification of potential environmental effects, the scope of the EIR includes the following topics: Aesthetics, Air Quality, Biological Resources, Cultural Resources, Hazards and Hazardous Materials, Hydrology, Land Use, Noise, Public Services, Transportation and Circulation and Utilities.

2. Significant Impacts Prior to Mitigation

Under CEQA, a significant impact on the environment is defined as, "...a substantial, or potentially substantial, adverse change in any of the physical conditions within the area affected by the project including land, air, water, minerals, flora, fauna, ambient noise, and objects of historic or aesthetic significance."¹ Implementation of the proposed project has the potential to result in adverse environmental impacts in several areas.

¹ Remy, Thomas, Moos, and Manley, *Guide to the California Environmental Quality Act, 1999*, p.158: Public Resources Code 15382; Public Resources Code 21068.

- a. Biological Resources.** The project has the potential to result in the following biological impacts:
- Vernal pools and similar habitat that support vernal pool fairy shrimp and vernal pool tadpole shrimp would be impacted.
 - Foraging habitat for Swainson's hawk would be impacted.
 - Project construction could affect nesting Swainson's hawk or other raptors.
 - Wetlands would be impacted.
- b. Cultural Resources.** The project has the potential to impact archaeological resources or unknown human remains.
- c. Noise.** The project has the potential to result in the following noise impacts:
- Temporary noise impacts during construction.
 - Traffic noise impacts to homes abutting Floral Avenue and Eaton Road.
 - Operational noise impacts from homes and retail uses.
 - Aircraft overflight noise.
- d. Transportation and Circulation.** The project could increase the demand for public transit service.

With implementation of mitigation measures recommended in the EIR, these impacts would be reduced to less-than-significant levels.

3. Significant Unavoidable Impacts

As discussed in Chapter VI, CEQA-Required Assessment Conclusions, implementation of the proposed project would result in the following significant unavoidable adverse impacts.

- a. Air Quality.** The project would result in the following significant adverse air quality impacts:
- Demolition and construction period activities would generate significant dust, exhaust, and organic emissions.
 - Development of the proposed project would result in increased regional emissions of criteria air pollutants exceeding BCAQMD thresholds for two ozone precursors, NO_x and ROG.

4. Cumulative Impacts

- a. Air Quality.** Construction and operation of the project would exacerbate nonattainment of air quality standards for PM₁₀ and ozone within the air basin and contribute to cumulative air quality impacts.

5. Alternatives to the Proposed Project

The three alternatives to the proposed project that are analyzed in detail in Chapter V, Alternatives are described below:

- The CEQA-required **No Project/No Build alternative**, which assumes that the proposed project would not be built, and the property would remain in its existing state.
- The **No Project/General Plan alternative**, which assumes that more multi-family housing units would be built within the Mountain Vista subdivision, and that only single-family homes would be built within the Sycamore Glen subdivision, as permitted by the existing General Plan and zoning designations. A small commercial site would also be included. This alternative would permit a greater number of units than are proposed by the project.
- A **Biological Resources alternative**, which assumes that the majority of the site would be preserved as open space to minimize impacts to the wetlands and other sensitive biological resources on the project site. The alternative would include a small commercial site. The project would be developed primarily with multi-family residential uses along Eaton Road, and a small number of single-family units would be built at the northwest corner of the site.

C. SUMMARY TABLE

Information in Table II-1, Summary of Impacts and Mitigation Measures, has been organized to correspond with environmental issues discussed in Chapter IV. The table is arranged in four columns: (1) impacts; (2) level of significance prior to mitigation; (3) mitigation measures; and (4) level of significance after mitigation. Levels of significance are categorized as follows: SU = Significant and Unavoidable; S = Significant; and LTS = Less-Than-Significant. A series of mitigation measures are noted where more than one mitigation measure is required to achieve a less-than-significant impact, and alternative mitigation measures are identified when available. For a complete description of potential impacts and recommended mitigation measures, please refer to the specific discussion in Chapter IV, Setting, Impacts, and Mitigation Measures.

Table II-2 *continued*

| Environmental Impacts | Level of Significance Without Mitigation | Mitigation Measures | Level of Significance With Mitigation |
|--|--|--|---------------------------------------|
| <p><i>AIR-1 continued</i></p> <p><u>AIR-2:</u> Development of the proposed project will result in increased regional emissions of criteria air pollutants exceeding BCAQMD Thresholds.</p> | S | <ul style="list-style-type: none"> • Prior to final occupancy, the applicant shall demonstrate that all ground surfaces are treated sufficiently to minimize fugitive dust emissions. Fugitive dust emissions are considered dust clouds caused by wind, traffic, or other disturbances to exposed ground surfaces. <p><u>AIR-2:</u> To further reduce air quality impacts, the following supplemental mitigation measures shall be incorporated into the design of all future development projects on the subject parcels:</p> <ul style="list-style-type: none"> • Transit stops shall be provided along Eaton Road, in consultation with CATS (per Mitigation Measure TRANS-1). • Utilize energy-efficient lighting and process systems. • Utilize energy-efficient and automated controls for air conditioning. • Utilize EPA Phase II certified wood burning devices. • To the extent feasible, orient buildings and include landscaping (e.g. shade trees) to maximize natural cooling, and utilize centralized space and water heating and/or use of solar water heating. | SU |
| C. BIOLOGICAL RESOURCES | | | |
| <p><u>BIO-1:</u> Implementation of the proposed project would impact vernal pools and similar habitats that support vernal pool fairy shrimp and vernal pool tadpole shrimp.</p> | S | <p><u>BIO-1:</u> Prior to issuance of a grading permit or other project-related disturbance of the site, the applicant shall prepare a Habitat Mitigation and Monitoring Proposal (HMMP) consistent with the final Corps Sacramento District HMMP Guidelines for impacts to vernal pools and swales. The HMMP and other applicable permits shall be approved by the Corps, USFWS, and the RWQCB, prior to initiation of work on the project site. Implementation shall be consistent with the terms of the HMMP. Appropriate mitigation ratios shall be established to ensure no net loss of wetland acreage or value. The HMMP will address, at minimum, the following:</p> <ol style="list-style-type: none"> 1. Project Description: location and summary of project; jurisdictional areas to be filled; types, functions and values of impacted jurisdictional areas; 2. Goal of Mitigation: type, functions and values of habitats to be created or enhanced; temporal losses; estimated costs; | |

Table II-2 continued

| Environmental Impacts | Level of Significance Without Mitigation | Mitigation Measures | Level of Significance With Mitigation |
|-----------------------|--|--|---------------------------------------|
| BIO-1 continued | | <p>3. Proposed Mitigation Sites: location, size and ownership of mitigation areas; existing functions, values and jurisdictional waters; present and proposed uses and zoning;</p> <p>4. Implementation Plan: rationale for expecting success, responsibilities; schedule; site preparation; planting plan, irrigation plan; as-built plans;</p> <p>5. Maintenance: activities; schedule; responsible parties;</p> <p>6. Monitoring Plan: success and performance criteria; jurisdictional waters to be created/enhanced; monitoring methods; reports and schedule;</p> <p>7. Completion of Mitigation: agency notification and confirmation; and</p> <p>8. Contingency Measures: initiation, locations and funding.</p> <p>This mitigation shall be accomplished at both on- and off-site locations. In concept, the plan will consist of three parts:</p> <p>1. <i>On-Site Creation.</i> New vernal pools and swales shall be created within the 56-acre preserve area in the north portion of the project site. As functionally feasible due to existing topography, locations of existing pools, etc., the maximum acreage of vernal pools and swales will be created in an effort to attain the 1:1 creation ratio.</p> <p>2. <i>On-Site Preservation and Enhancement.</i> A total of 4.7 acres of vernal pools and swales occurring in the 56-acre preserve area shall be deemed as public open space. In addition, pools and swales disturbed from OHV or other uses shall be enhanced as necessary. Enhancement will likely include minor grading of the pool/swale, or adjacent upland areas, in order to re-create the natural topography and hydrology.</p> <p>3. <i>Off-Site Mitigation.</i> Off-site mitigation shall be provided to compensate for the balance of the project's impacts to vernal pools and swales. Off-site mitigation shall be accomplished through the purchase of mitigation credits, fee simple ownership, a conservation easement, or an equivalent legally binding instrument that ensures the creation or preservation of vernal pools and swales at the mitigation ratio approved by the Corps.</p> | |

Table II-2 continued

| Environmental Impacts | Level of Significance Without Mitigation | Mitigation Measures | Level of Significance With Mitigation |
|---|--|---|---------------------------------------|
| <p><u>BIO-2:</u> Implementation of the proposed project would impact 110.26 acres of nonnative grassland that is suitable foraging habitat for Swainson's Hawk.</p> | S | <p><u>BIO-2:</u> Prior to issuance of a grading permit or other project-related disturbance of the site, the applicant shall provide evidence that adequate mitigation has been provided for the loss of 110.26 acres of nonnative grassland that is suitable foraging habitat for Swainson's hawk. Because 52.23 acres of habitat will be provided on-site, 2.9 acres of nonnative grassland or other suitable foraging habitat shall be preserved at an off-site location, either through the purchase of mitigation credits, fee simple ownership, a conservation easement, or an equivalent legally binding instrument.</p> | LTS |
| <p><u>BIO-3:</u> Implementation of the proposed project would impact potential nesting habitat for Swainson's hawk or other raptors.</p> | S | <p><u>BIO-3:</u> If project construction is to begin during the nesting season (March 1 - September 15), all suitable nest trees along Sycamore Creek within 0.25 mile of the limits of work shall be surveyed by a qualified biologist prior to initiating construction-related activities. Surveys will be conducted no more than 14 days prior to the start of work. If an active Swainson's hawk nest is discovered, a 0.25 mile buffer shall be established on the project site around the nest tree and delineated using orange snow fence or brightly colored nylon rope. If an active nest of another raptor species is discovered, a 500 foot buffer shall be established. The buffer shall be maintained in place until the end of the breeding season or until the young have fledged, as determined by a qualified biologist. Other substitute measure(s) approved by the CDFG (i.e., such as the use of a monitoring biologist on-site during construction activities during the nesting season) would also be considered adequate mitigation. If no nesting is discovered, construction can begin as planned. Construction beginning during the non-nesting season and continuing into the nesting season shall not be subject to these measures.</p> | LTS |
| <p><u>BIO-4:</u> Implementation of the proposed project would impact wetlands.</p> | S | <p><u>BIO-4:</u> Same as Mitigation Measure BIO-1.</p> | LTS |

Table II-2 continued

| Environmental Impacts | Level of Significance Without Mitigation | Mitigation Measures | Level of Significance With Mitigation |
|--|--|---|---------------------------------------|
| <p>D. CULTURAL RESOURCES</p> | S | <p>CULT-1: A qualified archaeologist shall monitor all ground disturbing activities within the two areas identified as potentially containing archaeological resources. These areas include: 1) the recorded site boundaries of P-403 (west of the vernal pool) plus a 25-foot surrounding buffer; and 2) the strip of land from the fence line that forms the southern project area boundary north 50 feet, and from the existing PG&E substation west to the intersection of Floral Avenue and Lupin Avenue. This area conforms to the reported location of midden documented as part of archaeological site P-403.</p> <p>Archaeological monitors shall be empowered to halt construction activities at the location of the discovery to review possible archaeological material and to protect the resource while the finds are being evaluated. This monitoring shall continue until, in the archaeologist's judgment, cultural resources are not likely to be encountered.</p> <p>If deposits of prehistoric or historical archaeological materials are encountered during project activities, all work within 50 feet of the discovery shall be redirected until the archaeological monitor evaluates the situation and provides recommendations. Project personnel shall not collect or move any archaeological material. Fill soils that may be used for construction purposes shall not contain archaeological materials. If archaeological deposits cannot be avoided, they shall be evaluated for their significance in accordance with the California Register. If the resources are not significant, further protection is not necessary. If the resources are significant, they will need to be protected from adverse effects or such effects must be mitigated. Upon completion of the archaeological assessment, a report shall be prepared documenting the methods and results, as well as recommendations. The report shall be submitted to the NEIC and to the Planning Division of the City of Chico Community Development Department.</p> | LTS |
| <p>CULT-1: Ground-disturbing activities associated with site preparation, grading, and other construction activities could adversely impact archaeological resources.</p> | | | |

Table II-2 continued

| Environmental Impacts | Level of Significance Without Mitigation | Mitigation Measures | Level of Significance With Mitigation |
|---|--|--|---------------------------------------|
| <p><u>CULT-2:</u> Ground-disturbing activities associated with site preparation, grading, excavation or utility trenching could disturb human remains, including those interred outside of formal cemeteries.</p> | S | <p><u>CULT-2:</u> If human remains are encountered during construction activities, work within 50 feet of the discovery shall be redirected and the county coroner notified immediately. At the same time, an archaeologist shall be contacted to evaluate the situation. If the human remains are of Native American origin, the coroner shall notify the Native American Heritage Commission within 24 hours of this identification. The Native American Heritage Commission shall identify a Native American Most Likely Descendent to inspect the site and provide recommendations for the proper treatment of the remains and associated grave goods. A report documenting the methods, findings, and recommendations shall be prepared. The report shall be submitted to the NEIC and the Planning Division of the City of Chico Community Development Department.</p> | LTS |
| <p>E. HAZARDS AND HAZARDOUS MATERIALS</p> | | | |
| <p><i>There are no significant impacts related to hazards and hazardous materials.</i></p> | | | |
| <p>F. HYDROLOGY</p> | | | |
| <p><u>HYDRO-1:</u> Increased stormwater runoff from the project could impact downstream sources.</p> | S | <p><u>HYDRO-1:</u> Prior to approval of grading plans for the proposed project, the applicant shall submit a storm drainage plan to the Department of Public Works for review and approval in accordance with the standards set forth in the City's adopted Storm Drainage Master Plan (2000). The applicant shall also be responsible for obtaining the necessary regulatory permits from the Corps, RWQCB, and CDFG. The storm drainage plan shall be based on criteria including, but not limited to:</p> <ul style="list-style-type: none"> • Incorporation of all relevant BMPs included in the City's Best Practices Manual related to stormwater drainage, including interception of "first-flush" contaminants from the initial 0.5-inch of rainfall for each storm event. • The design and selection of BMPs will be based on site-specific considerations such as geology, topography, and hydrology. • Given the site-specific conditions of the project area and presence of sensitive vernal pools in the area, the drainage plan will generally include limiting soil disturbances near vernal pools during the winter rainfall season. | LTS |

Table II-2 continued

| Environmental Impacts | Level of Significance Without Mitigation | Mitigation Measures | Level of Significance With Mitigation |
|--|--|---|---------------------------------------|
| HYDRO-1 continued | | <p>Relevant BMPs include, but are not limited to, the following:</p> <ul style="list-style-type: none"> • The use of grassed swales as opposed to culverts, for runoff conveyance. Grassed swales reduce runoff velocities, thereby decreasing peak runoff rates. • Preservation of existing vegetation to the extent possible by flagging or fencing to avoid disturbance. • Installation of soil stabilization BMPs, such as mulching, erosion control fabrics, and/or seeding with grass or other plants. • Reducing vehicle tracking of sediment onto paved surfaces during the winter rainfall period by vehicle washing and street sweeping. • Implementation of hazardous materials management practices to reduce the possibility of chemical spills or releases of contaminants. • Establishing staging areas for heavy equipment and construction materials so that inadvertent spills of oil, grease, asphalt, other petroleum by-products, or other hazardous materials will not be discharged into sensitive wetland areas. All machinery will be properly maintained and cleaned to prevent spills and leaks. • Regular inspection and maintenance of BMPs to ensure they are in good working order. <p>The storm drainage plan shall be prepared by a registered civil engineer and will be in conformance with City and state agency stormwater guidelines, including procurement of a General Stormwater Permit and/or water quality certification.</p> | |
| G. LAND USE | | | |
| <i>There are no significant impacts related to land use.</i> | | | |
| H. NOISE | | | |
| NOISE-1: Noise levels from construction activities may range up to 85 dBA L _{max} at the nearest land uses to the project site for a limited time period. | S | <p>NOISE-1: The following measures shall be implemented during construction of the proposed project.</p> <ul style="list-style-type: none"> • All construction vehicles or equipment, fixed or mobile, shall be equipped with properly operating and maintained mufflers. • As part of the proposed project, all operations would comply with the noise ordinance standards, and stockpiling and/or vehicle staging areas would be located as far as practicable from dwellings. • Construction activities shall be restricted to between 7:00 a.m. and 9:00 p.m. Monday through Saturday, and 10:00 a.m. and 6:00 p.m. on Sundays or federal holidays. | LTS |

Table II-2 continued

| Environmental Impacts | Level of Significance Without Mitigation | Mitigation Measures | Level of Significance With Mitigation |
|---|--|---|---------------------------------------|
| <p>NOISE-2: Local traffic will generate long-term noise levels exceeding 60 dBA CNEL on the project site.</p> | S | <p>NOISE-2: Proposed sensitive land uses will require the following mitigation measures.</p> <ul style="list-style-type: none"> • Sound walls (Plexiglas or equivalent material with a minimum height of 6 feet) would be required for any balconies located along Eaton Road or Floral Avenue. • All exterior residential uses facing Eaton Road shall be protected by a sound barrier with an effective height of 6 feet. This barrier will provide approximately 7 to 8 dBA in noise reduction for ground floor receptors, when the direct line of sight to the traffic is blocked. This will reduce the exterior noise level to at or below the exterior noise standard (67 dBA - 7 dBA = 60 dBA). • All exterior residential uses facing Floral Avenue shall be protected by a sound barrier with an effective height of 8 feet. This barrier will provide approximately 9-10 dBA in noise reduction for ground floor receptors, when the direct line of sight to the traffic is blocked. This will reduce the exterior noise level to at or below the exterior noise standard (69 dBA - 9 dBA = 60 dBA). • To achieve the indoor fresh-air ventilation requirements specified in Chapter 35 of the Uniform Building Code, all units adjacent to Eaton Road or Floral Avenue will require mechanical ventilation to ensure that windows can remain closed for a prolonged period of time. | LTS |
| <p>NOISE-3: Long-term stationary noise sources on the project site could potentially generate noise levels in excess of the thresholds set in the City's Municipal Code.</p> | S | <p>NOISE-3: The following measures are required for the operations of the proposed project:</p> <ul style="list-style-type: none"> • All on-site stationary noise sources shall comply with the standards listed in Section 9.38.030 of the City's Municipal Code. • Loading docks or loading areas and noise-generating equipment associated with the retail uses will be located as far as practical from all existing and planned residential uses. | LTS |
| <p>NOISE-4: Homes within the 55 dB CNEL noise contour would be impacted by noise from aircraft overflights.</p> | S | <p>NOISE-4: Prior to the issuance of building permits for any residential structures within the 55dB CNEL noise contour, the building division shall verify that homes within this area shall be constructed utilizing noise attenuation features to reduce interior noise levels to less than 45 dB CNEL within all habitable rooms. Attenuation features that may be incorporated to meet this criterion could include, but are not limited to, special noise insulating construction and the installation of air conditioning so that windows can be kept closed.</p> | LTS |

Table II-2 continued

| Environmental Impacts | Mitigation Measures | Level of Significance Without Mitigation | Level of Significance With Mitigation |
|--|---|--|---------------------------------------|
| I. PUBLIC SERVICES | | | |
| <i>There are no significant impacts related to public services.</i> | | | |
| J. TRANSPORTATION AND CIRCULATION | | | |
| <p>TRANS-1: Implementation of the proposed project may create demand for public transit service above that which is currently planned or provided for by the City of Chico.</p> | <p>TRANS-1: The project applicant shall work with CATS to ensure that sufficient service is provided to the study area, if deemed necessary by CATS. In addition, the project shall coordinate with CATS to provide two convenient transit stops within the project site. The transit stops shall be located on Eaton Road and shall include pedestrian shelters. In addition, adequate bus turn-out areas shall be provided so that stopped buses do not interfere with through vehicles on the roadway system.</p> | S | LTS |
| K. UTILITIES | | | |
| <i>There are no significant impacts related to utilities.</i> | | | |

III. PROJECT DESCRIPTION

A. PROJECT LOCATION

The approximately 178-acre project site is located in the northeastern portion of the City of Chico, in Butte County, California (refer to Figure III-1). The site is generally bounded by Floral Avenue on the west, Sycamore Creek on the north, Ceanothus Avenue on the east, and on the south by an existing Pacific Gas and Electric (PG&E) easement with electrical lines. The project site is currently vacant, with non-native grasses and vernal pools throughout the site. The property has been disturbed by off-road vehicle use, which has created several dirt roads that cross the site. Abandoned furniture and other debris are scattered along these dirt paths. Residential neighborhoods are located to the east, west, and south of the project site. A PG&E substation is located at the southeast corner of Mariposa Avenue, and is bounded by the project site on three sides. North of the site is Sycamore Creek with open space and agricultural land beyond. The project site and its surroundings are depicted in Figure III-2 and Figure III-3. Photos of the site are shown in Figures III-4a to III-4e.

B. BACKGROUND

The project site is located within the area originally designated under the Northeast Chico Specific Plan (City of Chico, 1980) area, also referred to as Foothill Park. This Specific Plan was repealed by City Council Resolution 141 96-97, adopted May 6, 1997. The Specific Plan defined permitted land uses and development densities for the northeast area of Chico, south of Sycamore Creek and east of Cohasset Road. The Specific Plan called for the extension of Lassen Avenue and Mariposa Avenue through the site, with a mix of residential, commercial, and institutional uses, including Medium Density Residential, High Density Residential, neighborhood commercial, and an elementary school and park site. At that time, the plan did not contemplate preservation of open space within the project site. In 1989 Sierra Technology Corporation received approval to subdivide the western portion of the project site (Mountain Vista) for the land uses envisioned by the Specific Plan. Following approval of the subdivision, the vernal pools that occupy the project site were identified as jurisdictional waters of the United States subject to the Army Corps of Engineers regulatory authority under the Clean Water Act, and as habitat for several sensitive species that were later federally-listed as Threatened or Endangered species. Due to the listing of these species, and increasing mitigation requirements for impacts to other biological resources identified on the project site, the current project (Mountain Vista and Sycamore Glen subdivisions) has been redesigned to minimize impacts on the site's most sensitive habitat by preserving 56 acres as permanent open space.

1. Eaton Road Extension

The City of Chico plans to extend Eaton Road through the southern portion of project site, as called for in the Transportation Element of the General Plan. Eaton Road currently begins near Esplanade and extends eastward, through its interchange with SR 99, to its current terminus at Floral Avenue on the western project boundary. The Eaton Road Extension project would extend Eaton Road from Floral Avenue to Manzanita Avenue (East Avenue). The impacts associated with the roadway

extension project were analyzed in the City's Eaton Road Extension Draft EIR.¹ Plans call for a four-lane divided road, with a landscaped median and Class II bicycle lanes. The typical 124-foot roadway cross section would include a 14-foot wide landscaped median, 4-foot wide sidewalks, and an additional 15 feet of landscaping behind the sidewalk. Construction of the project is estimated to begin in 2005/6, and may be phased, depending on development in the project area. The City anticipates that all three phases of the project would be completed by 2010. Because direct impacts that would result from the road extension project are addressed in the Eaton Road Draft EIR, they are not identified as project-specific impacts of the Sycamore Glen and Mountain Vista Subdivisions project, the subject of this EIR. However, the Eaton Road project is considered a cumulative project, and its impacts are considered in this analysis.

C. PROJECT OBJECTIVES

- Develop the site consistent with densities permitted under the General Plan.
- Preserve a significant amount of open space on the site that will maximize the value to all biological resources.
- Provide a neighborhood-oriented commercial area to serve the surrounding residential neighborhoods.
- Provide a significant number of multi-family residential units to help meet the City's projected needs for moderately-priced rental housing.

D. PROJECT UNDER REVIEW

The proposed project consists of two vesting tentative subdivision maps (Mountain Vista and Sycamore Glen) and related permits and approvals necessary for the implementation of the proposed subdivisions. Combined, the subdivisions would allow for the development of up to 679 residential units (409 single-family homes and 270 multi-family units) and up to approximately 25,000 square feet of leaseable commercial area. The project includes a request for a zone change and General Plan Amendment to permit multi-family uses on a portion of the site currently designated for low density use. No specific commercial uses are proposed at this time. The project also includes preservation, restoration and enhancement of approximately 56 acres of permanent open space at the north side of the site to reduce impacts to wetlands and to create a greenway along Sycamore Creek. (Approximately 4 acres of the preserve area would be used for stormwater detention and treatment.) Consistent with Municipal Code Section 19.52.060, the open space preserve shall be rezoned OS1-RM, Primary Open Space with a Resource Management (-RM) Overlay. A bike path would be located adjacent to the open space area, at the perimeter of the residential lots. The project also includes the abandonment of unbuilt portions of the previously dedicated rights-of-way for Mariposa Avenue and Lassen Avenue at the northwest and central portions of the site. The project would also abandon multiple irrevocable offers of street/easement dedications interior to the Mountain Vista subdivision. The two subdivisions are described in more detail below:

¹ Jones & Stokes, *Eaton Road Extension Draft EIR*, March 2004.

1. Sycamore Glen Subdivision Vesting Tentative Subdivision Map (S 00-11)

The Sycamore Glen subdivision totals approximately 88 acres on a parcel immediately east of and contiguous with the Mountain Vista subdivision. It is also bounded on the north by Sycamore Creek, on the east by Ceanothus Avenue and the new Foothill Park East development. The PG&E Sycamore Creek substation is located at the southeast corner of the site, and an existing PG&E easement with overhead power lines is located along the southern boundary of the property. The property is all within Assessor's Parcel Number 016-200-067.

a. Existing General Plan and Zoning Designations. The General Plan land use designation for this site is Low Density Residential with Mixed-Use Neighborhood Core (MUNC) and Open Space for Environmental Conservation/Safety. Zoning is R1/-RM (Low Density Residential with a Resource Management (-RM) overlay zone).

The Sycamore Glen Subdivision proposes 189 single-family lots in the central portion of the site, a 6.8-acre lot for multi-family residential uses in the southern portion of the site, and 31.3 acres of permanent open space in the northern portion of the site for wetlands/vernal pool protection and enhancement and creekside greenway including approximately 2 acres that would be dedicated for stormwater treatment. Assuming buildout of the multi-family lot at a density of 16 dwelling units per acre, a total of 109 multi-family units could be constructed on the site. A bike path would be located along the northern edge of the residential area, adjacent to the planned open space. The path would connect with the planned bike path in the Mountain Vista subdivision to the west and the existing bike path in the Foothill Park East neighborhood. Eaton Road is planned to extend through the southern portion of the site. The proposed subdivision is shown in Figure III-5.

b. Proposed General Plan Amendment and Zone Change. The General Plan designation for 6.8 acres of the southern portion of the site would change from Low Density Residential (2.01 to 6 units per acre) to Medium-High Density Residential (MHDR) (4.01 to 14 units per acre). The project proposes to change the zoning designation from R1 (Low Density Residential) to R3 (Medium-High Density Residential) to allow for the construction of multi-family dwellings. Consistent with Municipal Code Section 19.52.060, the open space preserve planned for the northern portion of the site would be rezoned OS1, Primary Open Space with a -RM (Resource Management) Overlay district. The areas of the proposed zone change and General Plan Amendment is shown on Figure III-5.

Table III-1: Land Use Summary – Mountain Vista & Sycamore Glen Subdivisions

| Use | # Units/ Sq.Ft. | Area (Acres) |
|-----------------------------------|---------------------|---------------------------|
| Mountain Vista Subdivision | | |
| Single-Family Residential | 220 | 33.64 |
| Multi-Family Residential | 161 ^a | 10.20 |
| Commercial | 25,000 ^b | 1.92 |
| Open Space & Stormwater Treatment | | 25.09 |
| Streets | | 19.25 |
| <i>Mountain Vista Subtotal</i> | <i>381</i> | <i>90.10</i> |
| Sycamore Glen Subdivision | | |
| Single-Family Residential | 189 | 32.21 |
| Multi-Family Residential | 109 ^a | 6.80 |
| Open Space & Stormwater Treatment | | 31.35 |
| Streets | | 16.90 |
| <i>Sycamore Glen Subtotal</i> | <i>298</i> | <i>87.76</i> |
| Grand Total | 679 | 177.86^c |

^a Estimate. Multi-family units assume buildout at 16 units per acre. The R3 zoning allows 14 to 22 du/ac.

^b Estimate. 25,000 is the estimated amount of commercial floor area that is likely to be built on the 1.9-acre commercial site.

^c Includes future right-of-way for Eaton Road project, which would total approximately 10 acres..

Source: Rolls Anderson & Rolls, 2004.

2. Mountain Vista Subdivision Vesting Tentative Subdivision Map (S 01-12)

The Mountain Vista subdivision totals approximately 90 acres on the western half of the project site. The site is bounded by Floral Avenue to the west, Sycamore Creek to the north, and an existing PG&E easement to the south. Mariposa Avenue would form the eastern boundary. The site is composed of Assessor's Parcel Numbers 016-200-069, -070, -071 and -072.

a. General Plan and Zoning Designations. The General Plan land use designations for this site are Low Density Residential and Medium-High Density Residential with Mixed-Use Neighborhood Core (MUNC) and Open Space for Environmental Conservation/Safety. The zoning designations are R1 (Low Density Residential), PMU/-RM Planned Mixed Use with a Resource Management Overlay zone.

b. Proposed Land Uses. The Mountain Vista subdivision proposes 220 single-family lots on 33.6 acres and up to 161 units of multi-family housing on 10.2 acres of the site. Additional multi-family residential lots on 2 acres would buffer the commercial site from the single-family residential uses, which make up the balance of the site. In addition, up to 25,000 square feet of commercial uses would be permitted on a 1.9-acre neighborhood commercial site. This subdivision would preserve 22.8 acres in the northern portion of the site, south of Sycamore Creek, as open space for preservation/enhancement of wetlands and vernal pools and creekside greenway. An additional 2.3 acres at the northeast corner would be dedicated to stormwater treatment. A bike trail is planned along the north perimeter of the residential uses, at the perimeter of the open space area. The trail would connect with the existing trail to the west, and would extend through the planned Sycamore Glen subdivision to the east and connect with the existing bike trail in the Foothill Park East development further east. Eaton Road is planned for extension through the southern portion of the site from its current terminus at Floral Avenue. An 8.2-acre lot between Eaton Road and the PG&E boundary is planned for multi-family housing along the southern portion of the site. The northeast corner of Floral Avenue and Eaton Road is planned as a 1.9-acre neighborhood commercial site. The neighborhood commercial zoning district would allow grocery stores, restaurants, retail stores, banks, personal services, and other service-oriented uses. The project includes the abandonment of multiple irrevocable offers of dedication from streets and easements. The Mountain Vista subdivision is shown in Figure III-6.

3. Stormwater Treatment

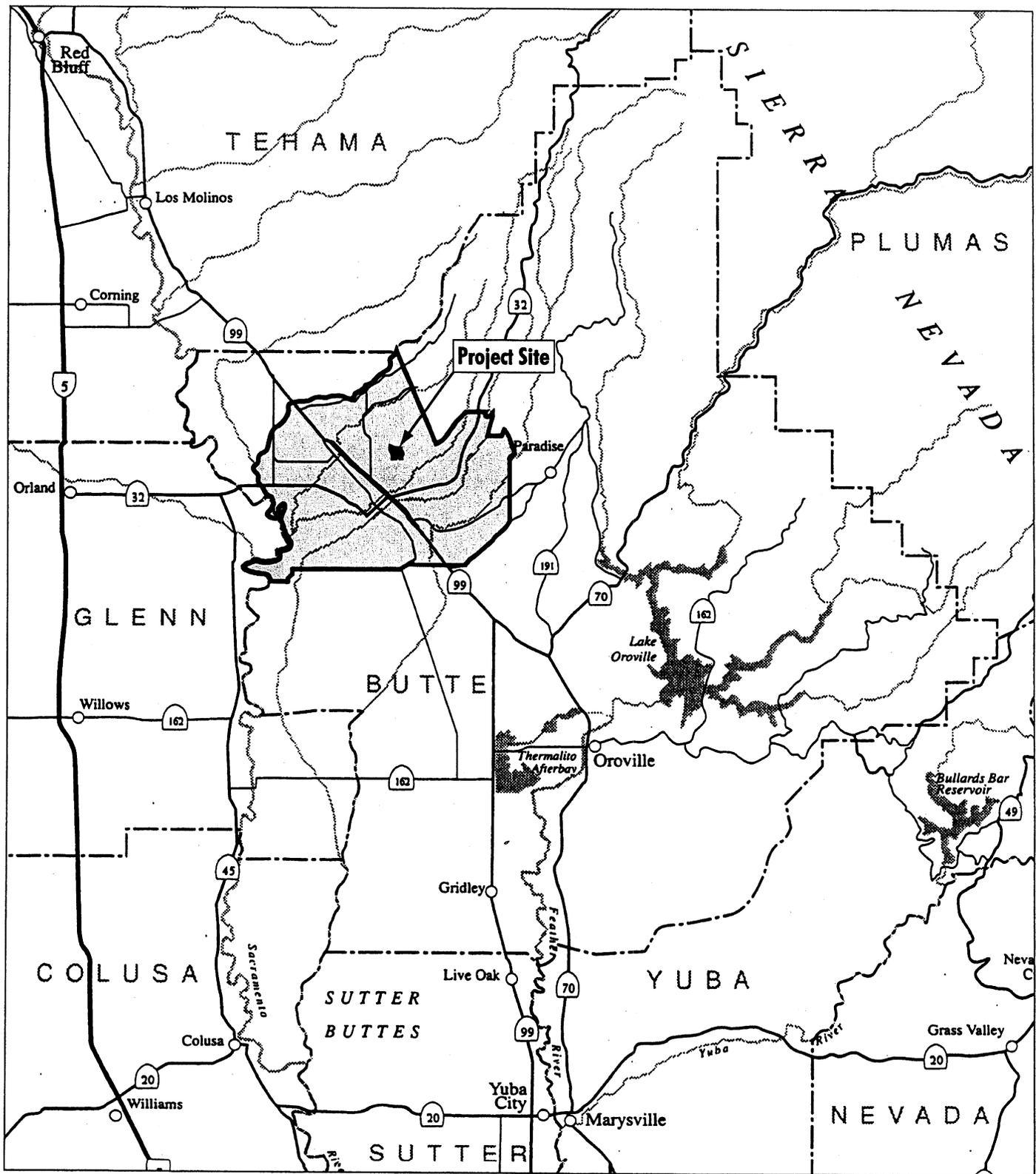
The project includes three lettered lots (Lot B, Lot B-1 and Lot B-2) at the northern boundary of the site, adjacent to Sycamore Creek, that would contain treatment ponds designed to filter out sediments. These basins would also capture dry-season runoff from the development. Three 20-foot wide drainage easements containing underground storm drain pipes would connect the proposed development area to the basins. In order to minimize disturbance to the open space preserve, two of these easements would be located along the eastern and western property lines of the site. The third easement would extend from the northerly end of Road K in the adjacent Sycamore Glen subdivision to the central basin (Lot B-2). The easement would be plotted to the east of the large vernal pool in the central portion of the site to avoid disturbance to the vernal pool.

E. REQUIRED PERMITS AND APPROVAL

Table III-2 lists the probable permits and approvals required for the project.

Table III-2: Probable Permits and Approvals Required

| Agency | Permit/Approval |
|--|--|
| City of Chico | Approval of Planned Development Permit or Specific Plan and Vesting Tentative Subdivision Maps; abandonment of portions of dedicated right-of-way; General Plan Amendment; zone change; grading permit |
| Butte County Airport Land Use Commission | Land Use Consistency Determination |
| State Water Resources Control Board | Construction Storm Water Permit; Clean Water Act Section 401 water quality certification |
| U.S. Army Corps of Engineers | Clean Water Act Section 404 permit, Habitat Mitigation Monitoring Proposal |
| State Department of Fish and Game | 1602 Lake or Streambed Alteration Agreement |
| Butte County Air Quality Management District | Dust Control Review |
| U.S. Fish and Wildlife Service | Section 7 letter of concurrence, biological opinion, and incidental take permit under the Federal Endangered Species Act (ESA) |



LSA

FIGURE III-1



■ CITY OF CHICO

Sycamore Glen/Mountain Vista EIR
Regional Location

SOURCE: CITY OF CHICO; LSA ASSOCIATES, INC., 2003

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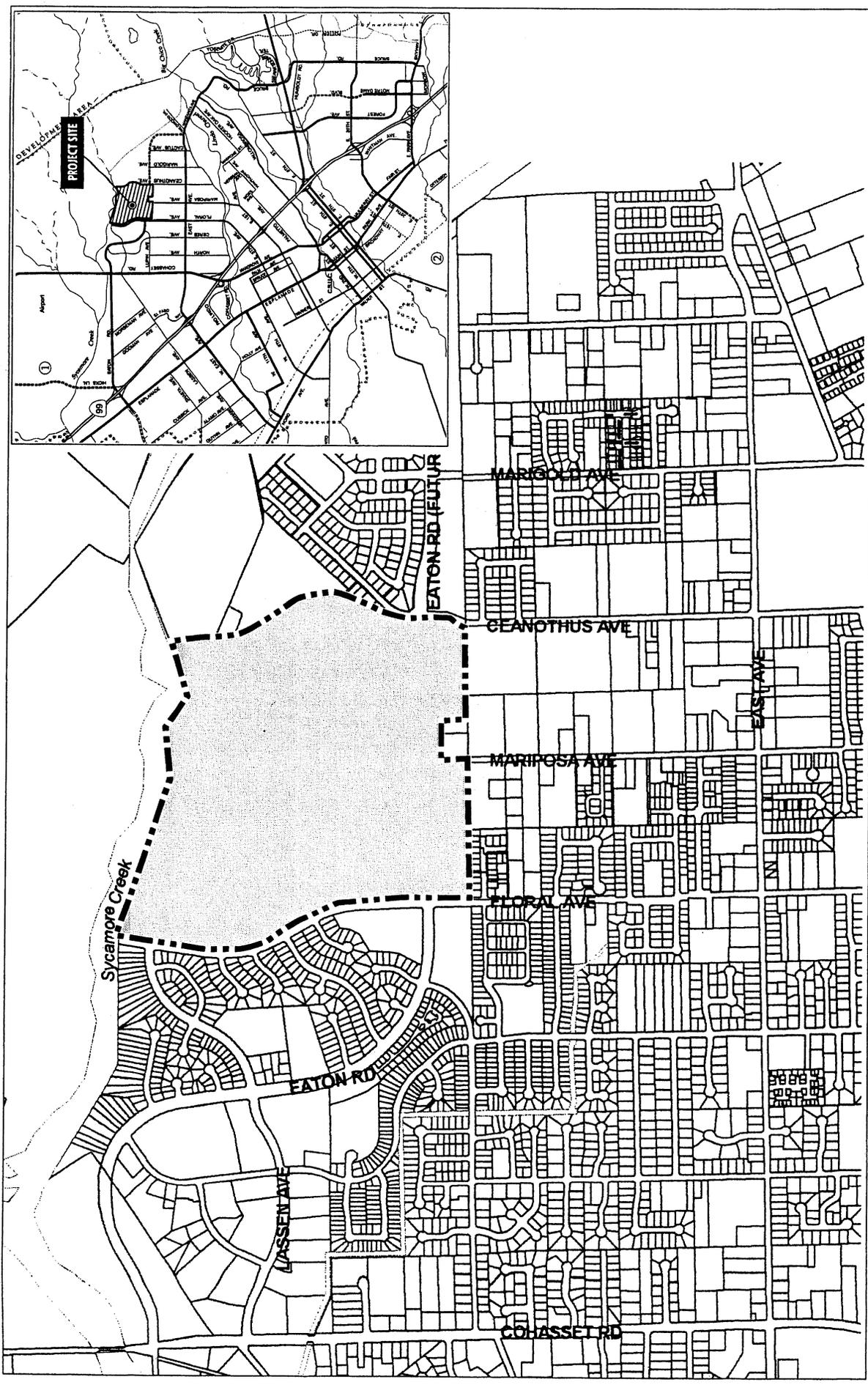


FIGURE III - 2

Sycamore Glen/Mountain Vista EIR
Vicinity Map





SOURCE: CITY OF CHICO; KORVE ENGINEERING & BLAYNEY DYETT, 1994
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Photo 1: View looking south on Floral Avenue from near East Lassen Avenue.



Photo 2: View from the northwest corner of the site, looking east along the creek.

LSA

FIGURE III-4a

Sycamore Glen/Mountain Vista EIR
Site Photos



Photo 3: View from the northwest corner of the site, looking west toward homes at the intersection of East Lassen Avenue and Floral Avenue.



Photo 4: View from the northwest portion of the site looking north toward the creek.

LSA

FIGURE III-4b

Sycamore Glen/Mountain Vista EIR
Site Photos



Photo 5: View from an existing dirt road in the north-central portion of the site, looking west toward Floral Avenue.



Photo 6: View from an existing dirt road in the north-central portion of the site, looking northwest.

LSA

FIGURE III-4c

Sycamore Glen/Mountain Vista EIR
Site Photos



Photo 7: View from the northeast portion of the site, looking southeast toward the new subdivision along Ceanothus Avenue.

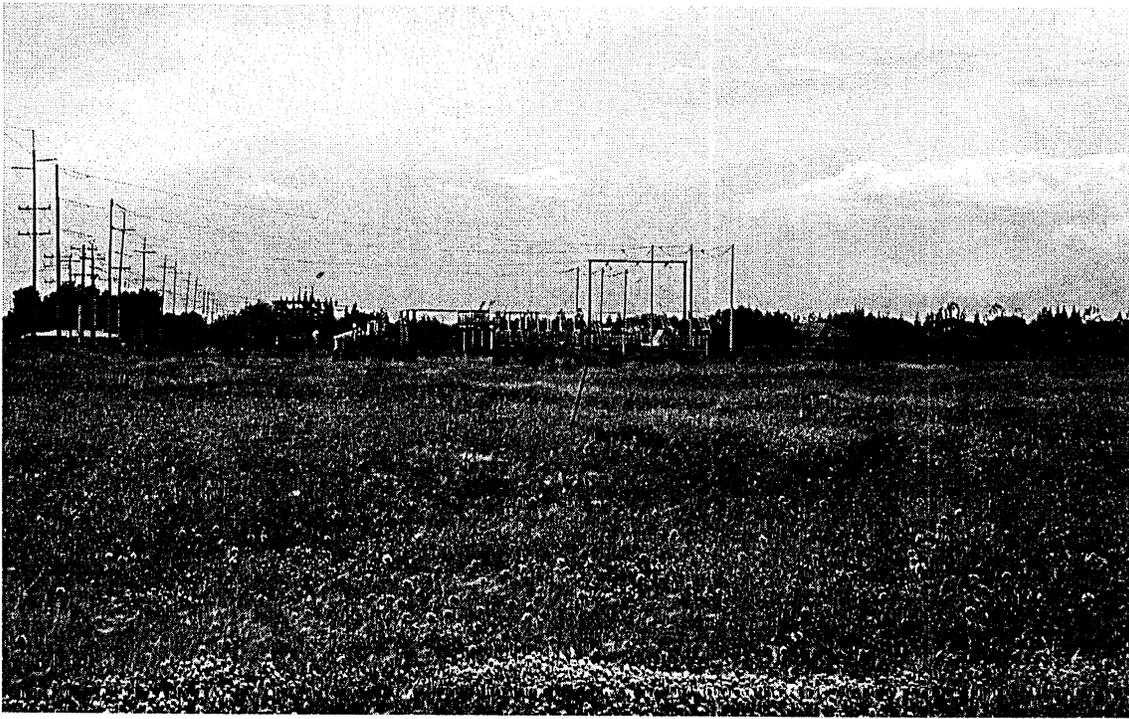


Photo 8: View from the southeast corner of the site, looking west from Ceanothus Avenue toward the PG&E substation.

LSA

FIGURE III-4d

Sycamore Glen/Mountain Vista EIR
Site Photos

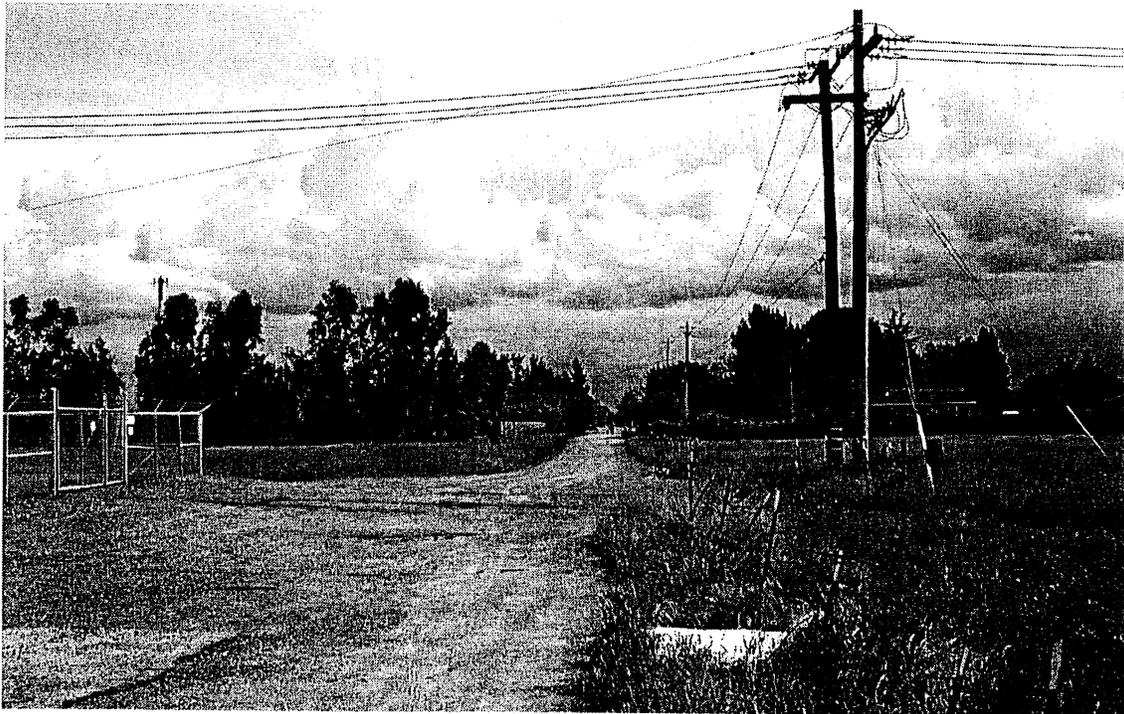


Photo 9: View from the south-central portion of the site, adjacent to the PG&E substation, looking south down Mariposa Avenue toward existing homes. Powerlines in the foreground run east-west along the southern perimeter of the project site.

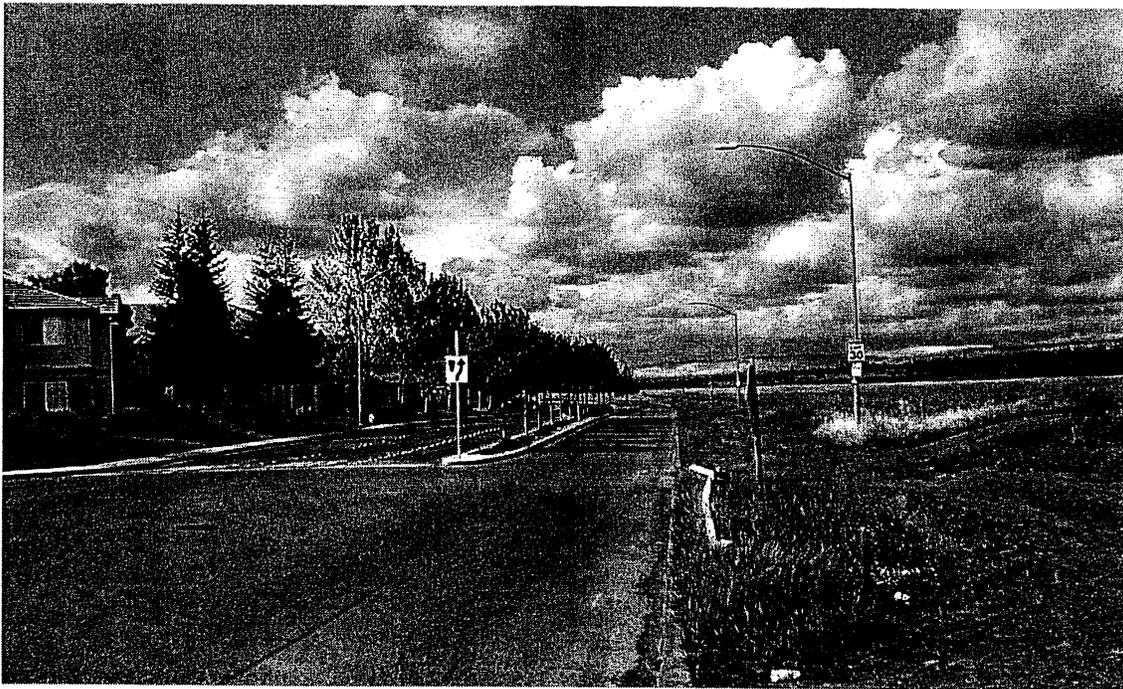
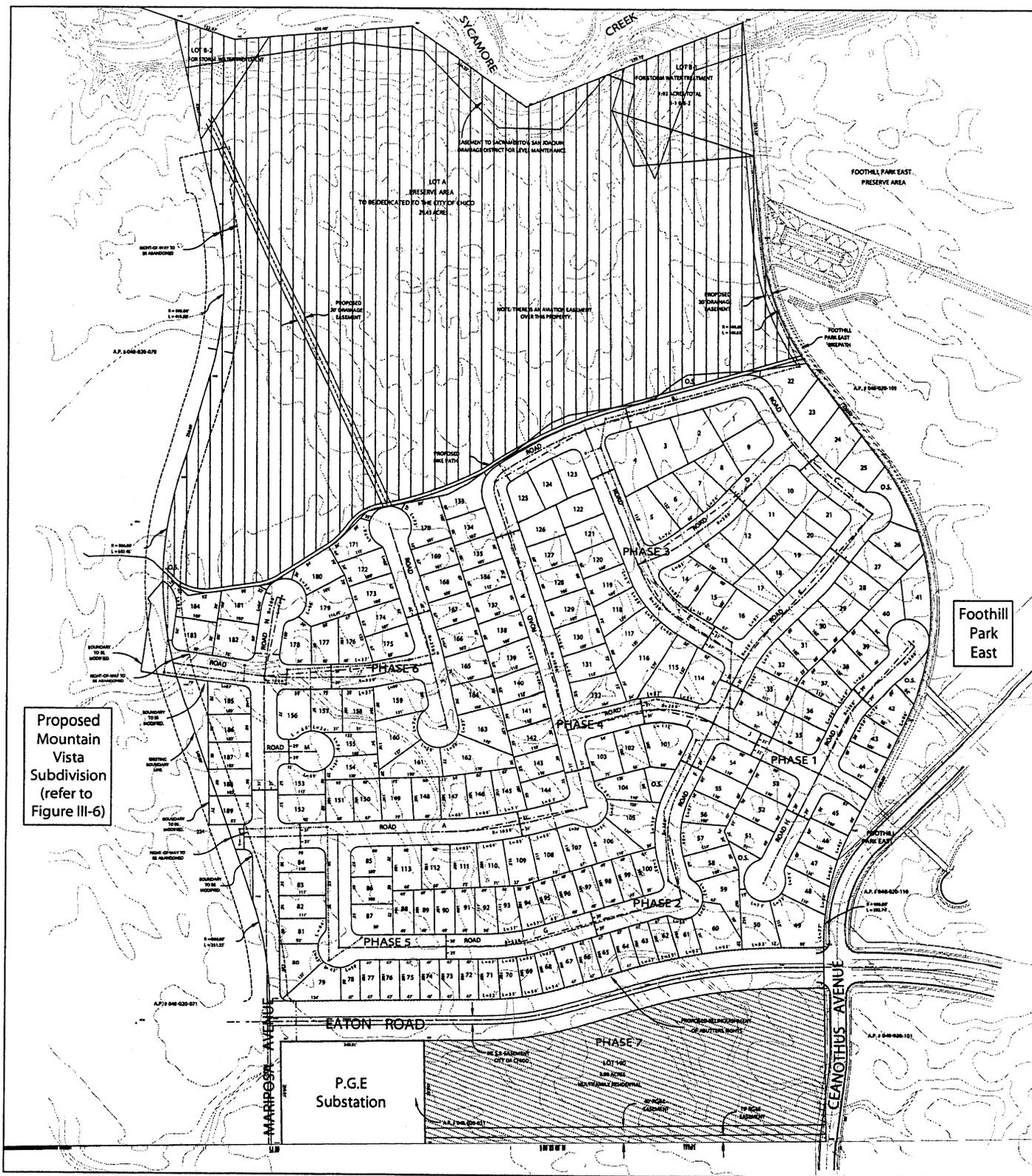


Photo 10: View looking north from the intersection of Eaton Road and Floral Avenue.

LSA

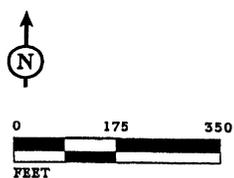
FIGURE III-4e

Sycamore Glen/Mountain Vista EIR
Site Photos



LSA

FIGURE III-5

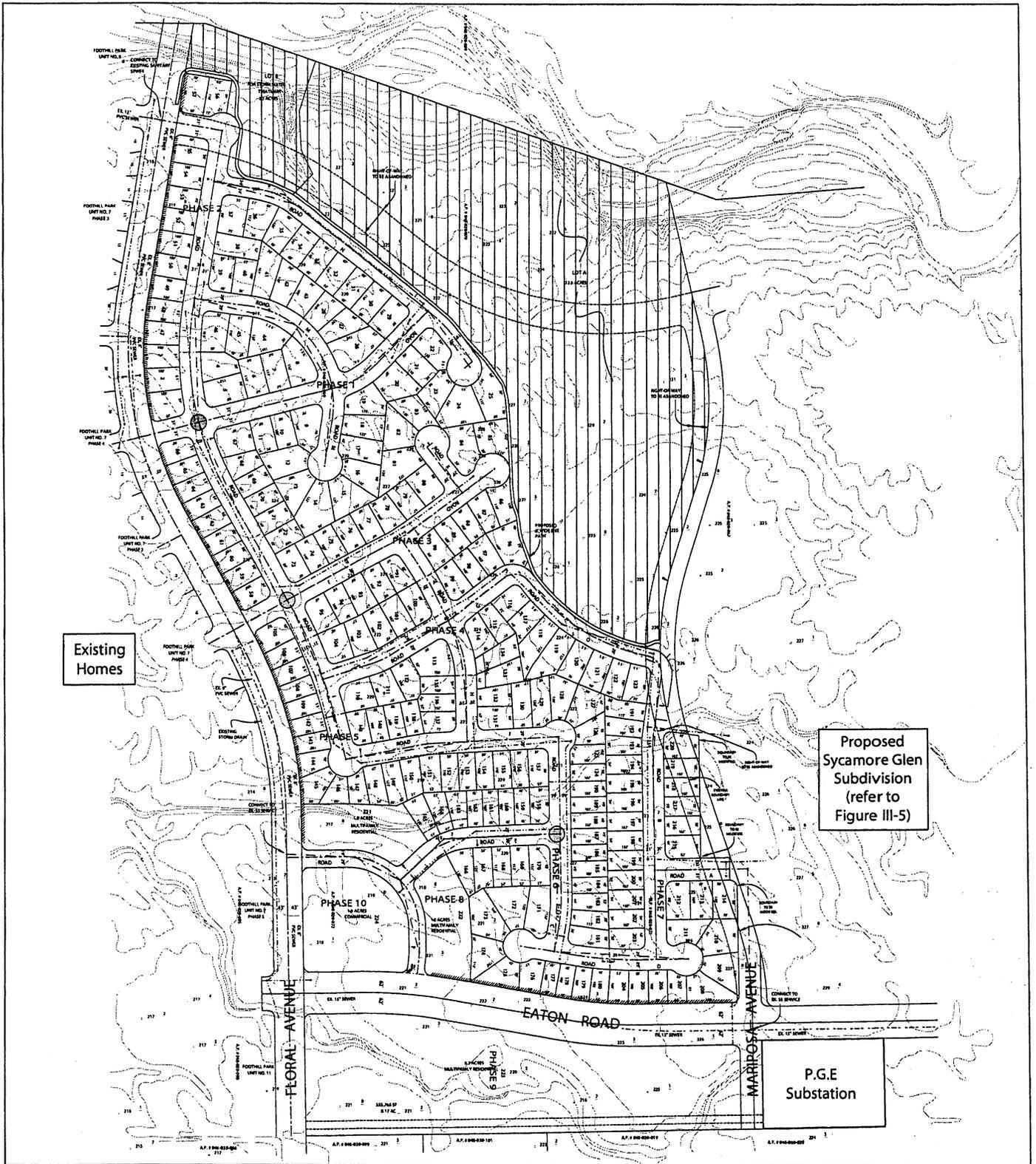


-  PROPOSED ZONE CHANGE TO OS1 - RM
-  PROPOSED ZONE CHANGE FROM R1 TO R3 / GENERAL PLAN AMENDMENT FROM LOW DENSITY RESIDENTIAL TO MEDIUM-HIGH DENSITY RESIDENTIAL

Sycamore Glen/Mountain Vista EIR
 Sycamore Glen
 Vesting Tentative Map

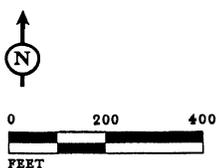
SOURCE: ROLLS, ANDERSON & ROLLS, 2002; LSA ASSOCIATES, INC., 2004

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LSA

FIGURE III-6



 PROPOSED ZONE CHANGE TO OSI - RM

Sycamore Glen/Mountain Vista EIR
 Mountain Vista
 Vesting Tentative Map

SOURCE: ROLLS, ANDERSON & ROLLS, 2002.
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IV. SETTING, IMPACTS AND MITIGATION MEASURES

This chapter contains an analysis of each potentially significant environmental issue that has been identified in the Notice of Preparation (NOP) in addition to the topics added in response to comments received on the NOP prepared for the project. Sections A through K of this chapter describe the environmental setting of the project site as it relates to each specific issue. The environmental impacts resulting from implementation of the proposed project and mitigation measures that would reduce environmental impacts of the project, if necessary, are also presented in each of the sections.

DETERMINATION OF SIGNIFICANCE

Under CEQA, a significant effect is defined as "...a substantial, or potentially substantial, adverse change in any of the physical conditions within the area affected by the project including land, air, water, minerals, flora, fauna, ambient noise, and objects of historic or aesthetic significance."¹ The *CEQA Guidelines* direct that this determination be based on scientific and factual data. Each impact and mitigation measure section of this chapter is prefaced by a summary of criteria of significance. These criteria have been developed using the *CEQA Guidelines*, the *City of Chico General Plan*, and other applicable standards and policies.

1. Issues Addressed in the Draft EIR

The following environmental issue areas are addressed in this chapter:

- A. Aesthetics
- B. Air Quality
- C. Biological Resources
- D. Cultural Resources
- E. Hazards and Hazardous Materials
- F. Hydrology
- G. Land Use and Planning
- H. Noise
- I. Public Services
- J. Transportation and Circulation
- K. Utilities

Topics excluded from detailed analysis in this EIR Chapter include agricultural resources; geology; mineral resources; population and housing; and recreation, as described in Chapter VI.E, Effects Found Not To Be Significant. Consequently, these issues are not examined in this chapter of the EIR.

¹ Remy, Thomas, Moos, and Manley, *Guide to the California Environmental Quality Act*, 1999, p. 158: Public Resources Code 15382; Public Resources Code 21068.

2. Format of Issue Sections

Each environmental issue area discussed in this chapter is comprised of two primary sections: (1) Setting, and (2) Impacts and Mitigation Measures. The analysis of each environmental topic is preceded by a brief discussion of the specific issues that were identified as potentially significant and are therefore the subject of analysis in the Draft EIR, as determined by the Initial Study, comments received in response to the NOP, and the City's identification of other potential environmental effects. An overview of the general organization and the information provided in the two sections is provided below:

- *Setting.* The Setting section for each environmental topic provides a general description of the applicable physical setting for the project site and its surroundings (e.g., existing land uses, existing soil conditions, existing traffic conditions). An overview of regulatory considerations that are applicable to the specific environmental topic is also provided.
- *Impacts and Mitigation Measures.* The Impacts and Mitigation Measures section for each environmental topic presents a discussion of the impacts that could result from implementation of the proposed project. The section begins with the criteria of significance, which are thresholds to determine whether an impact is significant. The latter part of this section describes the impacts from the proposed project and mitigation measures, if required.

Impacts are numbered and shown in bold type, and the corresponding mitigation measures are numbered and indented. Impacts and mitigation measures are numbered consecutively within each topic and begin with an acronymic reference to the impact section (e.g., LU). The following symbols are used for individual topics:

| | |
|--------|---------------------------------|
| AES: | Aesthetics |
| AIR: | Air Quality |
| BIO: | Biological Resources |
| CULT: | Cultural Resources |
| HAZ: | Hazards and Hazardous Materials |
| HYD: | Hydrology |
| LU: | Land Use and Planning |
| NOISE: | Noise |
| PS: | Public Services |
| TRANS: | Transportation and Circulation |
| UT: | Utilities |

The environmental impacts of the proposed project are delineated into separate categories based on their significance according to the criteria listed in each topical section: less-than-significant impacts, which do not require mitigation measures, and significant impacts, which do require mitigation measures if feasible.

Following each impact is a finding designating whether the identified mitigation measure(s) would reduce the impact to a less-than-significant level or remain significant. The level of significance after mitigation is then categorized by type of impact, as follows: Less-Than-Significant (LTS), Significant (S), and Significant and Unavoidable (SU).

The project's contribution to cumulative effects is also discussed at the end of each topical section. This analysis is conducted consistent with Section 15130 of the *CEQA Guidelines*,

which require that an EIR evaluate the potential environmental impacts that may be individually limited but could be cumulatively considerable when combined with the environmental impacts from other projects.

CEQA defines cumulative impacts as “two or more individual effects which, when considered together, are considerable, or which can compound or increase other environmental impacts.” Section 15130 of the *CEQA Guidelines* requires that an EIR evaluate potential environmental impacts that are individually limited but cumulatively considerable. These impacts can result from the proposed project alone, or together with other projects. “The cumulative impact from several projects is the change in the environment which results from the incremental impact of the project when added to other closely related past, present, and reasonably foreseeable probable future projects.”

When evaluating cumulative impacts, CEQA allows the use of either a list of past, present, and probable future projects, including projects outside the control of the (lead) agency, or a summary of projections in an adopted planning document. Generally, this EIR bases its cumulative analysis on the buildout of the City’s adopted General Plan.

A. AESTHETICS

This section analyzes the potential aesthetic impacts of the proposed project. The analysis compares existing visual and lighting conditions with probable future developed conditions for the project site.

1. Existing Environmental Setting

The discussion below describes the existing visual/aesthetic characteristics of the project site and its vicinity. Policies from the City's General Plan that relate to aesthetics and are applicable to the project site and/or proposed project are also described.

a. On-Site Visual Elements. The project site is undeveloped land with seasonal vernal pools and swales amid grassland. The terrain is predominantly flat. The majority of the site slopes gently to the west, except for the extreme north portion of the site which slopes north toward Sycamore Creek. There are scattered trees in the north portion of the site along the creek bank. Unauthorized off-highway vehicle (OHV) use has resulted in dirt roads across the site. Illegal dumping of appliances, furniture and other waste is evident on the site adjacent to the dirt roads.

b. Off-Site Visual Elements. The project site is surrounded on three sides (east, west, and south) by residential development primarily composed of single-family homes. Large, planned subdivisions are located to the east and west, while smaller, infill residential development projects are occurring to the south. Land use to the north is open space. Multi-family residential housing is located west of the site at the intersection of Floral Avenue and Eaton Road. In addition to scattered residential development, several greenhouse structures and a wireless tower are visible from the site to the southeast of the substation.

The PG&E Sycamore Creek Substation is located near the south-central portion of the site, at the southeast corner of the planned Eaton Road and Mariposa Avenue intersection. Electric power lines run east and west from the substation along the southern end of the project site, within a PG&E easement.

c. Publicly Accessed Viewsheds. Public viewsheds are those originating from a vantage point off-site that is accessible to the general public. They comprise the man-made and natural landscape elements and topographic features between the viewer and the area being viewed. The viewshed is everything that can be seen from selected viewpoints looking toward the project site, although each viewshed contains different elements due to the viewer's individual vantage point.

The City of Chico General Plan designates linear parks, or greenways, along the creeks that pass through the community. The greenways are intended to provide visual and physical contrast with developed lands, protect the unique habitats along the creeks, and provide routes for pedestrian and bicycle trails. One such planned greenway borders Sycamore Creek, along the north side of the project site. Also, the Foothill Park East bikepath runs north/south from Sycamore Creek, parallel to Ceanothus Avenue. Connections to the greenways are located at the north end of Floral Avenue and at the north end of Ceanothus Avenue.

The general public has vantage points of the project site from adjacent areas, including vantage points along Floral Avenue, Ceanothus Avenue, and Eaton Road where it terminates at the project site. Views of the project site are available from the public streets of the residential subdivisions

located to the south, east and west. Four vantage points have been selected as representative locations to describe views toward the project site. These points represent prominent locations from which the public (as either motorists or pedestrians) will observe site transformation from construction through completion of the project.

Figure IV.A-1, Viewshed Locations, is an aerial view of the project site and its immediate environs designating the four view locations analyzed in this report and the viewshed representing the direction of view. The four locations are: 1) Floral Avenue near East Lassen Avenue, 2) intersection of Eaton Road and Floral Avenue, 3) the intersection of Mariposa Avenue and the planned extension of Eaton Road, and 4) the Foothill Park East bikepath entrance at Ceanothus Avenue.

d. Policy Standards. Citywide objectives and policies that may apply to the visual aspects of project site development from the Community Design Element of the General Plan are as follows:

Guiding Policies: City Form

- CD-G-5 Make improvements to the major corridors traversing the city to heighten their visibility and accessibility.
- CD-G-6 Design street and creekside improvements in consideration of their hierarchical role and function within the larger system.
- CD-G-10 Heighten the visual prominence of the creek corridors which help to establish a sense of orientation and identity within the city.
- CD-G-11 Open up creeks to public views and access.
- CD-G-12 Extend the amenity value of the creeks.

Guiding Policies: Open Space

- OS-G-14 Preserve and enhance Chico's creeks and the riparian corridors adjacent to them as open space corridors for the visual amenity, drainage, fisheries, wildlife habitats, flood control and water quality value.
- OS-G-15 Where feasible, integrate creekside greenways with the City's open space system and encourage public access to creek corridors.

2. Impacts and Mitigation Measures

- a. Criteria of Significance.** The project would have significant aesthetic impacts if it would:
- Have a substantial adverse effect on a scenic vista;
 - Substantially degrade the existing visual character or quality of the site and its surroundings;
 - Substantially damage a significant scenic resource, including but not limited to significant trees, rock outcroppings, and historic buildings; or

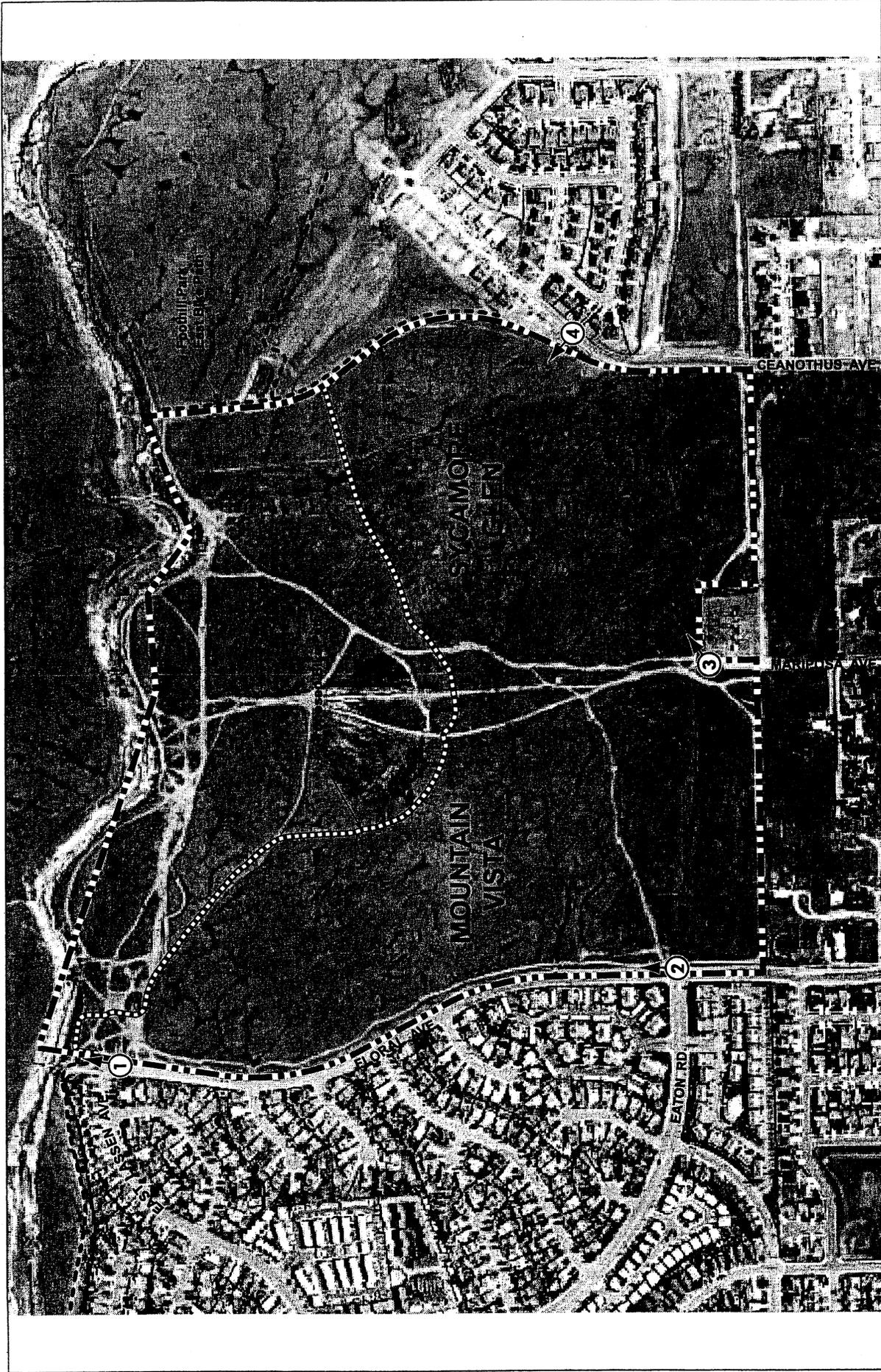


FIGURE IV.A-1

Sycamore Glen/Mountain Vista EIR
Viewshed Locations

LSA

- LEGEND
- ③ VIEWSHED LOCATIONS
 - PROJECT BOUNDARY
 - PROPOSED BIKE PATHS
 - - - - - EXISTING BIKE PATHS



SOURCE: LSA ASSOCIATES, INC., 2003

I:\GRAPHICS\JOBS\CH330 SYCAMORE GLEN\FIGURES\FIG_IVA1.A1 (07/19/04)

- Create a new source of substantial light or glare which would adversely effect day or nighttime views in the area.

b. **Less-than-Significant Impacts.** Implementation of the project would result in the following less-than-significant impacts.

(1) **Short-Term Impacts.** Implementation of the proposed project would result in short-term visual impacts during the construction phase. The construction area would be fenced, limiting public access to the portion of the site under construction. Also, fences would limit construction vehicles to the construction area and protect the open space area planned for preservation. The portion of the site not considered open space would then be cleared of vegetation and graded for the installation of building pads, site utilities and other features. Construction would commence next, followed by landscaping of the site. Development and construction of the site would alter the viewsheds during the short-term. However, impacts occurring during the short term are temporary in nature and therefore considered less than significant.

(2) **Long-Term Impacts.** Implementation of the project will permanently change the visual character of the site. The following discussion describes the visual change that would result from implementation of the project.

Project Site. The General Plan does not designate scenic vistas in the project area; therefore, the project would not create any adverse effects on any designated scenic vistas. The character of the project site will change from an undeveloped site with grasslands and vernal pools and swales to one that is developed with single- and multi-family housing, commercial uses, and preserved open space. Because the site is relatively flat, topography on the project site will not be substantially altered by the project development.

The site's most scenic visual resources are located at the northern portion of the site, along Sycamore Creek. The creek banks provide topographical relief and views of and from the site. A few large trees are located in the creek drainage and vicinity. While this northern portion of the site is planned as open space, three storm water treatment basins would be located along the north boundary of the project site adjacent to Sycamore Creek. One would be located at the northwest corner, a second at the center of the site, and a third at the northeast corner of the project site. The creek and its banks may be altered by drainage systems associated with these treatment basins. The proposed basins and their outlets to the creek could degrade the views of the open space areas planned for preservation. However, because the detention basins would constitute a small portion of the total open space area planned for preservation, visual impacts from the planned structures would not be considered to substantially degrade the existing visual character of the site.

Building pads would be created for individual homes, and drainage channels would be created to convey runoff to Sycamore Creek. The proposed Eaton Road extension would traverse the south portion of the site. A bike path would be located along the length of the open space area, adjacent to the perimeter of the subdivision. The northern one-third to one-half of the project site (e.g., area with highest visual quality) would be preserved as open space.

Due to the surrounding residential development to the east, west, and south, the project is considered infill development. Likewise, the site has been planned for urban/residential uses with expectations

of development over the long-term. Visual change from undeveloped open space to urban development has been contemplated in the General Plan supporting the infill concept. While no building elevations have been proposed, the future residential structures that would occupy the site are assumed to be similar to the surrounding single- and multi-family structures to the east, west, and south. As such, development of the project would not substantially degrade the existing visual character or quality of the site and its surroundings. Landscaping is expected to be similar to the surrounding single- and multi-family structures to the east, west, and south. Existing viewpoints of the project site, essentially the same types of housing, would not be significantly altered by the proposed project. Due to the similarity of the proposed project to surrounding uses, the project would not be expected to substantially degrade the existing visual character or quality of the site and its surroundings.

Public Viewsheds. Implementation of the project would result in changes to views from adjacent public vantage points. The permanent changes that would occur to four selected vantage points are generally described below.

Viewpoint 1.

Existing View. This view looks north from the intersection of Floral Avenue and East Lassen Avenue toward the undeveloped open space north of the project site and Sycamore Creek. The existing bike path along Sycamore Creek that connects to Floral Avenue is visible in the view. Distant tree covered foothills are visible at the horizon (see Figure IV.A-2).

Post-Project View. Implementation of the project would result in views of a home or homes on the far right side of the foreground which would block some of this view. Also, this intersection would be reconfigured; East Lassen Avenue would extend east and provide vehicular access to the project's street system. A view corridor as wide as the Floral Avenue right-of-way would remain open, permitting views to the north. However, this existing view, which provides sweeping views from Floral Avenue where the bike path is visible, to the north and east, would be substantially reduced.

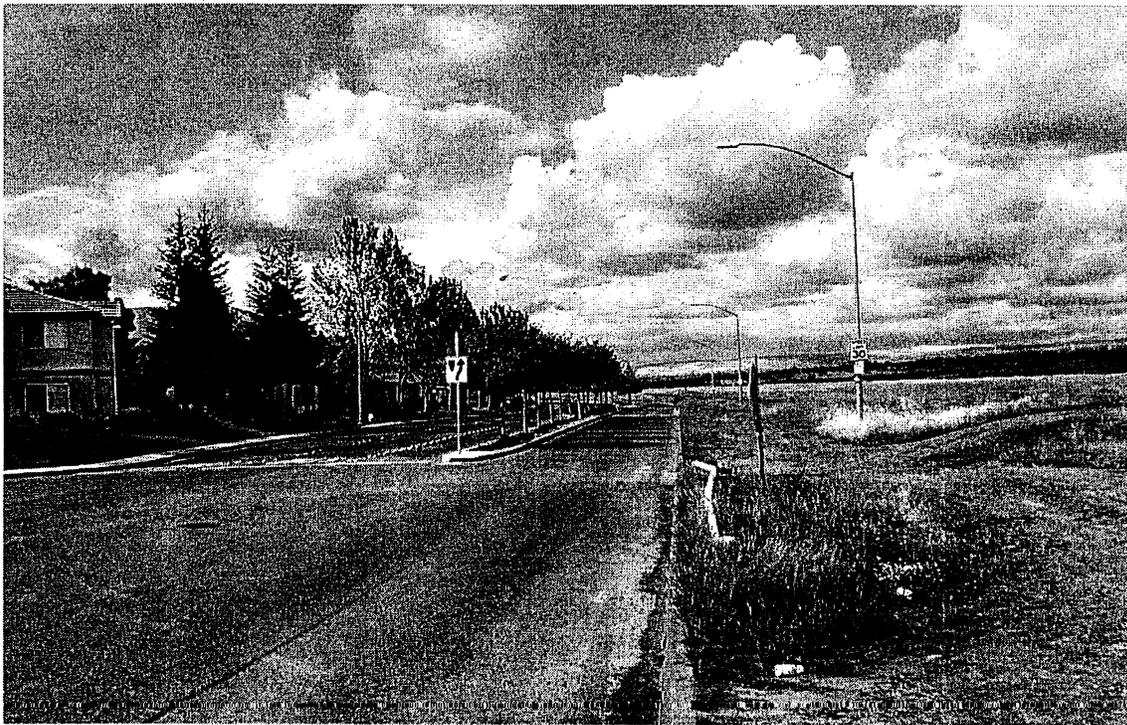
Viewpoint 2.

Existing View. This view faces north from the intersection of Eaton Road and Floral Avenue. The undeveloped project site is visible on the east side of Floral Avenue, while multi-family residential uses are visible on the west side of the street. Distant foothills are visible to the north (see Figure IV.A-2).

Post-Project View. Upon completion of the proposed project, views of the project site would change substantially. The foreground of this view would become the signalized intersection of Floral Avenue and Eaton Road. Because the northeast corner of Floral Avenue and Eaton Road is planned as a 1.9-acre commercial site, it would probably be developed as a typical strip commercial center, which would include a parking lot and a 25,000 square foot retail building. The Chico General Plan Community Design Element encourages parking at rear and buildings close to street. Commercial signage on the buildings and along the street would be visible. Further north on Floral Avenue, north of the commercial site, residential buildings similar to the surrounding area would be visible. Landscaping along Floral Avenue would soften the linear character of the streetscape, as can be seen on the west side of the street. Views to the west would remain unchanged.



Viewshed 1: View looking north from Floral Avenue near East Lassen Avenue.



Viewshed 2: View looking north from intersection of Eaton Road and Floral Avenue.

LSA

FIGURE IV.A-2

Sycamore Glen/Mountain Vista EIR
Viewsheds

Viewpoint 3.

Existing View. The current view of the project site looking east from the intersection of Mariposa Avenue and the planned extension of Eaton Road includes the undeveloped project site, single-family residential development to the east of the project site, the PG&E substation to the south of the project site, and foothills in the distance (see Figure IV.A-3).

Post-Project View. Upon completion of the proposed project, views from this location would include Eaton Road, as well as landscaping along the sidewalk adjacent to Eaton Road. A 6-foot-tall sound wall would be located at the perimeter of the right-of-way, behind the landscaping setback. Landscaping of the streetscape would be expected to minimize the visual effect of the sound walls. Rooftops and rear views of one- and two-story single-family residences would be visible from behind a perimeter wall located on the north side of Eaton Road. The PG&E substation on the south side of Eaton Road would be partially obscured with landscaping (which would help to soften views of this facility), and the distant foothills would be completely obscured by the residential development on the project site.

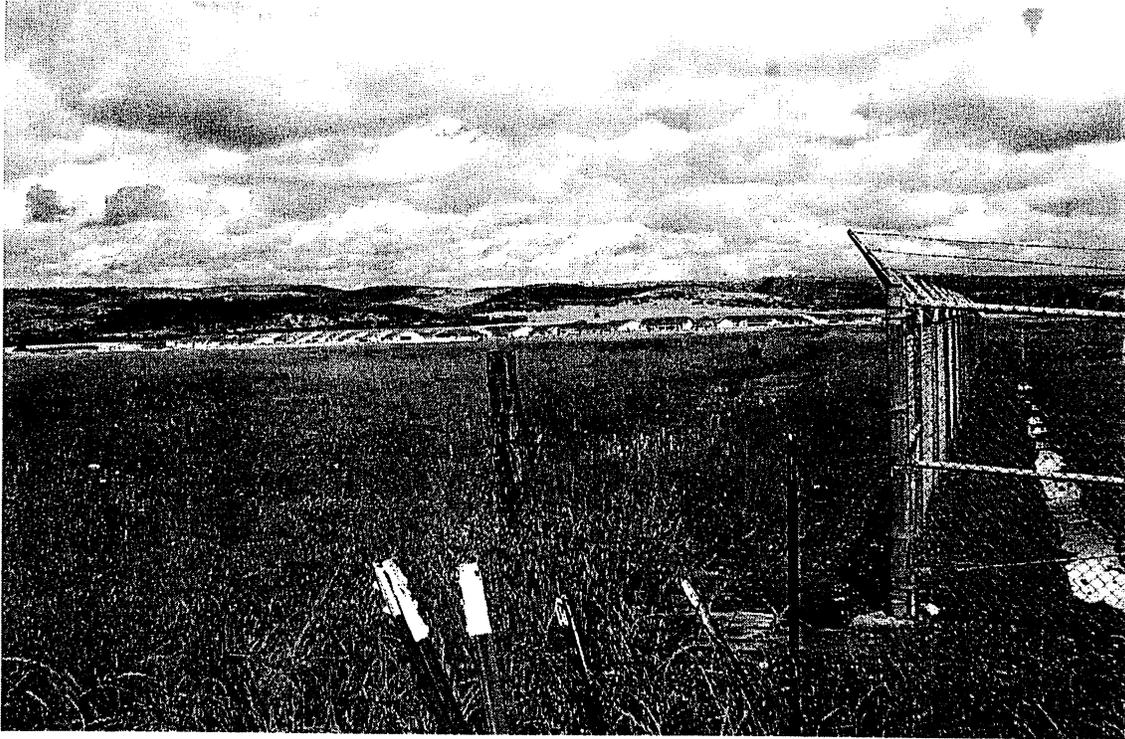
Viewpoint 4.

Existing View. The current view of the project site looking northwest from the Foothill Park East bike path entrance includes the bike path, landscaping on either side of the path, a fenced residential property to the east, open grassland space to the north, and trees in the distance (see Figure IV.A-3).

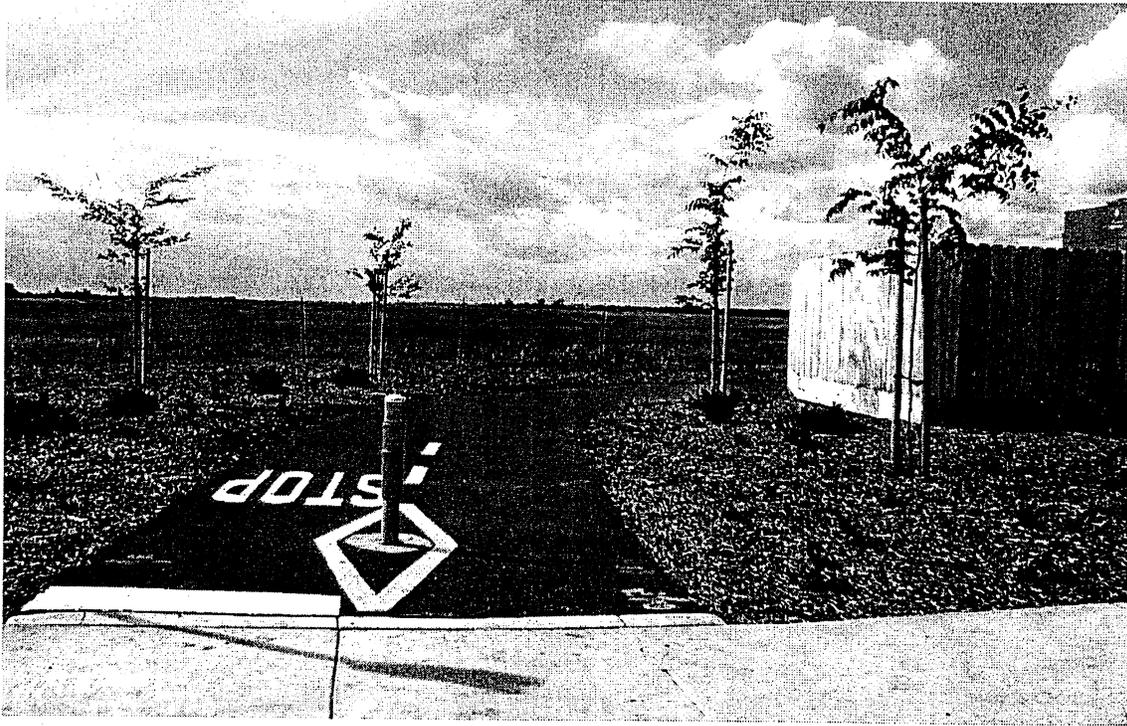
Post-Project View. Implementation of the project would result in altered views at this location. The Foothill Park East bike path entrance would be relocated north to accommodate the new Road J, which would connect from Ceanothus Avenue and provide access to the project site. A new curb cut would provide access to the bike path on the east side of Road J. Landscaping adjacent to the existing bike path would be replaced by the road. Road H and Road I would bisect Road J, and single-family residences lining these new roads would be visible. The fenced residential property to the east would remain. Distant views would be obscured by the residential development on the site. However, the project provides for a single-loaded street along a portion of the creek, as well as a cul-de-sac that ends at the creek, to provide some views into open space. A bike path, which also provides views to open space, is included in the project.

In conclusion, while the development of the project site would change current views of the site, the change does not represent a significant impact to public vantage points. The project would allow permanent views of the open space on the northern one-third of the site through the extension of the Sycamore Creek bike path along the perimeter of the development. Also, single-loaded streets and cul-de-sacs along the northern perimeter of the project would have open view fencing that would permit public views of the preserve area.

Lighting and Glare. Because the project is a tentative subdivision map, specific lighting has not been proposed at this time. Lighting is expected to be similar to that in the surrounding developments and would be in accordance with the City's adopted subdivision design standards. However, lighting at the commercial facility at the corner of Floral Avenue and Eaton Road would be brighter, consistent with other neighborhood commercial uses in the City. Illuminated signs would also be



Viewshed 3: View looking northeast from Manzanita Avenue and future extension of Eaton Road.



Viewshed 4: View looking north from Foothill East bikepath connection on Ceanothus Avenue.

LSA

FIGURE IV.A-3

Sycamore Glen/Mountain Vista EIR
Viewsheds

part of the commercial center. Lighting for this commercial use could substantially change the character of the area, because there are no other commercial uses in the vicinity. However, compliance with City's light standards Chapter 19.60 of the municipal code would reduce impacts to a less-than-significant level. Chapter 19.60 of the municipal code requires that exterior lighting be architecturally integrated with the character of all structures, energy efficient, and shielded or recessed so that direct glare and reflections are confined to the maximum extent feasible, within the boundaries of the site, directed downward and away from adjacent properties and public rights of way. Additionally, all lighting fixtures are required to be appropriate in scale, intensity, and height to the use they are serving. In addition, lighting proposed for the commercial center would be subject to review and approval by the Architectural Review Board.

c. Significant Impacts and Mitigation Measures. The proposed project would not result in any significant aesthetic impacts; therefore, no mitigation measures are required.

d. Cumulative Impacts. The proposed project, together with the surrounding development, would contribute to the continued urbanization of the northeast Chico area. Because the project proposes an infill development of a site consistent with the General Plan and that is substantially surrounded by existing residential development, the project's contribution to the change in the visual character or light and glare of the area is not considered to be cumulatively significant.

B. AIR QUALITY

This section has been prepared using methodologies and assumptions recommended in the air quality impact assessment guidelines of the Butte County Air Quality Management District (BCAQMD).¹ In keeping with these guidelines, this chapter describes existing air quality, short-term impacts from construction, impacts of future traffic on local carbon monoxide levels, and impacts of land use related vehicular emissions that have regional effects. Mitigation measures to reduce or eliminate potentially significant air quality impacts are identified, where appropriate.

1. Setting

a. Air Pollution Climatology. A region's topographic features have a direct correlation with air pollution flow; therefore, they are used by the California Air Resources Board (CARB) to determine the boundary of air basins. A local air district is then formed for each air basin; the district is responsible for providing air quality strategies to bring the air basin into compliance with the National Ambient Air Quality Standards (NAAQS).

The project site is located within the Sacramento Valley Air Basin (Basin). The Basin includes the counties of Butte, Colusa, Glenn, Sacramento, Shasta, Sutter, Tehama, Yolo, and portions of Placer and Solano.

Summer conditions are typically characterized by high temperatures and low humidity, with prevailing winds from the south. Summer temperatures average approximately 90°F (32°C) during the day and 50°F (10°C) at night.

Winter conditions are characterized by occasional rainstorms interspersed with stagnant and sometimes foggy weather. Winter daytime temperatures average in the low 50s (10-12°C) and nighttime temperatures average in the upper 30s (2-4°C). During winter, north winds become more frequent, but winds from the south predominate. Rainfall occurs mainly from late October to early May, averaging 17.2 inches (43.7 cm) per year, but varies significantly each year.

The Sacramento Valley is shaped like an elongated bowl. Temperature inversion layers can clamp a lid on the bowl, allowing air pollution to rise to unhealthy levels. Weather conditions cause air pollution concentrations to fluctuate widely from day to day and season to season. Topography alone gives the Basin great potential for trapping and accumulating air pollutants. The strong inversions typical of the Basin summers are caused by subsidence, the slow sinking of air causing compressional warming. The surface inversions typical of winter are formed primarily at night as air is cooled when it comes in contact with the earth's cold surface. These are called radiation inversions.

Temperature inversions prevent pollutants from rising and being diluted vertically. Thus, pollutants remain trapped in the layer of air where people breathe. Summer subsidence inversions occur on over 90 percent of summer days; they persist throughout the day and tend to intensify during the afternoon. Winter radiation inversions occur on over 70 percent of winter nights, but are usually destroyed by daytime heating, bringing a rapid improvement in air quality by afternoon. Both types

¹ Butte County Air Quality Management District, 1997. *Indirect Source Review Guidelines.*

of inversion mechanisms may operate at any time of the year, and in the fall both may occur together to produce the heaviest pollution potential.

b. Ambient Air Quality Standards. Both the U.S. Environmental Protection Agency and the California Air Resources Board have established ambient air quality standards for common pollutants. These ambient air quality standards are levels of contaminants which represent safe levels that avoid specific adverse health effects associated with each pollutant. The ambient air quality standards cover what are called “criteria” pollutants because the health and other effects of each pollutant are described in criteria documents.

The federal and State ambient air quality standards are summarized in Table IV.B-1 for criteria pollutants. The federal and State ambient standards were developed independently with differing purposes and methods, although both processes aim to prevent health-related effects. As a result, the federal and State standards differ in some cases. In general, the State standards are more stringent. This is particularly true for ozone and PM₁₀.

Table IV.B-1: Federal and State Ambient Air Quality Standards

| Criteria Pollutant | Averaging Time | Federal Primary Standard | State Standard |
|--------------------|----------------|--------------------------|----------------------|
| Ozone | 1-hour | 0.12 ppm | 0.09 ppm |
| | 8-hour | 0.08 ppm | -- |
| Carbon Monoxide | 1-hour | 35.0 ppm | 20.0 ppm |
| | 8-hour | 9.0 ppm | 9.0 ppm |
| Nitrogen Dioxide | Annual | 0.053 ppm | -- |
| | 1-hour | -- | 0.25 ppm |
| Sulfur Dioxide | Annual | 0.03 ppm | -- |
| | 24-hour | 0.14 ppm | 0.04 ppm |
| | 1-hour | -- | 0.25 ppm |
| PM ₁₀ | Annual | 50 µg/m ³ | 20 µg/m ³ |
| | 24-hour | 150 µg/m ³ | 50 µg/m ³ |
| PM _{2.5} | Annual | 15 µg/m ³ | 12 µg/m ³ |
| | 24-hour | 65 µg/m ³ | -- |

Source: California Air Resources Board, 2003, *Ambient Air Quality Standards*.

The U.S. Environmental Protection Agency established new national air quality standards for ground-level ozone and for fine particulate matter (particulate matter 2.5 microns or less in diameter, or PM_{2.5}) in 1997. On May 14, 1999, the U.S. Court of Appeals (USCA) for the District of Columbia Circuit found that the Clean Air Act, which the EPA relied on in formulating the new NAAQS, “effects an unconstitutional delegation of legislative power.” On February 27, 2001, the U.S. Supreme Court upheld the way the government sets air quality standards under the CAA. The court unanimously rejected industry arguments that the EPA must consider financial cost as well as health benefits in writing standards. The justices also rejected arguments that the EPA took too much lawmaking power from Congress when it set tougher standards for ozone and soot in 1997. Nevertheless, the court threw out the EPA’s policy for implementing new ozone rules, saying that the agency ignored a section of the law that restricts its authority to enforce such rules.

In April 2003, the EPA was cleared by the White House Office of Management & Budget (OMB) to implement the eight-hour ground-level ozone standard. The EPA issued the proposed rule implementing the eight-hour ozone standard in April 2003, and plans to issue the final rule implementing the eight-hour ozone standard in December 2003. The EPA is required by court order to complete final eight-hour ozone nonattainment status by April 15, 2004.

The EPA plans to propose a PM_{2.5} implementation rule in September 2003 and issues the final PM_{2.5} implementation rule in September 2004. The EPA is then expected to make final designations on December 15, 2004.

In addition to the criteria pollutants discussed above, Toxic Air Contaminants (TACs) are another group of pollutants of concern. TACs are injurious in small quantities and are regulated despite the absence of criteria documents. The identification, regulation and monitoring of TACs is relatively recent compared to that for criteria pollutants.

In 1998 the CARB identified particulate matter from diesel-fueled engines as a toxic air contaminant. CARB has completed a risk management process that identified potential cancer risks for a range of activities using diesel-fueled engines.² High volume freeways, stationary diesel engines and facilities attracting heavy and constant diesel vehicle traffic (distribution centers, truckstop) were identified as having the highest associated risk. The following types of facilities have been identified as having the potential for exposing sensitive receptors to high levels of diesel exhaust:

- Truck Stop
- Warehouse/Distribution Center
- Large retail or industrial facility
- High volume transit center
- School with high volume of bus traffic
- High volume highway
- High volume arterial/roadway with high level of diesel traffic

Health risks from Toxic Air Contaminants are a function of both concentration and duration of exposure.

c. Current Air Quality. The BCAQMD monitors air quality at several locations within the Basin. The closest multi-pollutant monitoring site to the project site is located in Chico. Table IV.B-2 summarizes exceedances of State and federal standards at this monitoring site during the period 2000-2002. Table IV.B-2 shows that the one-hour ozone and 24-hour PM₁₀ exceeded the State standards, and eight-hour ozone and PM_{2.5} exceeded the federal standards in the project area.

Both ozone and PM₁₀ are considered regional pollutants in that concentrations are not determined by proximity to individual sources, but show a relative uniformity over a region.

Carbon monoxide—a colorless, odorless, poisonous gas—is a local pollutant (i.e., high concentra-

Table IV.B-2: Summary of Air Quality Data for Chico Monitoring Station

| Pollutant | Standard | Days Exceeding Standard in: | | |
|-------------------|----------------------|-----------------------------|------|------|
| | | 2000 | 2001 | 2002 |
| Ozone | Federal 1-hour | 0 | 0 | 0 |
| | State 1-hour | 1 | 1 | 2 |
| | Federal 8-hour | 0 | 2 | 0 |
| Carbon Monoxide | State/Federal 8-hour | 0 | 0 | 0 |
| Nitrogen Dioxide | State 1-hour | 0 | 0 | 0 |
| PM ₁₀ | Federal 24-hour | 0 | 0 | 0 |
| | State 24-hour | 9 | 5 | 3 |
| PM _{2.5} | Federal 24-hour | 2 | 0 | 1 |

Source: California Air Resources Board, Aerometric Data Analysis and Management System (ADAM), 2003.

² California Air Resources Board, *Risk Reduction Plan to Reduce Particulate Matter Emissions from Diesel-Fueled Engines and Vehicles*, October 2000.

tions are normally only found very near sources). The major source of carbon monoxide is automobile traffic. Elevated concentrations, therefore, are usually only found near areas of high traffic volumes.

d. Attainment Status. The federal Clean Air Act and the California Clean Air Act of 1988 require that the State Air Resources Board, based on air quality monitoring data, designate portions of the State where the federal or State ambient air quality standards are not met as “nonattainment areas”. Because of the differences between the national and State standards, the designation of nonattainment areas is different under the federal and State legislation.

The Basin has attained all federal standards with the exception of ozone. The Basin is currently in a preliminary nonattainment area for the federal PM_{2.5} standard. Under the California Clean Air Act, Butte County is a nonattainment area for ozone and PM₁₀. The county is either attainment or unclassified for other pollutants. The California Clean Air Act requires local air pollution control districts to prepare air quality attainment plans if any of the criteria pollutants does not attain the California standard. These plans must provide for district-wide emission reductions of five percent per year averaged over consecutive three-year periods or if not, provide for adoption of “all feasible measures on an expeditious schedule”.

e. Sensitive Receptor and Toxic Air Contaminant Sources. Sensitive receptors are defined as facilities where sensitive population groups (children, elderly, acutely and/or chronically ill) are likely to be located. These land uses include residences, schools, playgrounds, childcare centers, retirement homes, convalescent homes, hospitals, and medical clinics. There are currently no sensitive receptor locations immediately adjacent to the project site. However, residential developments have been planned along Eaton Road to the east and west, adjacent to the project site.

2. Impacts and Mitigation Measures

The project would affect air quality both during construction and operation. Operational impacts would be mainly indirect (related to attracted vehicle trips). The project would also result in diversion of traffic, which would affect air quality locally.

a. Criteria of Significance. The following guidelines have been established to define significant air quality impacts:

- Conflict with or obstruct implementation of an applicable air quality plan;
- Violate any air quality standard or contribute substantially to an existing or projected air quality violation;
- Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is in non-attainment under an applicable federal or State ambient air quality standard (including releasing emissions which exceed quantitative thresholds for ozone precursors);
- Expose sensitive receptors to substantial pollutant concentrations;
- Create objectionable odors affecting a substantial number of people; or
- Expose sensitive receptors or the general public to substantial levels of toxic air contaminants.

b. Less than Significant Impacts.

(1) **Carbon Monoxide Effects of Traffic.** A screening form of the CALINE-4 computer simulation model was applied to selected intersections near the project site. The model results were used to predict the maximum one- and eight-hour concentrations, corresponding to the one- and eight-hour averaging times specified in the State and federal ambient air quality standards for carbon monoxide. The screening model and the assumptions made in its use for this project are described in Appendix B of this EIR.

Table IV.B-3 shows the results of the CALINE-4 analysis for the peak one-hour and eight-hour traffic periods in parts per million (ppm). The one-hour values are to be compared to the federal one-hour standard of 35 ppm and the State standard of 20 ppm. The eight-hour values in Table IV.B-3 are to be compared to the State and federal standards of 9 ppm. Because new project traffic and diversion of traffic related to roadway modifications would not cause any new violations of the one-hour or eight-hour standards for carbon monoxide, nor contribute substantially to an existing or projected violation, project impacts on local carbon monoxide concentrations are considered to be less than significant.

(2) **Odor Impacts.** Though offensive odors from stationary sources rarely cause any physical harm, they still remain unpleasant and can lead to public distress generating citizen complaints to local governments. The occurrence and severity of odor impacts depend on the nature, frequency and intensity of the source; wind speed and direction; and the sensitivity of receptors. Odor impacts should be considered for any proposed new odor sources located near existing receptors, as well as any new sensitive receptors located near existing odor sources. Generally, increasing the distance between a receptor and the source to an acceptable level will mitigate odor impacts. No new stationary odor sources are proposed as part of the proposed project. In addition, there are no existing odor sources adjacent to the project site. Therefore, there would be no odor-related impacts on sensitive receptors.

(3) **Local Plan Consistency.** An Air Quality Attainment Plan (AQAP) describes air pollution control strategies to be taken by a city/county or region classified as a nonattainment area. The main purpose of an AQAP is to bring the area into compliance with the requirements of federal and State air quality standards. The California Environmental Quality Act (CEQA) requires that certain proposed projects be analyzed for consistency with the AQAP. The AQAP uses the assumptions and projections of local planning agencies to determine control strategies for regional compliance status. Since the AQAP is based on local General Plans, projects that are deemed consistent with the General Plan are usually found to be consistent with the AQAP. The proposed project has been determined to be consistent with the City's General Plan. Therefore, implementation of the project will not conflict with the AQAP, and no significant impacts will result.

c. Significant Impacts and Mitigation Measures.

Impact AIR-1: Demolition and construction period activities could generate significant dust, exhaust, and organic emissions. (S)

Construction activities are a source of organic gas emissions. Solvents in adhesives, non-waterbased paints, thinners, some insulating materials and caulking materials would evaporate into the

Table IV.B-3: Worst Case Carbon Monoxide Concentrations Near Selected Intersections (ppm)

| Intersection | Existing (2003) | | Existing + Project (2003) | | Cumulative (2020) | | Cumulative + Project (2020) | |
|------------------------------|-----------------|------|---------------------------|------|-------------------|------|-----------------------------|------|
| | 1-Hr | 8-Hr | 1-Hr | 8-Hr | 1-Hr | 8-Hr | 1-Hr | 8-Hr |
| Cohasset Road/Eaton Road | 7.3 | 5.1 | 8.4 | 5.8 | 6.0 | 4.2 | 6.3 | 4.4 |
| Floral Road/Eaton Road | 6.9 | 4.8 | 8.5 | 5.9 | 6.1 | 4.2 | 6.4 | 4.4 |
| Floral Road/East Avenue | 7.6 | 5.3 | 9.1 | 6.3 | 5.9 | 4.1 | 6.2 | 4.3 |
| Mariposa Avenue/East Avenue | 7.7 | 5.3 | 9.2 | 6.4 | 5.9 | 4.1 | 6.2 | 4.3 |
| Ceanothus Avenue/East Avenue | 7.2 | 5.0 | 8.1 | 5.6 | 5.9 | 4.1 | 6.0 | 4.2 |

Source: LSA Associates, Inc., 2003.

atmosphere and would participate in the photochemical reaction that creates urban ozone. Asphalt used in paving is also a source of organic gases for a short time after its application.

a. Equipment Exhausts. Construction activities would generate combustion emissions from utility engines, on-site heavy-duty construction vehicles, equipment hauling materials to and from the site, and motor vehicles transporting the construction crew. Exhaust emissions during the construction activities envisioned on-site would vary daily as construction activity levels change. The use of construction equipment would result in localized exhaust emissions. The type and number of equipment used during construction have been specified based upon typical construction methods for the proposed development. Emissions associated with the construction of the new buildings have been estimated, and are shown in Table IV.B-4.

b. Fugitive Dust. Fugitive dust emissions are generally associated with demolition, land clearing, exposure, and cut and fill operations. Dust generated daily during construction would vary substantially, depending on the level of activity, the specific operations, and weather conditions. Nearby sensitive receptors and on-site workers may be exposed to blowing dust, depending upon prevailing wind conditions.

PM₁₀ emissions from site clearance/grading operations during a peak construction day are based on assumptions and past experience on similar sized projects. Each acre of graded surface creates about 26.4 pounds of PM₁₀ per workday during the construction phase of the project and 21.8 pounds of PM₁₀ per hour from dirt/debris pushing per dozer.³ The entire site is not expected to be under construction at one time. It is assumed that up to 20 acres of land would be under construction or exposed on any one day. It is also assumed that two dozer would be used eight hours a day, together with other equipment. Therefore, a maximum of 877 pounds of PM₁₀ per day would be generated from soil disturbance, without mitigation, during the construction phase. This level of dust emission would exceed the BCAQMD threshold of 137 pounds per day.

³ South Coast Air Quality Management District, 1996. *CEQA Handbook*.

Table IV.B-4: Emissions from Construction Equipment Exhaust

| Source | Hours/ Miles | Emissions (lbs/day) | | | | |
|--|-----------------|------------------------|-------------|-----------------|-----------------|------------------|
| | | CO | ROC | NO _x | SO _x | PM ₁₀ |
| 2 - Excavators | 8 | 15.8 | 1.4 | 33.8 | 2.8 | 1.3 |
| 2 - Dozers | 8 | 28.8 | 3.0 | 66.8 | 5.6 | 2.6 |
| 3 - Scrapers | 8 | 30.0 | 6.5 | 92.1 | 11.1 | 9.9 |
| 1 - Tracked Loader | 8 | 1.6 | 0.8 | 6.6 | 0.6 | 0.5 |
| 1 - Motor Grader | 8 | 1.2 | 0.3 | 5.7 | 0.7 | 0.5 |
| 1 - Water Truck | 30 miles | 1.2 | 0.1 | 0.5 | 0.0 | 0.0 |
| 30 - Haul Trucks | 40 miles | 17.2 | 2.9 | 25.0 | 0.0 | 1.8 |
| 24 - Worker Trips | 40 miles | 7.2 | 0.4 | 1.4 | 0.0 | 0.0 |
| Total | | 103.0 | 15.4 | 231.9 | 20.8 | 16.6 |
| BCAQMD Threshold Exceeds Threshold? | | N/A^a | 137 | 137 | N/A | 137 |
| | | N/A | NO | YES | N/A | NO |

^a The BCAQMD does not have emission thresholds for CO or SO_x

Source: LSA 2003; SCAQMD, *CEQA Air Quality Handbook*, 1993; and EPA, *AP-42, Fifth Edition*, 1995.

With the implementation of the standard conditions such as frequent watering (e.g., minimum twice a day), fugitive dust emissions from construction activities are expected to be reduced to 438 pounds or less per day, with 50 percent effectiveness. Combined with the 17 pounds per day generated by equipment exhaust, the total mitigated dust emission of 455 pounds per day would remain above the BCAQMD threshold of 137 pounds per day. Table IV.B-5 lists fugitive dust emissions and construction equipment exhausts. As shown, the NO_x and PM₁₀ construction emissions will exceed the BCAQMD thresholds on a daily basis.

During construction various diesel-powered vehicles and equipment would be in use. Construction diesel emissions are temporary, affecting an area for a period of days or perhaps weeks. Additionally, construction related sources are mobile and transient in nature. Typically health risk assessments are calculated using a 70-year lifetime exposure. Because of its temporary duration, health risks from construction emissions of diesel particulate would be less-than-significant impact.

The City's Grading Ordinance requires dust suppression measures to be included in all grading plans. To ensure that mitigation measures are implemented during construction activities for development of the site, Mitigation Measure AIR-1 is has been required.

Mitigation Measure AIR-1: The following mitigation measures will be included in all future construction plans and documents for the subject parcels to reduce construction-related air quality impacts, as required by General Plan policy and the Butte County Air Quality Management District:

- Water all active construction areas at least twice daily. The frequency should be based on the type of operation, soil conditions, and wind exposure.

Table IV.B-5: Peak Grading Day Emissions (lbs/day)

| Category | CO | ROC | NO _x | SO _x | PM ₁₀ |
|---|------------------|-----|-----------------|-----------------|------------------|
| Vehicle/Equipment Exhaust (Table IV.B-4) | 103 | 15 | 232 | 21 | 17 |
| Fugitive Dust from Soil Disturbance – No Mitigation | -- | -- | -- | -- | 877 |
| Fugitive Dust from Soil Disturbance – With Mitigation | -- | -- | -- | -- | 438 |
| Total Grading – No Fugitive Dust Mitigation | 103 | 15 | 232 | 21 | 894 |
| Total Grading – With Fugitive Dust Mitigation | 103 | 15 | 232 | 21 | 455 |
| BCAQMD Threshold | N/A ^a | 137 | 137 | N/A | 137 |
| Significant? (With Fugitive Dust Mitigation) | N/A | NO | YES | N/A | YES |

^a The BCAQMD does not have emission thresholds for CO or SO_x.

Source: LSA Associates, Inc., 2003.

- If necessary, apply chemical soil stabilizers to inactive construction areas (disturbed areas that are unused for at least four consecutive days) to control dust emissions. Dust emissions should be controlled at the site for both active and inactive construction areas throughout the entire construction period (including holidays).
- Limit vehicle speeds to 15 mph on unpaved roads.
- Suspend land clearing, grading, earth moving, or excavation activities when wind speeds exceed 20 mph.
- If applicable, apply non-toxic binders (e.g. latex acrylic copolymer) to exposed areas after cut and fill operation and hydroseed the area.
- Cover inactive storage piles.
- Project applicant shall consult with the Butte County Air Quality Management District about the application of a paved (or dust palliative treated) apron onto the project site.
- Sweep or wash paved streets adjacent to the site where visible silt or mud deposits have accumulated due to construction activities.
- Post a publically visible sign at the construction site with the name and telephone number of the person to contact regarding dust complaints. This person shall respond and take corrective action within 24 hours. The telephone number of the BCAQMD shall also be visible to ensure compliance with BCAQMD Rules 200 and 205 (Nuisance and Fugitive Dust Emissions).
- Prior to final occupancy, the applicant shall demonstrate that all ground surfaces are treated sufficiently to minimize fugitive dust emissions. Fugitive dust emissions are considered dust clouds caused by wind, traffic, or other disturbances to exposed ground surfaces.

Level of Significance After Mitigation: Implementation of the measures detailed above would help minimize this impact, but due to exceedance of BCAQMD thresholds would not reduce it to a less-than-significant level. (SU)

Impact AIR-2: Development of the proposed project will result in increased regional emissions of criteria air pollutants exceeding BCAQMD Thresholds. (S)

New emissions from the proposed project would be direct and indirect. Direct emissions consist of emissions from on-site combustion for space- and water-heating and other minor sources. The overwhelming source of emissions would be indirect (i.e., related to auto and truck traffic generated by project land uses).

The URBEMIS2002 model was used to calculate emissions from all trips to or from the project site. This analysis was based on the proposed land uses and assumed a year 2004 vehicle population.

Daily emissions generated by project vehicle use are shown in Table IV.B-6. Pollutants shown include reactive organic gases (ROG) and oxides of nitrogen (NO_x) (two precursors of ozone), and PM₁₀ (particulate matter, 10 micron or less in diameter). As shown, emissions associated with the proposed project would exceed the BCAQMD thresholds of significance for NO_x and ROG.

Table IV.B-6: Regional Emissions Generated by Project (lbs/day)

| Source | ROG | NO _x | PM ₁₀ |
|-------------------------|--------------|-----------------|------------------|
| Area Source Emissions | 33.8 | 7.4 | 0.0 |
| Vehicle Emissions | 113.5 | 191.2 | 100.5 |
| Total | 147.3 | 198.6 | 100.5 |
| BCAQMD Threshold | 137 | 137 | 137 |
| Significant? | YES | YES | NO |

Source: LSA Associates, Inc., 2003.

At buildout, development of the properties will result in indirect emissions from project-generated traffic and area sources such as natural gas combustion for space and water heating, landscape equipment, and consumer products. Projects with Level B impacts are required to coordinate with Planning Agencies to identify specific supplemental feasible mitigation measures to reduce levels of PM₁₀, ROG and NO_x. The project would incorporate the following transportation demand management features to help reduce levels of PM₁₀, ROG and NO_x that would be generated by indirect emissions from project-generated traffic: 1) pedestrian and bicycle facilities along Eaton Road as well as along the northern perimeter of the site, connecting with the existing Sycamore Creek bike path; 2) a neighborhood commercial center at the northeast corner of Eaton Road and Floral Avenue. While these measures would help to reduce air quality impacts, Mitigation Measure AIR-2 identifies additional mitigation measures that shall apply to development of the project.

Mitigation Measure AIR-2: To further reduce air quality impacts, the following supplemental mitigation measures shall be incorporated into the design of all future development projects on the subject parcels:

- Transit stops shall be provided along Eaton Road, in consultation with CATS (per Mitigation Measure TRANS-1).
- Utilize energy-efficient lighting and process systems.
- Utilize energy-efficient and automated controls for air conditioning.
- Utilize EPA Phase II certified wood burning devices.
- To the extent feasible, orient buildings and include landscaping (e.g. shade trees) to maximize natural cooling, and utilize centralized space and water heating and/or use of solar water heating.

Level of Significance After Mitigation: Implementation of the measures detailed above would help minimize this impact, but due to exceedance of BCAQMD thresholds for ROG and NO_x, would not reduce it to a less-than-significant level. (SU)

d. Cumulative Impacts. A number of individual projects in the Chico area may be under construction simultaneously with the proposed project. Depending on construction schedules and actual implementation of projects in the area, generation of fugitive dust and pollutant emissions during construction may result in substantial short-term increases in air pollutants. This would be a contribution to short-term cumulative air quality impacts. However, each individual project would be subject to the BCAQMD rule and regulations, and other mitigation requirements during construction process.

Currently, the Basin is in non-attainment for PM₁₀ and ozone. Construction of the proposed project, in conjunction with other planned developments within the cumulative study area and the subregion, would contribute to the existing non-attainment status. Thus, the proposed project would exacerbate nonattainment of air quality standards within the subregion and Basin and contribute to adverse cumulative air quality impacts. (SU)

C. BIOLOGICAL RESOURCES

This analysis summarizes the findings of the Biological Resources Evaluation prepared by LSA Associates, Inc. (October 2004). A copy of the Biological Resources Evaluation is included in Appendix C of the EIR.

1. Setting

a. Soils. Three soil types are mapped on the project site. The predominant soil type on the site is mapped as Retough-Redswale Complex, 0 to 3 percent slopes. The second soil type, Anita-Galt Complex, 0 to 3 percent slopes, is only mapped near the center of the site in the vicinity of a large, playa-like vernal pool. The third soil type, Wafap-Hamslough Complex, 0 to 2 percent slopes, is mapped in the intermittent drainage.

b. Habitat and Vegetation. The project site, excluding the right-of-way for Eaton Road, encompasses approximately 167.6 acres of predominantly flat terrain. An intermittent drainage (Sycamore Creek) flows along the northern boundary of the project site. Vegetation on the project site consists of grassland interspersed with northern hardpan vernal pools and swales. These habitats are described below. Figure IV.C-1 shows the habitat types.

(1) **Nonnative Grassland.** Nonnative grassland, which occurs over the majority of the project site, consists of annual grasses that are actively growing from fall through spring and drop seed with the onset of summer. Native annual wildflowers are often intermixed with nonnative grassland. Typical species include slender wild oat, soft chess, medusa head, little quaking grass, vinegar weed, goldfields, navarettia, miniature lupine, butter-and-eggs, and Fitch's tarweed.

(2) **Northern Hardpan Vernal Pool.** The Northern Hardpan Vernal Pool (NHVP) community on the project site consists of vernal pool and vernal swales. The project site supports mostly small to medium vernal pools. However, one pool in the central part of the site is quite large, similar to a playa pool. The majority of the pools have been disturbed by off-highway vehicle (OHV) use. Typical species occurring in the vernal pools include yellow carpet, Douglas' meadow-foam, coyote thistle, rayless goldfields, popcornflower, Mediterranean barley, annual hairgrass, and toad rush.

Areas potentially meeting the Corps of Engineers (Corps) jurisdictional criteria for wetlands include vernal pools and swales totaling 9.81 acres. Potential California Department of Fish and Game (CDFG) waters consist of Sycamore Creek along the northern boundary of the site. The total area of CDFG waters on the project site is 1.46 acres.

(3) **Intermittent Drainage.** Along the site's northern boundary is Sycamore Creek, a west-flowing intermittent drainage. Due to its meandering alignment, the majority of the drainage is outside the project site, but several small sections are within the boundaries of the site. The small sections of the drainage that occur within the project site carry intermittent flows and support little vegetation. Vegetation is limited to occasional Fremont cottonwood trees along the upper bank areas and sparse willow cover within the channel.

c. Wildlife. Wildlife species observed or potentially occurring in the Nonnative Grassland community on the project site include mammals such as black-tailed hare, Botta's pocket gopher,

coyote, and striped skunk; birds such as western kingbird, turkey vulture, northern harrier, red-tailed hawk, Swainson's hawk, short-eared owl, American kestrel, mourning dove, black phoebe, horned lark, loggerhead shrike, savannah sparrow, western meadowlark, Brewer's blackbird, and house finch; and reptiles such as western fence lizard, gopher snake, common kingsnake, and common garter snake.

Wildlife species observed or potentially occurring in the NHVP community on the project site include birds such as great blue heron, great egret, snowy egret, various waterfowl (i.e. mallards, cinnamon teal, etc.), killdeer, greater yellowlegs, long-billed curlew, Forster's tern, and red-winged blackbird; reptiles such as northwestern aquatic garter snake; amphibians such as treefrog; and aquatic invertebrates including vernal pool fairy shrimp and vernal pool tadpole shrimp.

d. Special Status Species. The following section addresses the potential presence of special status plant and animal species on or in the vicinity of the project site. Special status species include species of special concern and listed species, which are addressed separately due to the differing legal requirements regarding potential impacts. Figure IV.C-2 shows the location of special status species.

Listed species include species that are listed as threatened or endangered under California State or Federal Endangered Species Acts. Species of special concern include: animal and plant species that are proposed or candidates for listing under the State and/or federal endangered species acts; animals listed by the State of California as Species of Special Concern because declining population levels, limited ranges, and/or continuing threats have made them vulnerable to extinction; plants listed as rare by the State of California because they occur in such small numbers throughout their range that they may become endangered if their present environment worsens; and plant species listed under the California Native Plant Society List 1B, which are those considered to be rare, threatened, or endangered in California and elsewhere. Species that are considered of special concern, according to the above criteria, have no formal legal protection except in cases where local, State or federal law prohibits the destruction or disturbance of nest sites, wintering colonies, or other similar phenomenon.

(1) Methods. In order to assess the potential presence of special status species within the project area, LSA biologists conducted a literature review and field surveys. LSA searched the California Natural Diversity Database¹ (CNDDDB) and California Native Plant Society (CNPS) Online Inventory (CNPS 2003) referencing the Richardson Springs quadrangle, and downloaded the U.S. Fish and Wildlife (USFWS) list of special status species, also referencing the Richardson Springs quadrangle. A list of special status species potentially occurring on the project site is contained in the Biological Resources Evaluation.

Focused plant surveys of the site were conducted in 1997 on March 12-13, March 31-April 1, May 1-15, and July 10-11. Reconnaissance level plant surveys of the entire site were conducted by LSA biologists on March 13 and 24, 2003 to confirm conditions were similar to those in 1997. Surveys for fairy shrimp were conducted by Sugnet and Associates during the 1994-1995 wet season. LSA biologists conducted surveys for presence of federally listed vernal pool invertebrates on February 13, March 12-13, March 16, April 15-16, May 14-15, 1997. Additional surveys were conducted in

¹ California Natural Diversity Database, 2003.



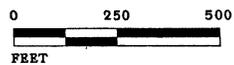
FIGURE IV.C-1

LSA

Plant Communities

-  Nonnative Grassland
-  Vernal Pool
-  Vernal Swale
-  Intermittent Drainage

-  Project Site Boundary
-  Approximate Limits of Eaton Road Extension (Area 3) Direct Impact Area



Note: Approximate Limits of Eaton Road Extension Impact Areas Referenced From Eaton Road Extension Draft Environmental Impact Report, SCH# 2002092053, dated March 2004

*Sycamore Glen/
Mountain Vista EIR*
Plant Communities

SOURCE: USGS ORTHORECTIFIED PHOTOQUAD, 1998.



FIGURE IV.C-2

LSA

-  Project Site Boundary
-  Preserve Boundary

-  Approximate Limits of Eaton Road Extension (Area 3) Direct Impact Area

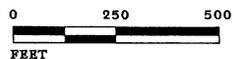
Waters of the U.S.

-  Vernal Pool
-  Vernal Swale
-  Intermittent Drainage (CDFG Waters)

Special Status Species

- FS Vernal Pool Fairy Shrimp
- TS Vernal Pool Tadpole Shrimp
- CL California Linderiella
- WST Western Spadefoot Toad

*Sycamore Glen/
Mountain Vista EIR*
Special Status
Species Locations



Note: Approximate Limits of Eaton Road Extension Impact Areas Referenced From Eaton Road Extension Draft Environmental Impact Report, SCH# 2002092053, dated March 2004

SOURCE: USGS ORTHORECTIFIED PHOTOQUAD, 1998.

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2000 on January 25, February 8 and 22, March 7 and 21, April 5 and 20, and May 3 and 17. Dry season surveys were conducted by LSA on August 20, 2000. All potential waters of the United States on the project site were delineated by Gibson and Skordahl, and verified by the Corps of Engineers (Corps) on January 3, 1992. LSA revised and verified delineation during site visits in May and June 2003.

(2) **Threatened or Endangered Species.** The project site is located within the known or historic range of a federally-listed Threatened and Endangered species, and a State-listed Threatened species.

Vernal Pool Fairy Shrimp. The vernal pool fairy shrimp is a federally-threatened species. It has no State status. The CNDDDB contains one record of vernal pool fairy shrimp north of the project site across Sycamore Creek, within approximately 0.3 mile. Vernal pool fairy shrimp were found in eight pools on the project site based on survey results from Sugnet and Associates and LSA. The project site is not designated critical habitat for this species.

Vernal Pool Tadpole Shrimp. The vernal pool tadpole shrimp is federally listed as endangered. It has no State status. The vernal pool tadpole shrimp range is within the Central Valley from Shasta County to Merced County and Northern Fresno County. The CNDDDB contains three records of vernal pool tadpole shrimp within three miles of the project site. Vernal pool tadpole shrimp were found in five pools on the project site based on survey results from Sugnet and Associates and LSA. The project site is not designated critical habitat for this species.

Swainson's Hawk. The Swainson's hawk is a State threatened species and is listed by the USFWS as a Migratory Non-game Bird of Management Concern (MNBMC). It has no formal federal status. The CNDDDB contains two records for Swainson's hawk nests within 10 miles of the project. One record is located approximately 7.4 miles to the west of the site, and the other is located approximately 6.4 miles to the south. Focused surveys were not conducted on the project site and no Swainson's hawks were observed during the other surveys. However, the nonnative grassland on the project site provides suitable foraging habitat for Swainson's hawk and this species could potentially forage on the project site. One suitable nest tree occurs on the project site, in the extreme northwest corner along the intermittent drainage, and several other suitable nest trees are located along the tributary near the middle and eastern half of the site.

(3) **Species of Special Concern.** Species of special concern include:

- Animal and plant species that are proposed or candidates for listing under the State and/or federal endangered species acts;
- Animals listed by the State of California as Species of Special Concern because declining population levels, limited ranges, and/or continuing threats have made them vulnerable to extinction;
- Plants listed as rare by the State of California because they occur in such small numbers throughout their range that it may become endangered if its present environment worsens; and
- Plant species listed under the California Native Plant Society List 1B, which are those considered to be rare, threatened, or endangered in California and elsewhere.

Plants. No special status plant species were observed on the project site. The project site is not located within critical habitat for any special status plants.

Wildlife. Special status wildlife observed or potentially occurring on the project site include the following:

White-Tailed Kite. The white-tailed kite is a California fully protected species and may occur on the project site. The CNDDDB does not contain any records for this species within 10 miles of the project site. Focused surveys were not conducted on the project site and this species was not observed during any other surveys.

California Linderiella. California linderiella is a federal species of concern and it has no State status. The CNDDDB contains one record of this fairy shrimp species north of the project site across the tributary to Sycamore Creek, within approximately 0.3 mile. California linderiella was found in six pools on the project site based on survey results from Sugnet and Associates and LSA.

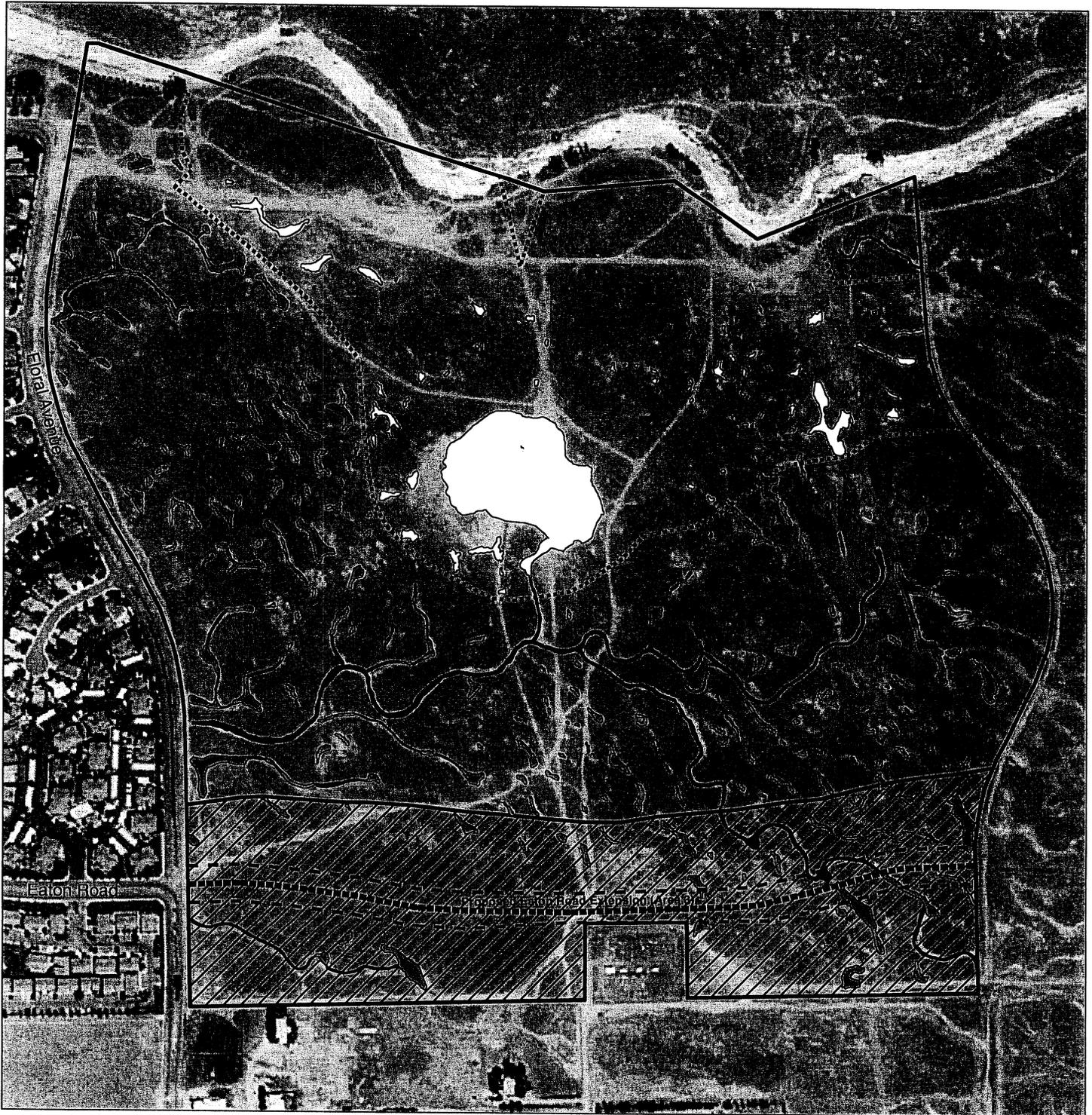
Ferruginous Hawk. Ferruginous hawk is a State species of concern. The ferruginous hawk may occur on the project site only during the non-breeding season. The CNDDDB does not contain any records for this species within 10 miles of the project site. Focused surveys were not conducted on the project site and this species was not observed during any other surveys.

Long-Billed Curlew. Long-billed curlew is a State species of concern. The long-billed curlew may occur on the project site only during the non-breeding season. The CNDDDB does not contain any records for this species within 10 miles of the project site. Focused surveys were not conducted on the project site and this species was not observed during any other surveys.

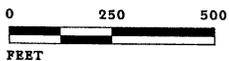
Western Spadefoot Toad. Western spadefoot toad is a State species of special concern. The CNDDDB contains a record for the spadefoot toad in the intermittent drainage at the north boundary of the project site; over 500 tadpoles were observed. No adult spadefoot were observed on the project site, but due to the presence of so many tadpoles in the intermittent drainage, it is assumed that adults occur in the upland areas of the site during the non-breeding season.

e. Jurisdictional Waters. Areas potentially meeting Corps jurisdictional criteria for wetlands include vernal pools and swales totaling 9.81 acres (Vernal Pool 8.48 acres; Vernal Swale 1.33 acres). Nonwetland waters on the project site total 1.46 acres and include sections of Sycamore Creek. These 1.46 acres are potential CDFG jurisdictional waters. The total acreage of Waters of the U.S. on the project site is 11.27 acres. Figure IV.C-3 identifies the location of vernal pools and swales.

Vernal pools and swales on the project site pond water (or are otherwise inundated) for short periods during the winter and early spring due to an impermeable, subsurface layer that retards percolation. The duration of ponding varies depending on the depth of the pool, and the timing and quantity of rainfall. This ponding allows for the development of wetlands consistent with the Corps criteria. The edge of the wetlands is generally the highest point in the pool or feature where hydrophytic vegetation is dominant.



LSA



-  Project Site Boundary
-  Preserve Boundary

Preserve Area

-  Vernal Pool
-  Vernal Swale

-  Approximate Limits of Eaton Road Extension (Area 3) Direct Impact Area
-  Approximate Limits of Eaton Road Extension (Area 3) Indirect Impact Area

Development Area

-  Vernal Pool
-  Vernal Swale

Note: Approximate Limits of Eaton Road Extension Impact Areas Referenced From Eaton Road Extension Draft Environmental Impact Report, SCH# 2002092053, dated March 2004

FIGURE IV.C-3

*Sycamore Glen/
Mountain Vista EIR
Impacts to Vernal
Pools and Swales*

SOURCE: USGS ORTHORECTIFIED PHOTOQUAD, 1998.

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Many of the vernal pools and swales on the project site have been disturbed as a result of unauthorized off-highway vehicle (OHV) usage on the site. The majority of the OHV use appears to be during the winter and spring when the site is wettest. The most common type of disturbance is the presence of tire ruts in pools or swales. The ruts generally extend deeper than the normal ground surface, sometimes down to the hardpan. The ruts, being deeper than the rest of the pool or swale, collect water that would normally spread across the pool or swale, thus altering the hydrology of the wetland. In addition, the ruts create unnatural "high" areas within the pool or swale. These higher areas do not stay inundated as long as the rest of the pool or swale and, as a result, support fewer hydrophytes than the rest of the wetland.

In other cases, the OHV usage is so heavy that roads have been created. Where these roads cross swales or pools, the constant disturbance has eroded the natural topography such that, in some cases, the shape of the feature has been substantially altered.

The intermittent drainage is Sycamore Creek, which ultimately confluences with Mud Creek and then the Sacramento River west of Chico. The reach of the drainage within and adjacent to the project site conveys intermittent (bordering on ephemeral) flows. The subject section of the channel is primarily glides and pools. The substrate is predominantly silt. The reach of the intermittent drainage within the project site does not support wetlands. The Ordinary High Water Mark (OHWM) of the channel averages approximately 70 feet wide through the project site.

2. Impacts and Mitigation Measures

a. **Criteria of Significance.** Implementation of the project may result in a significant effect on biological resources if it would:

- Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the CDFG or USFWS;
- Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in applicable local or regional plans, policies, regulations, or by the CDFG or USFWS;
- Have a substantial adverse effect on federally-protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means;
- Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites;
- Conflict with any applicable local policies or ordinances protecting biological resources, such as a tree preservation policy ordinance; and/or
- Conflict with the provision of approved local, regional, or State habitat conservation plans.

b. **Less-than-Significant Impacts.** While the project would result in the fill of a total of 6.06 acres of wetlands on the project site, 4.7 acres (47.9 percent) of wetlands (existing vernal pools and swales) on the project site would be preserved and/or enhanced. These pools would be preserved in the northern one-third of the site (52.23 acres) as open space. (The open space preserve would total

56 acres, but approximately 4 acres would be impacted by the construction of stormwater detention and treatment basins. As such, the total area where no biological impacts would occur is referred to as totaling 52.28 acres in this section.) This area includes a large vernal pool as well as portions of Sycamore Creek. The preserve area would abut (primarily at the south end) the existing 290-acre Foothill Park Preserve located north of Sycamore Creek, thus creating approximately 346 acres of contiguous, preserved open space (refer to Figure IV.C-4, which shows the proximity of project proposed open space preserve to the existing Foothill Park Preserve). Impacts to the on-site preserve area would be limited to planned storm drainages and water treatment areas for the project. The remainder of the project site would be graded and replaced with homes, roads, and commercial space.

Impacts to wetlands will be mitigated in accordance with the final Corps of Engineers Sacramento District Habitat Mitigation and Monitoring Proposal (HMMP) Guidelines. Appropriate mitigation ratios will be established to ensure no net loss of wetland acreage or value.

(1) City of Chico General Plan Policies. The City of Chico General Plan's Open Space Element contains a number of policies designed to protect biological resources within the City. A discussion of the project's consistency with the applicable policies follows:

OS-G-5: Protect habitats that are sensitive, rare, declining, unique, or represent valuable biological resources in the Planning Area.

The northern one-third of the project site would be preserved as open space. This area includes a large vernal pool, which serves as habitat for sensitive species, as well as Sycamore Creek. Therefore, the proposed project complies with Policy OS-G-5.

OS-G-6: Preserve and protect populations and supporting habitat for special status species within the Planning Area, including species that are state or federally listed as Rare, Threatened, or Endangered, all federal "candidate" species for listing and other species on officially adopted federal and/or State listing, and all California Species of Special Concern.

The northern one-third of the project site would be preserved as open space. This area includes Sycamore Creek, a large vernal pool and other wetlands, which serves as habitat for Vernal Pool Fairy Shrimp, a federally listed Threatened species, Vernal Pool Tadpole Shrimp, a federally listed Endangered species, and Western Spadefoot Toad, State Species of Special Concern. To the extent practicable, the project preserves nonnative grassland, which provides habitat for Swainson's hawk, a State Threatened species, and ferruginous hawk and white-tailed kite, State Species of Concern. The proposed project complies with Policy OS-G-6.

OS-G-7 Minimize impacts to sensitive natural habitats throughout the Planning Area.

In new developments, emphasis should be placed on protecting and preserving valuable and sensitive natural habitats. The comprehensive habitat mapping and biological resource inventory prepared as part of the Plan preparation will be consulted when reviewing development applications.

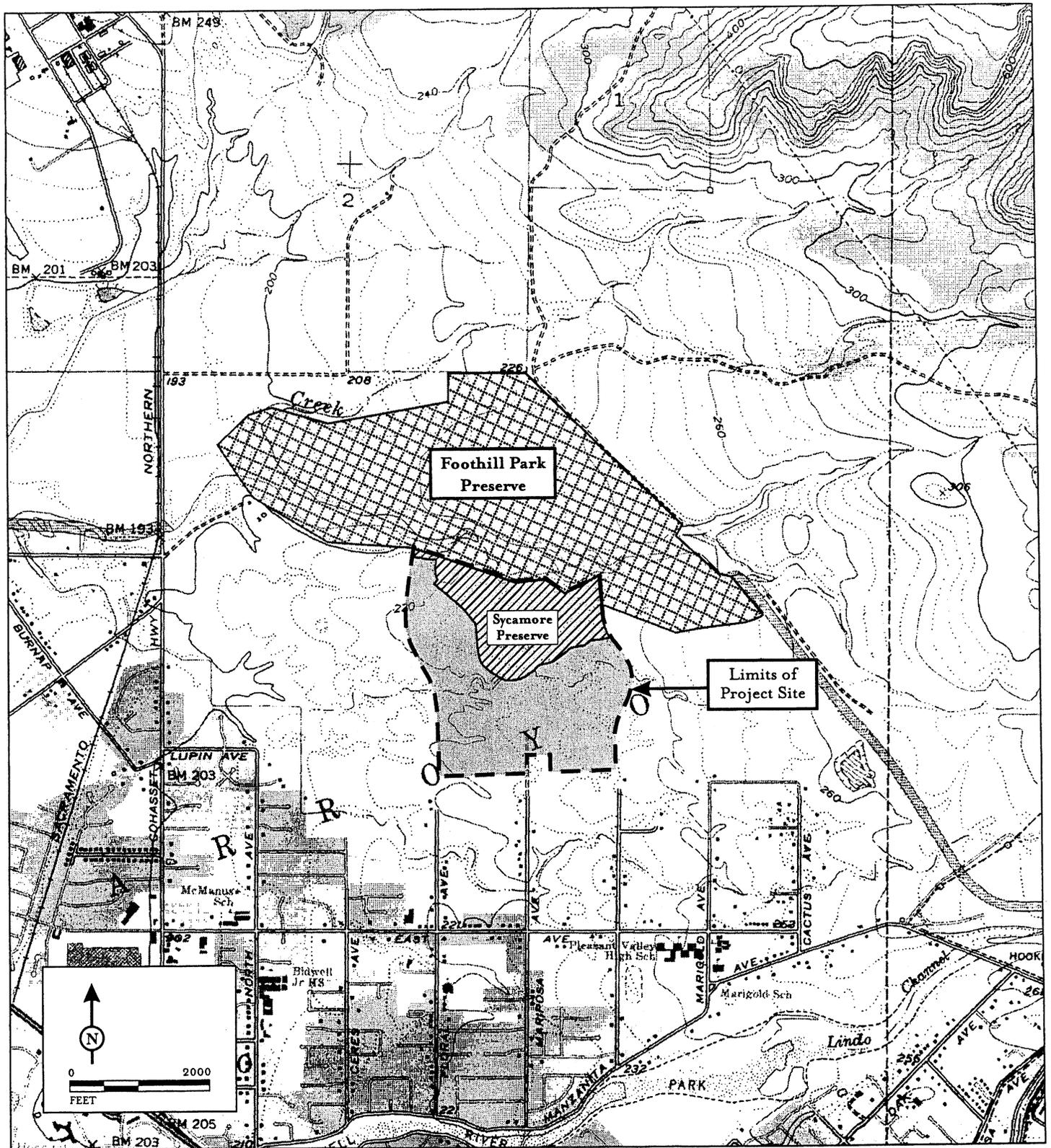


FIGURE IV.C-4

LSA

-  FOOTHILL PARK PRESERVE AREA
-  PROPOSED ON-SITE PRESERVE
-  PROJECT SITE

Sycamore Glen/Mountain Vista EIR
Foothill Park Preserve

SOURCE: USGS 7.5' QUADS - RICHARDSON SPRINGS & CHICO

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The northern one-third of the project site would be preserved as open space in an effort to preserve natural habitat. Areas that cannot be preserved will be mitigated in accordance with City, State, and federal requirements. Therefore, the project complies with Policy OS-G-7.

OS-G-9 Provide for no net loss of overall wetland acreage; where such losses may be unavoidable at the project level, require mitigation that meets the no net loss goal.

While the project would result in the fill of a total of 6.06 acres of wetlands on the project site, 4.7 acres of existing vernal pools and swales on the project site would be preserved and/or enhanced. Off-site mitigation for the balance of impacts to vernal pools and swales would also be required, subject to approval by the Corps. Impacts to wetlands will be mitigated in accordance with the final Corps of Engineers Sacramento District Habitat Mitigation and Monitoring Proposal (HMMP) Guidelines. Appropriate mitigation ratios will be established to ensure no net loss of wetland acreage or value. Therefore, the proposed project complies with Policy OS-G-9.

OS-I-26 Establish guidelines for Resource Management Plans in a *Best Practices Manual* to ensure consistency, streamline the development review process, and expedite Resource Management Plan preparation.

The Biological Resources Evaluation (Appendix C-1 of this EIR) includes all of the elements and analysis required for a Resource Management Plan (RMP) including an inventory of all biological resources; an analysis of how the proposed project would impact those resources; measures to mitigate unavoidable impacts to biological resources; and graphics delineating habitats, soils, hydrology, wetlands, and creeks. The project would include buffer zones, wildlife movement corridors, and preserve and enhance habitat for special status species with the adoption of the mitigation measures identified in this EIR. Provisions for recreation and education are included in the plan, through the extension of the Sycamore Creek bike path around the perimeter of the preserve area. Therefore, the proposed project is consistent with Policy OS-I-26.

OS-I-28 Allow off-site mitigation when preserving and protecting biological resources on-site in a Resource Management Area (RMA) proves to be infeasible (i.e., acreage too small, use intensity too high, etc.). Priority should be given to in-kind mitigation at specially designated expansion areas for existing Resource Conservation Areas (RCAs). As an alternative, expanding existing or proposed preserves through land acquisition within other RMAs should be allowed.

In addition to the mitigation of impacts through the preservation and enhancement of the biological resources in the on-site preserve area, the project would be required to provide off-site mitigation. Therefore, it is expected that the project would be consistent with Policy OS-I-28.

OS-I-29 Encourage groups of property owners to prepare joint RMP's and permit transfer of development between properties when joint development and management efforts are undertaken.

The proposed project includes a 56-acre preserve area that is shared by both the Sycamore Glen and Mountain Vista subdivisions. Joint preservation of open space contiguous to the two subdivisions results in a larger, contiguous preserve area than if each subdivision were developed independently. This preserve area is contiguous with the existing 290-acre Foothill Park Preserve, located north of Sycamore Creek, as well as other open space preserves along the Sycamore Creek corridor. Therefore, the proposed project is consistent with Policy OS-I-29.

(2) **Plants.** The project will not impact any special status plant species as none occur on the project site.

(3) **Wildlife.**

Raptors and Long-billed Curlew. The project will remove 110.26 acres of nonnative grassland that is suitable foraging habitat for ferruginous hawk, white-tailed kite, and long-billed curlew. The project will preserve 52.23 acres of nonnative grassland on the project site that is suitable foraging habitat for these species. Consequently, the loss of 110.26 acres of nonnative grassland that is suitable foraging habitat for ferruginous hawk, white-tailed kite, and long-billed curlew is considered less-than-significant.

The project will also result in temporary impacts to 0.57-acre of nonnative grassland (that is suitable foraging habitat for ferruginous hawk, white-tailed kite, and long-billed curlew) during construction of storm facilities in the open space area. Due to the minimal, temporary nature of this impact, it is considered less than significant.

Western Spadefoot Toad. The project will remove 110.26 acres of nonnative grassland that could potentially be used by spadefoot toads during the non-breeding season. Adults breeding in Sycamore Creek will likely utilize the nonnative grassland areas adjacent to the creek. Since the preserve area is located adjacent to the intermittent drainage, it is not expected that the population of spadefoot toads occurring on the project site will be adversely affected by the project. Consequently, the loss of nonnative grassland habitat is considered a less than significant impact to western spadefoot toad and no mitigation is proposed.

The project could also affect spadefoot toad due to the additional flows that will be discharged into Sycamore Creek. The creek is an intermittent/ephemeral stream that is well suited to spadefoot toad life cycle. The high flows during the winter rainy season fill pools within the creek channel that persist after the flows subside, but eventually dry up. These seasonal pools are ideal for spadefoot as they can breed in these pools without the threat of predators that require a perennial water source (e.g., fish, bullfrogs, etc.). Of concern is that the potential additional discharge (i.e., urban runoff) during the dry season (summer and fall) may alter the existing hydrologic regime in the stream and result in more perennial flows. Additional flows during the winter rainy season are not an issue since any increase in flows will not alter the existing high flow regime that typically occurs during this time. Any change in the hydrologic regime that adversely affects spadefoot toads would be considered a potentially significant impact.

The project's proposed stormwater treatment basins are designed to collect and treat low storm water flows during the winter rainy season, but they will also collect and treat low flows (urban runoff) during the dry season. Additionally, although not designed to provide flow detention or retention, during the dry season when flows are minimal, it is expected that these basins will retain the urban runoff flows completely, resulting in no flows discharging into the intermittent stream, or at least detain the flow such that evaporation and percolation will result in only minimal flows reaching the stream. As a result, any additional flows that are discharged into the intermittent stream during the dry season are expected to be minimal and not result in changes to the existing hydrologic regime. Consequently, the additional discharges, if any, will not adversely affect western spadefoot toad and are considered less-than-significant.

c. Significant Impacts and Mitigation Measures.

(1) Vernal Pool Invertebrates.

Impact BIO-1: Implementation of the proposed project would impact vernal pools and similar habitats that support vernal pool fairy shrimp and vernal pool tadpole shrimp. (S)

Although vernal pool fairy shrimp and vernal pool tadpole shrimp were not recorded in every pool on the site, the USFWS assumes that these species occur on the entire site even if they were only observed on a portion of a site. Consequently, after deducting for direct impacts that would result from the construction of the Eaton Road Extension project, the project will result in direct impacts (e.g., destruction) to 6.06 acres of vernal pool habitat for the vernal pool fairy shrimp and vernal pool tadpole shrimp. The USFWS generally views indirect impacts to vernal pools as equivalent to direct impacts. The project will not result in indirect impacts to vernal pool habitat for these species greater than the direct impacts. This is due to the fact that the areas proposed for development are located downslope of pools which are located in the open space areas to be preserved. As a result, the development will not affect the watershed of any pools in the preserve area, and thus will not result in indirect impacts to the preserve pools.

Mitigation for impacts to vernal pools and similar habitats that support vernal pool fairy shrimp and tadpole shrimp is generally performed in accordance with standards developed as a result of a 1995 programmatic formal Section 7 consultation between the Corps, Sacramento District, and USFWS (USFWS, 1995). The USFWS guidelines specify both vernal pool preservation and creation elements. Preservation is generally required at a ratio of two acres preserved for every acre impacted. Creation of new pools is generally required at a ratio of one acre of pools creation for every acre impacted (i.e., 1:1 ratio). All mitigation habitat (preserved and created) must be protected in perpetuity.

Due to the project's topographical layout, built-in project buffering mechanisms and planned on-site off-road vehicle use restoration goals, indirect impacts to vernal pool habitat would be avoided. Currently, a substantial portion of the vernal pool resources within the preserve are highly degraded as a result of extensive trash dumping by the public over many years (Site Photo #5 is representative of the degraded areas). The project proponent's mitigation plan would propose extensive restoration, enhancement and repair of the vernal pool and swale systems within the on-site preserve which would result in significantly improved habitat conditions compared to existing degraded conditions. Design buffers would protect the preserve, including the preserve boundary line, which has been located outside of the drainage shed for the preserve so that preserve watersheds are not impacted. Additionally, development areas (which are proposed outside of the preserve watershed) would be graded so that they drain away from the preserve and into storm drain systems and streets. Also, open view fencing is planned in order to encourage neighbors to view, enjoy and protect the preserve.

Mitigation Measure BIO-1: Prior to issuance of a grading permit or other project-related disturbance of the site, the applicant shall prepare a Habitat Mitigation and Monitoring Proposal (HMMP) consistent with the final Corps Sacramento District HMMP Guidelines for impacts to vernal pools and swales. The HMMP and other applicable permits shall be approved by the Corps, USFWS, and the RWQCB, prior to initiation of work on the project site. Implementation shall be consistent with the terms of the HMMP. Appropriate mitigation

ratios shall be established to ensure no net loss of wetland acreage or value. The HMMP will address, at minimum, the following:

1. Project Description: location and summary of project; jurisdictional areas to be filled; types, functions and values of impacted jurisdictional areas;
2. Goal of Mitigation: type, functions and values of habitats to be created or enhanced; temporal losses; estimated costs;
3. Proposed Mitigation Sites: location, size and ownership of mitigation areas; existing functions, values and jurisdictional waters; present and proposed uses and zoning;
4. Implementation Plan: rationale for expecting success, responsibilities; schedule; site preparation; planting plan, irrigation plan; as-built plans;
5. Maintenance: activities; schedule; responsible parties;
6. Monitoring Plan: success and performance criteria; jurisdictional waters to be created/enhanced; monitoring methods; reports and schedule;
7. Completion of Mitigation: agency notification and confirmation; and
8. Contingency Measures: initiation, locations and funding.

This mitigation shall be accomplished at both on- and off-site locations. In concept, the plan will consist of three parts:

1. *On-Site Creation.* New vernal pools and swales shall be created within the 56-acre preserve area in the north portion of the project site. As functionally feasible due to existing topography, locations of existing pools, etc., the maximum acreage of vernal pools and swales will be created in an effort to attain the 1:1 creation ratio.
2. *On-Site Preservation and Enhancement.* A total of 4.7 acres of vernal pools and swales shall be preserved within the 56-acre preserve area which shall be deeded as public open space. In addition, pools and swales disturbed from OHV or other uses shall be enhanced as necessary. Enhancement will likely include minor grading of the pool/swale, or adjacent upland areas, in order to re-create the natural topography and hydrology.
3. *Off-Site Mitigation.* Off-site mitigation shall be provided to compensate for the balance of the project's impacts to vernal pools and swales. Off-site mitigation shall be accomplished through the purchase of mitigation credits, fee simple ownership, a conservation easement, or an equivalent legally binding instrument that ensures the creation or preservation of vernal pools and swales at the mitigation ratio approved by the Corps.

Level of Significance After Mitigation: Implementation of Mitigation Measure BIO-1 would reduce impacts to vernal pools and vernal pool wildlife to a less-than-significant level. (LTS)

(2) Wildlife.

Impact BIO-2: Implementation of the proposed project would impact 110.26 acres of nonnative grassland that is suitable foraging habitat for Swainson's Hawk. (S)

The project will remove 110.26 acres of nonnative grassland that is suitable foraging habitat for Swainson's hawk. CDFG generally recommends mitigation for loss of suitable foraging habitat for Swainson's hawk if the subject habitat is within 10 miles of an active nest (CDFG, 1994). A nest is considered active if it has been used in the last 5 years. The recommended mitigation consists of providing Habitat Management lands to CDFG to compensate for the loss of foraging habitat. The amount of land is determined using a ratio based on the distance the foraging habitat is from an active nest: within 1 mile is a 1:1 ratio, between 1 mile and 5 miles is a 0.75:1 ratio, and between 5 miles and 10 miles is a 0.5:1 ratio). As mentioned above in Section 6.2.4, the CNDDDB contains two records for Swainson's hawk nests within 10 miles of the project site, one at 6.4 miles and one at 7.4 miles. Therefore, both records are within the 5 to 10 mile range which requires a 0.5:1 mitigation ratio. At a 0.5:1 ratio, mitigation for the loss of 110.26 acres of foraging habitat is 55.13 acres.

The project will preserve 52.23 acres of nonnative grassland on the project site that is suitable Swainson's hawk foraging habitat. However, an additional 2.9 acres of nonnative grassland must be preserved to attain the 55.13 acres required for mitigation.

Mitigation Measure BIO-2: Prior to issuance of a grading permit or other project-related disturbance of the site, the applicant shall provide evidence that adequate mitigation has been provided for the loss of 110.26 acres of nonnative grassland that is suitable foraging habitat for Swainson's hawk. Because 52.23 acres of habitat will be provided on-site, 2.9 acres of nonnative grassland or other suitable foraging habitat shall be preserved at an off-site location, either through the purchase of mitigation credits, fee simple ownership, a conservation easement, or an equivalent legally binding instrument.

Level of Significance After Mitigation: Implementation of Mitigation Measure BIO-2 would reduce this impact to less-than-significant. (LTS)

Impact BIO-3: Implementation of the proposed project would impact potential nesting habitat for Swainson's hawk or other raptors. (S)

Swainson's hawk typically do not nest near areas of even moderate human activity (the exception being vehicle traffic), and it is highly unlikely this species would nest in trees located in developed areas near the project site. However, the project could affect nesting Swainson's hawks or other raptors (e.g., white-tailed kite) if they are using the riparian trees along Sycamore Creek when construction begins. New construction activities in the vicinity of an active nest tree during the breeding season (March 1 - September 15) could result in nest abandonment. This would be considered a potentially significant impact.

Mitigation Measure BIO-3: If project construction is to begin during the nesting season (March 1 - September 15), all suitable nest trees along Sycamore Creek within 0.25 mile of the limits of work shall be surveyed by a qualified biologist prior to initiating construction-related activities. Surveys will be conducted no more than 14 days prior to the start of work. If an active Swainson's hawk nest is discovered, a 0.25 mile buffer shall be established on the

project site around the nest tree and delineated using orange snow fence or brightly colored nylon rope. If an active nest of another raptor species is discovered, a 500 foot buffer shall be established. The buffer shall be maintained in place until the end of the breeding season or until the young have fledged, as determined by a qualified biologist. Other substitute measure(s) approved by the CDFG (i.e., such as the use of a monitoring biologist on-site during construction activities during the nesting season) would also be considered adequate mitigation. If no nesting is discovered, construction can begin as planned. Construction beginning during the non-nesting season and continuing into the nesting season shall not be subject to these measures.

Level of Significance After Mitigation: Implementation of Mitigation Measure BIO-3 would reduce this impact to less-than-significant. (LTS)

(3) Jurisdictional Waters.

Impact BIO-4: Implementation of the proposed project would impact wetlands. (S)

The project will result in the fill of a total of 6.06 acres of wetlands, including 4.54 acres of vernal pools and 1.52 acres of vernal swales.

Mitigation Measure BIO-4: Same as Mitigation Measure BIO-1.

Level of Significance After Mitigation: Implementation of Mitigation Measure BIO-4 would reduce this impact to less-than-significant. (LTS)

d. Cumulative Impacts. The project's direct and indirect impacts to biological resources would contribute to cumulative impacts on biological resources. However, implementation of Mitigation Measures BIO-1 to BIO-4 would reduce the project's contribution to cumulative impacts to less-than-significant.

D. CULTURAL RESOURCES

This section provides an analysis of the project's potential effects on cultural resources. The section summarizes the results of the Cultural Resources Study prepared by LSA Associates (May, 2004) and Peter Jensen, Ph.D., Consulting Archaeologist (Jensen, 2004). The report is available to responsible agencies for review and comment. However, due to the confidential information it contains regarding archaeological resources, copies of the report are not available for public distribution.

1. Setting

a. Natural Environment. The project site consists of approximately 175 acres of land within the city limits of Chico in Butte County, California. The project area is roughly bounded by Floral Avenue to the west, Sycamore Creek to the north, Ceanothus Avenue to the east, and a Pacific Gas and Electric Company easement to the south. The project site is located in the northeastern portion of the Sacramento Valley in the Rancho de Arroyo Chico land grant and consists of relatively-flat valley floor near a valley/hill interface to the east. Seasonal runoff has channelized much of the project site, resulting in hummocky terrain. Soils on-site are formed from Pliocene Tuscan Formation volcanic mudflows, tuff, and associated alluvium. The following water sources are in or adjacent to the project area: (1) intermittent Sycamore Creek flows east to west and roughly forms the northern project area boundary; (2) intermittent Sycamore Creek flows east to west in the southern third of the project area; and (3) a large vernal pool is located in the approximate center of the project area. Currently, the project site consists of open fields of grasses, portions of Sycamore Creek and its banks, and forbs, a portion of Sycamore Creek and its banks, with a PG&E substation in the south-central portion of the site. The site is currently used for unauthorized dumping and recreation.

b. Cultural Resources. This section presents the results of the cultural resources analysis conducted for the project area. The following section will provide: 1) the methods of the analysis; and 2) a project area setting, including a brief overview of the history of Chico and the project area, a summary of cultural resources within and adjacent to the project area, an overview of the area's archaeological sensitivity, and a review of the laws, codes, and regulations applicable to cultural resources in Chico.

(1) **Methods.** Background research for this cultural resources study included a records search, consultation with potentially-interested parties, and a field survey.

Records Search. A records search (File #D03-21) was completed on June 16, 2003, at the Northeast Information Center (NEIC) of the California Historical Resources Information System, Cal State University, Chico, California. The NEIC is an affiliate of the California Office of Historic Preservation and is the official state repository of cultural resources records and studies for an 11-county area, including Butte County.

One unrecorded cultural resource, a prehistoric archaeological site (State of California designation P-403), is in the approximate center of the project area; no cultural resources have been identified adjacent to the study area. One cultural resources study covered the entire project site; one cultural resources study was conducted adjacent to the south. Although not identified during the records search at the NEIC, two recent cultural resources studies in the project area were supplied by the City of Chico Community Development Department and the project applicant. The Jones and Stokes

report (2002) for the extension of Eaton Road covers a 124-foot wide strip of land across the project site, parallel to and approximately 250 feet north of the southern boundary. The Jensen report (2003) covers approximately 10 acres just to the west of the existing Pacific Gas and Electric Company substation at the project area's southern boundary.

Literature Review. LSA reviewed archaeological, ethnographic, and historical information about the project area to better understand the project areas's cultural and environmental setting, and to identify cultural resources within or adjacent to the project area.

Consultation. The California Native American Heritage Commission (NAHC) was requested in a letter on April 30, 2003, to review their sacred lands file to determine if Native American cultural resources are within the project area and to provide a list of Native American individuals of Native American individuals or groups that may have knowledge about such resources or concerns about the Project area. Ms. Debbie Pilas-Treadway, Environmental Specialist III at the NAHC, responded in a faxed letter of May 22, 2003, that the NAHC did not identify any Native American cultural resources within or adjacent to the study areas.

Field Surveys. Due to previous records of archaeological resources on the project site identified by the NAHC files, a pedestrian field survey of the project site was conducted by LSA archaeologists Andrew Pulcheon and Pamela Bowler on August 6 and 7, 2003. The entire project site was intensively surveyed for cultural resources.

Ground visibility during the survey was limited to roughly 20 to 30 percent as a result of dense seasonal vegetation. The project area was walked in zig-zag transects spaced approximately 15 to 20 meters apart. A hoe and trowel were used at regular intervals to clear vegetation and obtain a clear view of the ground surface and possible archaeological materials. Rodent burrow backdirt and small, natural drainage channels provided glimpses of underlying soils and were inspected for archaeological materials. The areas described in documentation on file at the NEIC as containing archaeological materials received additional intensive field inspection. The field survey was documented through notes, map notation, and digital photographs.

In addition to the survey by LSA archaeologists, Mr. Peter Jensen, PhD., Consulting Archaeologist, also conducted a surface and subsurface inspection at the vernal pool portion of archaeological site P-403 from March 14 to 17, 2004 to establish site boundaries and determine if a subsurface deposit was present.

(2) Cultural Resources Context.

Prehistory and Ethnography. The Chico area was probably initially settled by native Californians between 12,000 and 6,000 years ago. The Paleo-Archaic-Emergent cultural sequence is commonly used to interpret the prehistoric occupation of Central California. The sequence is broken into three broad periods: the Paleoindian period (10,000-6000 B.C.); the three-staged Archaic period, consisting of the Lower Archaic (6000-3000 B.C.), Middle Archaic (3000-1000 B.C.), and Upper Archaic (1000 B.C.-A.D. 500); and the Emergent period (A.D. 500-1800).

The Paleo Period began with the first entry of people into California. These people probably subsisted mainly on big game and minimally processed plant foods, with no trade networks. The

Archaic Period is characterized by increased use of plant foods, elaboration of burial and grave goods, and increasingly complex trade networks. The Emergent Period is marked by the introduction of the bow and arrow, the ascendance of wealth-linked social status, and the elaboration and expansion of trade networks, signified in part by the appearance of clam disk bead money.

Archaeological excavations in Butte County suggest that an early culture comprising Hokan-speaking peoples may have been the precursor to permanent Native American settlement of the upper Sacramento Valley. Current understanding of California's prehistory indicates that the Hokan culture was disrupted around 100 to 200 A.D. by the incursion of Penutian-speaking peoples, who occupied territories relinquished by former Hokan inhabitants. The Penutian speakers are thought to have introduced a more varied use of plant foods, and perhaps also the bow and arrow.

In ethnographic times, the territory containing the project area was attributed to the Konkow, or Northern Maidu. Konkow territory ranged from Lassen Peak to the Cosumnes River, as well as from the Sacramento River to Honey Lake. The Konkow followed a seasonal round, in which fishing, small game hunting, and the gathering of plant foods provided the basis of their subsistence economy. Archaeological evidence in this portion of Butte County suggests that the Konkow utilized plant food resources associated with vernal pools, such as *brodiaea* bulbs. Konkow settlements were located along streams, and were most intensively inhabited during the winter. During the spring, summer, and fall, temporary resource procurement sites and temporary camps were established in the higher elevations to take advantage of abundant plant and animal resources more readily available in such settings. Sociopolitically, the Konkow were organized around a family structure within larger villages, which in turn formed tribelets led by a headman charged with mediating disputes, convening councils, and providing advice regarding important decisions.

Historical Background. In the first half of the 19th century, a number of Euroamericans arrived in what was to become Butte County. Spanish soldier and explorer Gabriel Moraga led an expedition in 1808 near present day Oroville, followed in 1820 by another Spaniard, Luis Arguello, who named the Feather River ("Rio de las Plumas"). By 1827, Jedediah Smith had undertaken an expedition to assess California's potential for the fur trade, and Hudson's Bay Company fur trappers began trapping the Butte County area in earnest during the 1840s. John Potter, the first Euroamerican to establish a permanent settlement in future Butte County, built an adobe on Chico Creek. This building and the settlement that formed around it became downtown Chico.

The Gold Rush was the next major event to bring attention and settlers to the region. On March 25, 1848, gold was discovered in the Feather River below the present day Oroville. Within 2½ years, 214 mining camps were actively pursuing placer gold deposits along the Feather River. As the placer diggings played out, a different technological approach was implemented: hydraulic mining. Until the Anti-Debris Act of 1884 effectively curtailed major hydraulic mining operations, the Butte County area had extensive mining-related facilities, including flumes and ditches to bring water to the diggings.

The settlement that became the city of Chico today owes much to the patronage of John Bidwell, a prominent early settler. Bidwell arrived in California as part of an overland party in 1841, eventually trying his hand at gold mining before moving to the Butte County area. Upon arriving, Bidwell purchased Rancho del Arroyo Chico from its original grantees, and began a prosperous farming operation. Bidwell sought to live peaceably with the Native Americans in the area, eventually

establishing a rancheria on his property for their use. Bidwell, as a prominent and respected settler, was active in politics, serving as a U.S. Senator in the 1860s and achieved the rank of general in California's state militia. He continued encouraging settlement with his largesse by establishing the town of Chico in 1860, and providing free town lots to individuals promising to build a home and remain. Eventually, Chico's population reached 2,500 people in 1869. Bidwell's generosity was continued by his wife after his death in 1900, when in 1905 and 1911 she donated a total of approximately 2,200 acres to the citizens of Chico. This land was to become Bidwell Park, one of the largest urban parks in the nation.

Today, Chico is a rapidly growing city of over 70,000 inhabitants, and is home to a California State University campus. Major industries in Chico include agriculture, education, tourism, and recreation.

c. Evaluation. The surface and subsurface inspection of site P-403, conducted by Mr. Peter Jensen, Ph.D., found that the vernal pool lithic scatter: 1) lacks a subsurface component; 2) lacks surface features; 3) lacks non-artifactual midden constituents; and 4) lacks formed artifacts of any kind. As such, Mr. Jensen concluded that ". . . further data recovery (i.e. collection, further analysis of surface lithic) could not reasonably be expected to expand our understanding or appreciation of this site beyond which has been achieved in the existing site documents and present evaluation." Therefore, archaeological site P-403 does not appear eligible for listing in the National Register, and does not meet the criteria for consideration as a historical resource under CEQA. Since eligibility for listing in the California Register is one of the criteria for consideration as a historical resource under CEQA, archaeological site P-403, in addition to being ineligible for the National Register, is ineligible for the California Register.

2. Impacts and Mitigation Measures

a. Criteria of Significance. A project may have a significant effect on the environment if it may cause damage to a unique or important archaeological resource. The following criteria for evaluating archaeological cultural resources are provided in Section 15064.5 of the State *CEQA Guidelines, Determining the Significance of Impacts on Historical and Unique Archaeological Resources*, Section 15064.5.

(a) For purposes of this section, the term "historical resources" shall include the following:

- (1) A resource listed in, or determined to be eligible by the State Historical Resources Commission for listing in, the California Register of Historical Resources (Pub. Res. Code SS5024.1, Title 14 CCR, Section 4850 et seq.).
- (2) A resource included in a local register of historical resources, as defined in section 5020.1(k) of the Public Resources Code or identified as significant in an historical resource survey meeting the requirements of section 5024.1(g) of the Public Resources Code, shall be presumed to be historically or culturally significant. Public agencies must treat any such resource as significant unless the preponderance of evidence demonstrates that it is not historically or culturally significant.
- (3) Any object, building, structure, site, area, place, record, or manuscript that a lead agency determines to be historically significant or significant in the architectural, engineering,

scientific, economic, agricultural, educational, social, political, military, or cultural annals of California may be considered to be an historical resource, provided the lead agency's determination is supported by substantial evidence in light of the whole record.

- (b) A project with an effect that may cause a substantial adverse change in the significance of an historical resource is a project that may have a significant effect on the environment.
- (c) CEQA applies to effects on archaeological sites.
 - (1) When a project will impact an archaeological site, a lead agency shall first determine whether the site is an historical resource, as defined in subsection (a).
 - (2) If a lead agency determines that the archaeological site is an historical resource, it shall refer to the provisions of Section 21084.1 of the Public Resources Code, and this section, Section 15126.4 of the Guidelines, and the limits contained in Section 21083.2 of the Public Resources Code do not apply.
 - (3) If an archaeological site does not meet the criteria defined in subsection (a), but does meet the definition of a unique archaeological resource in Section 21083.2 of the Public Resources Code, the site shall be treated in accordance with the provisions of Section 21083.2. The time and cost limitations described in Public Resources Code Section 21083.2 (c-f) do not apply to surveys and site evaluation activities intended to determine whether the project location contains unique archaeological resources.
 - (4) If an archaeological resource is neither a unique archaeological nor an historical resource, the effects of the project on those resources shall not be considered a significant effect on the environment. It shall be sufficient that both the resource and the effect on it are noted in the Initial Study or EIR, if one is prepared to address impacts on other resources, but they need not be considered further in the CEQA process.
- (d) As part of the objectives, criteria, and procedures required by Section 21082 of the Public Resources Code, a lead agency should make provisions for historical or unique archaeological resources accidentally discovered during construction. These provisions should include an immediate evaluation of the find by a qualified archaeologist. If the find is determined to be an historical or unique archaeological resource, contingency funding and a time allotment sufficient to allow for implementation of avoidance measures or appropriate mitigation should be available. Work could continue on other parts of the building site while historical or unique archaeological resource mitigation takes place.

If an archaeological resource is not an important archaeological resource, or is a non-unique archaeological resource in that it does not meet the criteria set forth above, it need be given no further consideration, other than the simple recording of its existence by the lead agency in the EIR.

b. Significant Impacts and Mitigation Measures. Project activities that have the potential to significantly impact cultural resources include: 1) soil excavation that may be necessary to construct the proposed facilities; 2) site clearance for proposed construction; and 3) construction of 680 residential units and up to 25,000 square feet of commercial space.

(1) **Impacts to Cultural Resources.** Construction of the proposed project would require site clearance, grading, and other construction activities that could potentially impact cultural resources as described below.

Impact CULT-1: Ground-disturbing activities associated with site preparation, grading, and other construction activities could adversely impact archaeological resources. (S)

Implementation of the proposed project would involve grading, trenching, and excavation activities that could impact resources that may be located in the project site and within or adjacent to the development area. Based on LSA's evaluations, archaeological and historic resources within the project site are not eligible for listing on the California or National Registers. Thus, project related impacts to these sites are not considered significant and do not require additional evaluation or mitigation. While further study for cultural resources is not recommended at this time, there is the possibility that unidentified, potentially-significant subsurface deposits associated with the project site exist, and may be impacted by project construction, which is proposed immediately adjacent to site P-403. Monitoring is recommended at the two locations documented as containing prehistoric archaeological site P-403 during ground-disturbing project construction activities. The implementation of the project, as currently proposed, would not result in a significant impact to the site. It is possible, however, that project construction will encounter unidentified, potentially-significant subsurface archaeological deposits that may meet the CEQA-definition of a historical resource. Construction monitoring is recommended to avoid, reduce, or minimize potential impacts to unidentified subsurface deposits.

NEIC documentation indicated that midden deposit is present in an east-to-west-oriented strip along the southern project area boundary, but field surveys did not identify this site. Because no subsurface inspection was conducted to determine the presence or absence of this reported midden, the potential presence of such a deposit cannot be discounted. Such a potentially-significant deposit, if present, can be damaged by project construction, which may result in a significant impact to cultural resources.

Mitigation Measure CULT-1: A qualified archaeologist shall monitor all ground disturbing activities within the two areas identified as potentially containing archaeological resources. These areas include: 1) the recorded site boundaries of P-403 (west of the vernal pool) plus a 25-foot surrounding buffer; and 2) the strip of land from the fenceline that forms the southern project area boundary north 50 feet, and from the existing PG&E substation west to the intersection of Floral Avenue and Lupin Avenue. This area conforms to the reported location of midden documented as part of archaeological site P-403.

Archaeological monitors shall be empowered to halt construction activities at the location of the discovery to review possible archaeological material and to protect the resource while the finds are being evaluated. This monitoring shall continue until, in the archaeologist's judgment, cultural resources are not likely to be encountered.

If deposits of prehistoric or historical archaeological materials are encountered during project activities, all work within 50 feet of the discovery shall be redirected until the archaeological monitor evaluates the situation and provides recommendations. Project personnel shall not collect or move any archaeological material. Fill soils that may be used for construction pur-

poses shall not contain archaeological materials. If archaeological deposits cannot be avoided, they shall be evaluated for their significance in accordance with the California Register. If the resources are not significant, further protection is not necessary. If the resources are significant, they will need to be protected from adverse effects or such effects must be mitigated. Upon completion of the archaeological assessment, a report shall be prepared documenting the methods and results, as well as recommendations. The report shall be submitted to the NEIC and to the Planning Division of the City of Chico Community Development Department.

Level of Significance After Mitigation: Implementation of Mitigation Measures CULT-1 will reduce impacts to a less-than-significant level. (LTS)

Impact CULT-2: Ground-disturbing activities associated with site preparation, grading, excavation or utility trenching could disturb human remains, including those interred outside of formal cemeteries. (S)

Section 7050.5 of the California Health and Safety Code states that in the event of discovery or recognition of any human remains in any location other than a dedicated cemetery, there shall be no further excavation or disturbance of the site or any nearby area reasonably suspected to overlie adjacent remains until the coroner of the county in which the human remains are discovered has determined whether or not the remains are subject to the coroner's authority.

Mitigation Measure CULT-2: If human remains are encountered during construction activities, work within 50 feet of the discovery shall be redirected and the county coroner notified immediately. At the same time, an archaeologist shall be contacted to evaluate the situation. If the human remains are of Native American origin, the coroner shall notify the Native American Heritage Commission within 24 hours of this identification. The Native American Heritage Commission shall identify a Native American Most Likely Descendent to inspect the site and provide recommendations for the proper treatment of the remains and associated grave goods. A report documenting the methods, findings, and recommendations shall be prepared. The report shall be submitted to the NEIC and the Planning Division of the City of Chico Community Development Department.

Level of Significance After Mitigation: Implementation of Mitigation Measure CULT-2 will reduce this impact to a less-than-significant level. (LTS)

c. **Cumulative Impacts.** The project would not combine with the impacts of any other projects to result in significant cumulative impacts related to cultural resources. The Eaton Road Project, which extends through the site, includes a mitigation measure (9-1) requiring that construction be stopped if cultural resources are discovered during construction. This mitigation measure, combined with the mitigation measures above, would avoid cumulative impacts to cultural resources.

E. HAZARDS AND HAZARDOUS MATERIALS

This section provides an overview of the potential presence of hazardous materials¹ and other hazards near the project site and assesses potential impacts to public health and safety that could result from the development of the project. Four areas of potential concern are addressed in this section: electromagnetic fields (EMFs), airport hazards, fire hazards, and hazardous materials.

1. Setting

The project site is vacant and surrounded by existing residential uses to the south, east, and west. Sycamore Creek and open grassland are located to the north. The General Plan states that Bidwell Park, the land surrounding it, and the foothills in the eastern part of the planning area are considered to be major fire threats. The project site is not included in these areas. The climate of Chico and surrounding area, which includes low summer humidity in combination with high summer temperatures, creates a high seasonal fire risk for the area.

The Pacific Gas & Electric (PG&E) Sycamore Creek Substation is located at the north terminus of Mariposa Avenue, along the southern boundary of the project site. Power lines serving the substation run east-west along the southern project boundary.

a. Hazardous Materials. A Hazardous Waste Environmental Site Assessment (ESA) was conducted by LSA Associates, Inc. for the project site. The ESA included field surveys on December 28, 2002 and January 8 and January 24, 2003 and review of available historical land use and regulatory agency records to identify potential hazardous materials sites in the vicinity of the project site.

During the field surveys, several articles of abandoned furniture and household appliances were observed to be dumped along the dirt roadways. These items included a large upholstered couch, reclining chair, and a mattress, among other household materials.

Two records of potential hazardous waste sites were identified within 2 miles of the project site by the ESA. Both sites are located a substantial distance from the project site. The sites are listed below.

- Pacific Bell C/O Allen TAV99 is located 1,541 meters (5,055 feet) from the project site at 1390 E. Lassen Ave, Chico. A diesel leak from an underground storage tank was confirmed on August 9, 1993. The site was reviewed and decontaminated. The case was closed on November 19, 1993.
- North Chico Fire Station #42 is located 1,928 meters (6,324 feet) from the project site at 10 Frontier, Chico. An unleaded gasoline leak from an underground storage tank was confirmed August 10, 1988. The leak was abated, and the case was closed on February 22, 1990. A

¹ The California Health and Safety Code defines a hazardous material 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. Hazardous materials include, but are not limited to, hazardous substances, hazardous waste, radioactive materials, and any material which a handler or the administering agency has a reasonable basis for believing that it would be injurious to the health and safety of persons or harmful to the environment if released into the workplace or the environment." (Health and Safety Code Section 25501).

corrosion leak from a tank was also discovered on August 16, 1989. MTBE tests were not required. Contamination and abatement was performed and the case was closed.

Because these two sites have been cleaned up, the ESA determined that there were no known hazardous waste sites within or proximate to the project site. Also, the project site is not adjacent to any existing sites that have a history of contamination.

b. Chico Municipal Airport. Chico Municipal Airport, the busiest and largest airport in Butte County, is located approximately 1.5 miles northwest of the project site. The airport currently handles nearly 70,000 aircraft takeoffs and landings annually and is home to more than 130 based aircraft. Chico Municipal Airport also includes a major fire attack aircraft base operated by the California Department of Forestry (CDF).²

The project site is located within Zones C and Zone B2 of the Airport Influence Area Boundary set forth by the Butte County Airport Land Use Compatibility Plan (ALUCP) (see Figure IV. E-1). The majority of the project site is contained within Zone C. The northern portion of the project site is contained within Zone B2.

According to the ALUCP, Zone C contains the normal traffic pattern for both runways of the Chico Municipal Airport. The outer boundary of Zone C is defined as the area commonly overflown by aircraft at an altitude of 1,000 feet or less above ground level. Locations beneath the traffic pattern and pattern entry points are included in Zone C, as well as lands within the Federal Aviation Regulations (FAR) Part 77 transitional and horizontal zones. Restrictions on objects greater than 70 feet in height may be required. Within this zone, risk is a concern mostly only with respect to uses such as schools, hospitals, and ones involving very high use intensities.

Additionally, annoyance associated with aircraft overflights is a concern within Zone C. Land uses are subjected to frequent aircraft noise events in this zone despite the fact that the zone is mostly located outside the 55-dB CNEL contour. Airport noise is discussed in Section IV.H, Noise.

The ALUCP defines Zone B2 as the extended approach/departure zone for the airport and may also include some land lateral to the runways. This zone is affected by moderate degrees of risk. Aircraft overfly much of this area at altitudes of less than approximately 600 feet above the runway elevation on either visual or straight-in instrument approaches. The State Department of Transportation's Airport Land Use Planning Handbook indicates that 10-15% of near-airport general aviation aircraft accidents occur within the area comparable to that defined by Zone B2³.

2. Impacts and Mitigation Measures

This section outlines hazardous materials impacts that may result from implementation of the proposed project and recommends mitigation measures, as necessary. Less-than-significant public health and hazards impacts are listed first, followed by significant impacts.

² Butte County, 2000. *Butte County Airport Land Use Compatibility Plan*. December 20.

³ Ibid.

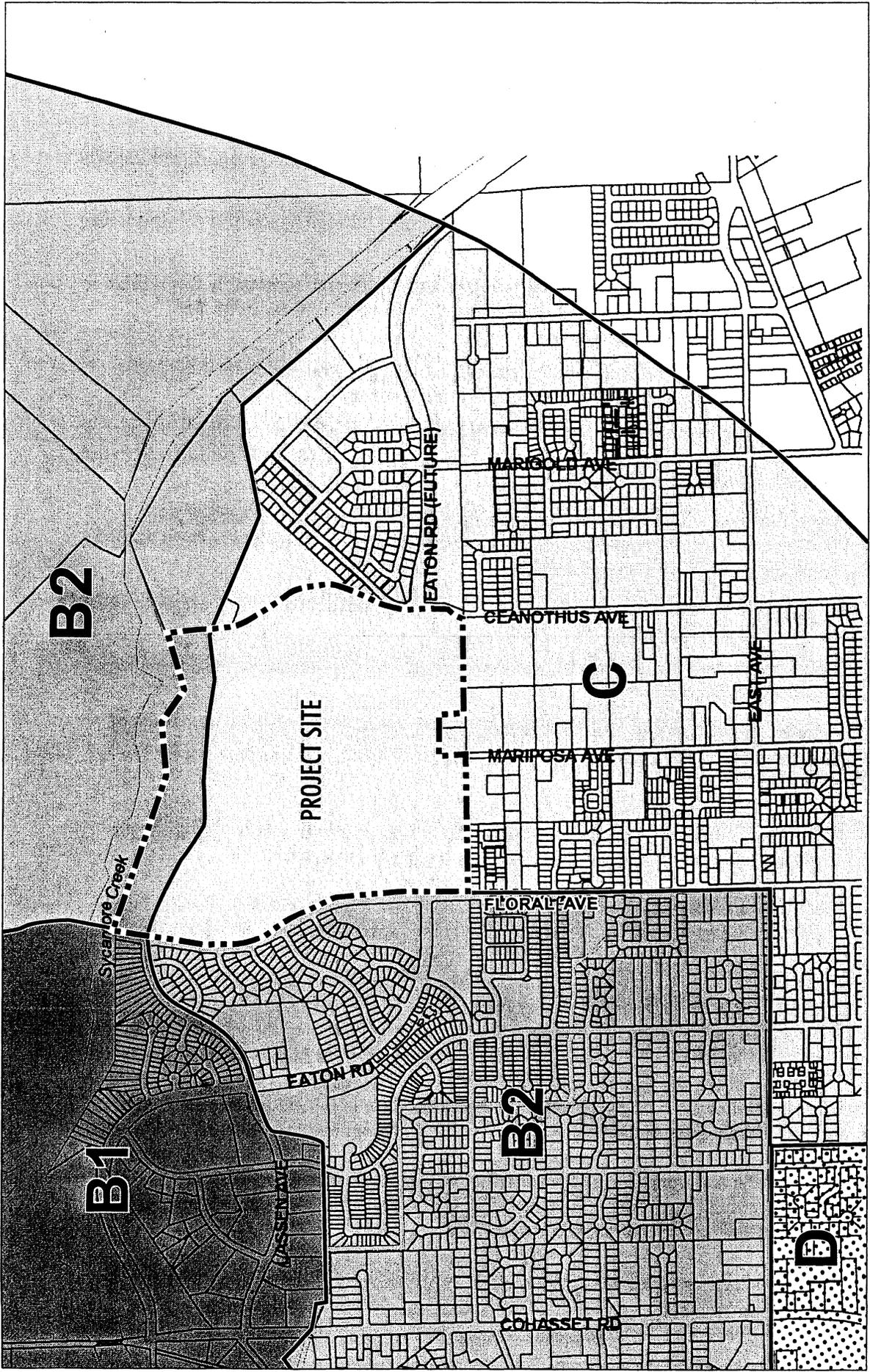
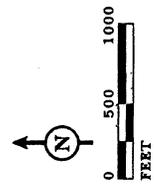


FIGURE IV.E-1

Sycamore Glen/Mountain Vista EIR
 Airport Compatibility Zones

LSA



SOURCE: CITY OF CHICO; KORVE ENGINEERING & BLAYNEY DYVETT, 1994

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a. **Significance Criteria.** The proposed project would be considered to have significant impacts to public health and hazards if it would:

- Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials.
- Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment.
- Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school.
- Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would create a significant hazard to the public or the environment.
- For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, result in a safety hazard for people residing or working in the project area.
- For a project located within the vicinity of a private airstrip, result in a safety hazard for people residing or working in the project area.
- Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan.
- Expose people or structures to a significant risk of loss, injury or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands.

b. **Less-than-Significant Impacts.** The following discussion describes less-than-significant public health and hazards impacts that would result from the proposed project:

(1) **Electric and Magnetic Fields.** The project proposes the construction of multi-family residential units directly east of the PG&E substation, which is surrounded by a chainlink fence. Mariposa Avenue would border the substation to the west and Eaton Road would border to the north. Multi-family residential units are proposed to the west side of Mariposa Avenue, and single-family residential units are proposed on the north side of Eaton Road. A site plan showing building footprints for the future multi-family development has not been submitted to the City as part of the development package. The multi-family units would be located adjacent to transmission lines along the southern boundary of the site that connect to the substation. According to the City, the applicant would be responsible for screening the substation from public view to adhere to the fencing and screening requirements set forth in the City's Land Use and Development Regulations.

The electrical substation and transmission lines are a source of electromagnetic fields (EMFs) that could potentially affect future residents of the site. The following discussion summarizes the available information about potential hazards from EMFs.

EMFs are imperceptible energy emissions located at the low end of the electromagnetic spectrum, produced by alternating current as it surges in electric wires. As the term "electromagnetic" suggests, EMFs have two components, an electric charge and a magnetic attraction. Electrical fields

are a by-product of the electrical current, but can be found even when electricity is not flowing through the conductor. Magnetic fields, on the other hand, are created by the movement of the current through a conductor. A stronger current would create a stronger magnetic field. One of the principal concerns about magnetic fields, as opposed to electrical fields, is that the former are almost impossible to shield.⁴ The overall strength of EMFs dissipates quickly with increases in distance from the source.

There has been public concern about the potential health effects, particularly leukemia in children, associated with long-term exposure to EMFs from such sources as transmission lines, electrical facilities, and appliances. Determining what effects, if any, low-frequency fields may have on living tissue over long periods of time has proven to be a very difficult scientific challenge. The human body's cells have their own electric fields, and some laboratory studies have shown that these internal fields can be disrupted by exposure to even low-energy EMFs. Additionally, low level fields are emitted by home wiring, appliances, and electric blankets.

A number of studies have looked at the potential health hazard posed by the long-term exposure of both animals and humans to low-frequency electromagnetic radiation. Since 1980, more than 90 epidemiological studies have been performed to determine whether there is a link between EMFs and potential health effects. Although some studies have found a link between EMFs and increased birth defects in animals, or an increased risk of cancer, especially leukemia, lymphomas, and brain cancer, in electrical workers or even in children living near high-voltage power lines, other studies have found no clear link. In recent years, several commissions and expert panels have concluded that there is no convincing evidence that high-voltage power lines are a health hazard or a cause of cancer.⁵ The largest and most comprehensive U.S. study to date, recently conducted by the National Cancer Institute, did not identify any link between EMF levels and acute lymphoblastic leukemia in children.⁶

In 1996, a three-year study was concluded by a 16-member committee of the National Research Council, an arm of the National Academy of Sciences.⁷ This study entailed review of research papers and interviews with experts to address three kinds of health effects associated with EMFs – cancer (primarily childhood leukemia), reproduction and development, and neurobiological effects. The conclusion was that a statistically significant, but small, risk of rare childhood leukemia is associated with living in homes situated near large groupings of power lines. However, the study also stated that there was no clear evidence that electric and magnetic fields generated by these power lines are the cause of the cancer. The National Research Council has requested that more

⁴ Merritt, Robert. "Electromagnetic Fields: Policy, Planning and Litigation." *Land Use and Environmental Forum*, 3:4. Fall 1994, page 2.

⁵ Campion, E.W., M.D., Power Lines, Cancer, and Fear, *New England Journal of Medicine*, 3 July, 1997.

⁶ Linet, M.S., M.D., et. al, Residential Exposure to Magnetic Fields and Acute Lymphoblastic Leukemia in Children, *New England Journal of Medicine*, 3 July, 1997.

⁷ National Research Council, Committee on the Possible Effects of Electromagnetic Fields on Biological Systems. *Possible Health Effects from Exposure to Residential Electric and Magnetic Fields* (pre-publication summary). ISBN 0-309-05447-8. 1996.

research be funded to pinpoint the unexplained factor or factors that cause the small increase in childhood leukemia in houses close to power lines.⁸

A study by the power industry found no correlation between health problems and EMF exposure among transmission line workers. However, the Environmental Protection Agency has concluded that EMFs are “a possible, but not proven, cause of cancer in people.” At this time, it is impossible to say whether EMFs pose any health risk, and if so, at what level of exposure risk develops.⁹

No health-based standards for EMF exposure currently exist because it is not possible to identify field strengths at which health effects are unlikely to occur. In addition, there is an absence of a scientific model of the mechanism by which EMF exposure might affect humans (i.e., what aspect of fields is important in determining risks from exposure such as the average peak field strength, peak current induced in the body, or time spent in the field). However, it has definitely been shown that increased distance from transmission lines results in lower strengths of magnetic fields.¹⁰

Given the uncertainties related to the potential health impacts associated with EMFs, some jurisdictions have decided not to allow construction of housing near high voltage transmission lines. Required setbacks in communities that have instituted such restrictions range from 300 to 1,000 feet on either side of the lines right-of-way, but many communities continue to allow residential construction up to the edge of the right-of-way. Some communities also require that developers formally disclose the potential health risks of EMFs to homebuyers. Since there are no clear standards available at this time indicating whether health risks from EMFs exist, some experts think that development restrictions are not appropriate. Chico has adopted policies to protect the community from unreasonable risks associated with EMF hazards and Policy S-I-28 from the City’s General Plan Safety Element requires that the City monitor available information regarding possible health hazards of EMFs and take appropriate action to reduce hazardous exposure. Experts agree that prudent avoidance, such as minimizing use of appliances and electric blankets, making sure all wiring is grounded, and locating living space away from electric supply lines, is the best approach to addressing this type of exposure.

As no specific health effects of EMFs have been conclusively demonstrated, there are no health-based standards for EMF exposure. There are also no federal, State, or local standards or regulations addressing residential exposure to EMFs. The City has no required setbacks from sources of EMFs.

As there are no health-based or regulatory risk standards for EMFs, describing impacts of the current or potential effects of EMFs would necessarily be speculative in nature. *CEQA Guidelines* state that if, after thorough investigation, a lead agency finds that a particular impact is too speculative for evaluation, the agency should note its conclusion and terminate discussion of the impact.¹¹ Pursuant

⁸ San Francisco Chronicle. *Scientists See No Risk in EMFs*. November 1, 1996.

⁹ University of California at Berkeley. *Wellness Newsletter*. Volume 7, Issue 6. March 1991.

¹⁰ U.S. Office of Technology Assessment. *Biological Effects of Power Frequency Electric and Magnetic Fields*. 1989.

¹¹ *CEQA Guidelines*, Section 15145.

to this section, the assessment of the effects of EMFs in this EIR is limited to the qualitative discussion above and no significant impacts related to EMFs are identified.

(2) Routine Transport, Use, or Disposal of Hazardous Materials. Implementation of the proposed project would result in the development of approximately 680 residential units and a small commercial center. Therefore, it is not anticipated that large quantities of hazardous materials would be permanently stored or used within the project site. Similarly, the project would not emit hazardous emissions or handle hazardous materials. Small quantities of publicly-available household hazardous materials (e.g., paint, maintenance and cleaning supplies) would be routinely used within the project site for maintenance and cleaning purposes. However, these materials would not be stored or used in quantities that could create a substantial risk of fire or explosion, or otherwise pose a substantial risk to human or environmental health. Therefore, implementation of the proposed project would not create a permanent significant hazard to the public or environment through the routine transport, use, or disposal of hazardous materials.

(3) Release of Hazardous Materials Through Upset or Accident Conditions. Construction of residences, roadways, and landscaping features at the project site will require the use and transport of hazardous materials. These materials will include fuels, oils, and other chemicals used during construction activities. Improper use and transportation of hazardous materials could result in accidental releases or spills, potentially posing health risks to workers, the public, and environment. However, compliance with standard construction practices for the use, storage, and transportation of these products would reduce the potential impact to a less-than-significant level.

(4) Hazardous Emissions Near Schools. CEQA Section 21151.4 states that no EIR or negative declaration shall be approved for a potentially hazardous project within 1/4 mile of a school facility. Pleasant Valley High School is the closest school in the vicinity of the project site, 0.9 miles away, and the proposed project is not considered a hazardous air emitter. Therefore, it is not necessary to consider the potential impacts of the proposed project on the schools. Air emissions are further discussed in Section IV.B, Air Quality, of this EIR.

(5) Hazardous Materials Sites. As stated in the setting section, the ESA prepared for the project site determined that there were no known hazardous waste sites in the vicinity of the project site. Additionally, site reconnaissance revealed no hazardous materials on the site. The risk of exposure to the public or environment from hazardous materials is considered less-than-significant.

(6) Airport Safety Hazard. As stated previously in the Setting section, the ALUCP classifies the northern portion of the project site as Zone B2 (area of moderate risk). The boundary of Zone B2 extends eastward into the site from Lassen Avenue. With the exception of two residential lots (Lots 56 and 57) planned at the northwest corner of the Mountain Vista subdivision, and the storm water treatment lots, all of Zone B2 is designated as an open space preserve within the project boundaries. The remainder of the proposed development would be located within Zone C, which permits residential uses. As stated in the definition of Zone C, "Risk is a concern mostly only with respect to uses such as schools, hospitals, and ones involving very high usage intensities." Therefore, the project would not result in a significant safety hazard from airport overflights for people residing or working in the project site. However, review of the project by the Airport Land Use Commission will be required.

(7) **Emergency Response Plan.** The General Plan does not list an emergency response plan or emergency evacuation plan. Access to the site and vicinity will be improved by the planned extension of Eaton Road, which borders the site to the south. The project will be designed as a standard residential subdivision and will comply with city requirements for emergency access. The project would not interfere with the implementation of an emergency response plan or emergency evacuation plan.

(8) **Wildland Fires.** The General Plan identifies the foothill areas east of the project site as susceptible to wildfire. The Chico Fire Department would be the first responder to this area. Urbanization of the areas immediately east, west, and south of the project site has decreased the risk for wildland fire on the project site. Therefore, risks to people or structures from wildland fires are considered less-than-significant.

c. **Significant Impacts.** Implementation of the proposed project will not result in any significant impacts related to hazards and hazardous materials.

d. **Cumulative Impacts.** The project would not combine with the impacts of any other projects to result in significant cumulative impacts related to hazards and hazardous materials.

F. HYDROLOGY

1. Setting

a. Local and Regional Hydrology. The project area is situated along the eastern side of the Sacramento Valley, which is within a Mediterranean subtropical climate zone. The area is characterized by hot, dry summers with occasional temperatures above 100 degrees, and by wet, cool winters with some temperatures below freezing. Rainfall in the area averages about 25 inches annually, with the majority falling between November and May. Potential evapotranspiration (i.e. the sum of evaporation and vegetation transpiration) for the area is about 52 inches per year.

Sycamore Creek flows along the northern boundary of the project site. The creek is an intermittent (bordering on ephemeral) drainage and supports little vegetation. Upstream of the site, Sycamore Creek is fed by the Sycamore Creek Diversion Channel, built in 1966 to divert high winter flows from the Big Chico Creek watershed into Sycamore Creek and Mud Creek to alleviate potential flooding problems in downtown Chico. The channel levees can contain the 100-year flood flow of about 8,800 cubic feet per second. Sycamore Creek flows westerly, ultimately confluencing with Mud Creek and then the Sacramento River west of Chico. The reach of the drainage within and adjacent to the project site is primarily composed of glides and pools; the substrate is predominantly silt.

The terrain on the project site is predominantly flat. The majority of the site slopes gently to the west, except for the extreme northern portion of the site, which slopes north toward Sycamore Creek. Elevation of the site ranges from approximately 200 feet to 240 feet above mean sea level. Vegetation on the site consists of nonnative grasslands. Vernal pools and swales are located throughout the site. The vernal pools are seasonal wetlands that pond water for short periods during the winter and early spring due to an impermeable, subsurface layer that retards percolation. The duration of ponding varies depending on the depth of the pools and timing and quantity of rainfall.

b. Regulatory Setting. Grading activities are regulated by Chapter 16.28 of the City of Chico Municipal Code. Individual projects are required to comply with applicable standards. The requirements are intended to reduce the potential water quality impacts of grading by controlling runoff and the amount of sediment released off the site, protecting exposed slopes through revegetation, requiring the proper disposal of cleared material and fill, and requiring the proper handling of excavated materials.

The City's Best Practices Manual and Best Technical Manual (BPTM) compiles existing City guidelines, codes, policies, programs, and standardized mitigation measures related to General Plan policies. The manual also incorporates the regulatory standards of other federal, state, and regional agencies. Regulations specific to stormwater runoff and water quality include General Plan policies, a Standard Mitigation and Monitoring Program, Best Management Practices (BMPs), Grading Standards, Erosion Control Standardized Notes, and RWQCB construction stormwater permit requirements. For the purposes of this analysis, it is assumed that the relevant requirements set forth in the manuals would be implemented during development of the proposed project.

The City recently completed a Storm Drainage Master Plan (SDMP) and a draft Stormwater Management Program (SWMP) (City of Chico, 2003). The SDMP identifies physical improvements to manage runoff generated by urban development in Chico. The SDMP identifies specific streams

where certain storm drainage system improvements or modifications would be implemented, specifically managing peak flows generated by urbanization. Under the City's program, the City's Public Works Department reviews new construction projects during the development phase to ensure compliance with the NPDES stormwater permit for general construction activity. The SWMP also identifies City public education and outreach, public participation and involvement, post-construction runoff control practices, pollution prevention and good housekeeping activities, and program evaluation activities. The Department reviews projects to ensure that long-term stormwater drainage facilities are implemented and are consistent with the City's overall stormwater conveyance and water quality protection strategies.

2. Impacts and Mitigation Measures

a. **Criteria of Significance.** The project could result in significant hydrological impacts if it would:

- Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site;
- Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff;
- Place housing within a 100-year flood hazard area, as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map;
- Place structures within a 100-year flood hazard area that would impede or redirect flood flows;
- Expose people or structures to a significant risk of loss, injury or death involving flooding, including flooding as a result of the failure of a levee or dam; or
- Substantially degrade the quality of surface waters.

b. **Less-than-Significant Impacts.** Implementation of the project would result in the following less-than-significant impacts.

(1) **Alternations to the Existing Drainage Pattern.** Implementation of the proposed project would result in development of the southern portion of the site with residential and commercial uses, while 56 acres in the northerly portion of the site south of Sycamore Creek would be preserved as open space. Drainage from the developed portion of the project would be conveyed northward in three separate drainage easements to three separate stormwater treatment basins located at the northern portion of the site, along Sycamore Creek.

Implementation of the project would alter the drainage pattern of the site through the grading of the development area into development pads. Runoff from these pads and streets would be conveyed into a storm drainage system that would convey runoff to three stormwater treatment basins. Within the open space preserve, there would be no substantial alteration to the existing drainage pattern. By preserving and restoring vernal pools and swales in the northern portion of the site, the pools and swales would not be impacted by the development area, because the natural drainage pattern flows to the south and west, and not toward Sycamore Creek. Because runoff from the developed area of the project would be conveyed northward to Sycamore Creek, rather than west, the drainage pattern would be altered. However, this change is not considered significant.

(2) **Flooding.** The Sycamore Creek drainage, located at the northern portion of the site, is within Flood Zone AE, while the remainder of the site is located within Flood Zone X (areas outside of the 500-year floodplain).¹ Further, the site is outside of the inundation areas for the Shasta, Wiskeytown, and Black Butte dams. Therefore, there are no flooding risks at the project site.

c. Significant Impacts and Mitigation Measures.

(1) Increase in Stormwater Runoff and Impacts to Water Quality.

Impact HYDRO-1: Increased stormwater runoff from the project could impact downstream sources. (S)

The proposed project would result in a significant increase in the amount of impervious surfaces on site, through the construction of streets, homes, driveways, and other paved surfaces. In addition, irrigation of domestic landscaping would add to runoff from the development. Three stormwater treatment basins are proposed to treat all runoff from the developed portion of the site prior to release of the water into Sycamore Creek. The basins would be designed similar to the basin located in the Foothill Park East project, immediately east of the site. Due to the anticipated size and design of the proposed basins, it is expected that dry season runoff from the development would evaporate in the basin, prior to its reaching Sycamore Creek. The project's contribution to runoff in the creek during the wet season would be small in comparison to the total flow of the creek. The City's Storm Drainage Master Plan (2000) does not identify the need for detention along Sycamore Creek. The Storm Drainage Master Plan concludes that the absence of peak attenuation facilities on Sycamore Creek would not adversely affect peak flow conditions in the creek. Runoff would be treated on-site in the proposed basins prior to being released into Sycamore Creek.

The stormwater treatment basins proposed adjacent to Sycamore Creek would be expected to adequately treat dry season and stormwater runoff from the project site prior to discharge into the Creek. However, if the structures and their discharges are improperly designed, or if inadequate erosion control measures are not implemented during construction or implementation of the basins, surface water quality impacts could result.

The project may also affect Sycamore Creek where the stormwater would discharge into the channel after leaving the three stormwater treatment basins. It is likely that energy dissipaters and/or erosion control measures will be required at these locations which could result in minor impacts to the creek. The impacts, if any, will not affect wetlands as none are present in the subject section of the stream. However, since these impacts could affect an intermittent stream, they are considered potentially significant.

Because the proposed stormwater treatment basins have not yet been designed, and hydrology studies have not been conducted, Mitigation Measure HYDRO-1 requires the preparation of a storm drainage plan. Mitigation Measure HYDRO-1 also addresses potential impacts during construction of the project.

¹ Federal Emergency Management Agency, 1998. Field Insurance Map, Parcel No. 06007C0340C. June 8.

Mitigation Measure HYDRO-1: Prior to approval of grading plans for the proposed project, the applicant shall submit a storm drainage plan to the Department of Public Works for review and approval in accordance with the standards set forth in the City's adopted Storm Drainage Master Plan (2000). The applicant shall also be responsible for obtaining the necessary regulatory permits from the Corps, RWQCB, and CDFG. The storm drainage plan shall be based on criteria including, but not limited to:

- Incorporation of all relevant BMPs included in the City's Best Practices Manual related to stormwater drainage, including interception of "first-flush" contaminants from the initial 0.5-inch of rainfall for each storm event.
- The design and selection of BMPs will be based on site-specific considerations such as geology, topography, and hydrology.
- Given the site-specific conditions of the project area and presence of sensitive vernal pools in the area, the drainage plan will generally include limiting soil disturbances near vernal pools during the winter rainfall season.

Relevant BMPs include, but are not limited to, the following:

- The use of grassed swales as opposed to culverts, for runoff conveyance. Grassed swales reduce runoff velocities, thereby decreasing peak runoff rates.
- Preservation of existing vegetation to the extent possible by flagging or fencing to avoid disturbance.
- Installation of soil stabilization BMPs, such as mulching, erosion control fabrics, and/or reseeding with grass or other plants.
- Reducing vehicle tracking of sediment onto paved surfaces during the winter rainfall period by vehicle washing and street sweeping.
- Implementation of hazardous materials management practices to reduce the possibility of chemical spills or releases of contaminants.
- Establishing staging areas for heavy equipment and construction materials so that inadvertent spills of oil, grease, asphalt, other petroleum by-products, or other hazardous materials will not be discharged into sensitive wetland areas. All machinery will be properly maintained and cleaned to prevent spills and leaks.
- Regular inspection and maintenance of BMPs to ensure they are in good working order.

The storm drainage plan shall be prepared by a registered civil engineer and will be in conformance with City and state agency stormwater guidelines, including procurement of a General Stormwater Permit and/or water quality certification.

Level of Significance After Mitigation. Mitigation Measure HYDRO-1 would mitigate impacts to the banks of Sycamore Creek to less-than-significant. (LTS)

d. Cumulative Impacts. The proposed project would contribute stormwater runoff to Sycamore Creek during the wet season, increasing the flow of the creek. However, the City's Storm Drainage Master Plan (2000) does not identify the need for detention on Sycamore Creek. The Storm Drainage Master Plan concludes that the absence of peak attenuation facilities on Sycamore Creek would not adversely affect peak flow conditions in the creek. Runoff would be treated on-site in the proposed basins prior to being released into Sycamore Creek. Therefore, the project is not expected to result in any significant cumulative hydrology impacts.

G. LAND USE

This section describes existing land uses at the project site and the surrounding area and evaluates the proposed project's consistency with applicable land use policies and regulations. Land use policies from the City of Chico General Plan and Municipal Code Title 19, Land Use and Development Regulations are summarized and potential land use and public policy impacts are identified.

1. Land Use Setting

The following section describes existing land use of the project site and its vicinity.

a. Existing Land Uses Within the Project Site. The project site totals approximately 175 acres. The site is undeveloped and habitat consists of mostly flat, nonnative grassland with vernal pools and swales.

b. Existing Land Uses Within Vicinity of the Project Site. Land uses in the area are comprised of residential and open space uses. The project is bordered by single- and multi-family housing to the west, single-family housing and a PG&E substation to the south, and single-family housing to the east. The area north of the project site is open space. Sycamore Creek generally serves as the north boundary of the project site.

c. Planned Development. The area southwest of the project site is generally buildout. An open space preserve is located to the north, and the area to the east is currently sparsely developed. However, applications for a significant number of residential development projects have been submitted to or approved by the City for properties in the vicinity of the site, mainly to the south and east. The majority of this activity is concentrated in the area north of East Avenue and east of Floral Avenue. One of the largest projects is Foothill Park East, located immediately east of the project site. The project is being developed in phases by Drake Homes, and anticipates the development of nearly 500 additional units (including up to 285 multi-family units) in phases III to IX of the project. In addition, the Mariposa Vista project (Parts I and II), located immediately south of the Sycamore Glen subdivision between Mariposa Avenue and Ceanothus Avenue, is approved for 318 units. Most other projects proposed in the vicinity of the site are smaller, typically with less than 50 units each.

2. Regulatory Context

a. City of Chico General Plan. The City of Chico General Plan (General Plan), adopted in November 1994 and updated February 1999, is a description and guide of how the City intends to develop. The General Plan designates the general distribution of different types of land uses within the City, and serves as a point of reference for public officials when making land use and development decisions.

The General Plan addresses the following elements: Community Design; Land Use; Transportation; Parks, Public Facilities and Services; Economic Development; Open Space and Environmental Conservation; Safety and Safety Services; Noise; and Housing. The General Plan establishes Guiding and Implementing Policies that apply to the planning area, which in turn establish planning requirements, programs, standards, and criteria for project review. Guiding Policies are the City's statements of its goals and philosophy, while Implementing Policies represent commitments to specific

actions. These policies were designed to be combined to articulate a vision that the General Plan seeks to achieve for Chico.

The General Plan land use designations for the project site are shown in Figure IV.G-1 for the eastern parcel of the project site (Sycamore Glen) include Low Density Residential and Open Space for Environmental Conservation/Safety. The western parcel (Mountain Vista) is designated as Medium-High Density Residential, and Open Space for Environmental Conservation/Safety and Low Density Residential. A Mixed-Use Neighborhood Core is also identified on the General Plan diagram across both properties.

b. City of Chico Municipal Code – Title 19, Land Use and Development Regulations. The broad purposes of the Title 19, Land Use and Development Regulations, are to protect and promote the public health, safety, and general welfare of the people of the City of Chico by adopting a zoning map and regulations designed to carry out the goals, objectives, and policies of the Chico General Plan. Figure IV.G-2 shows the zoning designations for the project site and the vicinity.

c. Definitions. The following are definitions of current and future General Plan and zoning designations:

(1) General Plan Land Use Designations.

- **LDR (Low Density Residential).** From 2.10 to 6 units per gross acre (5.3 to 15 persons per gross acre), except that planned development may be allowed at seven units per gross acre. Typical lots would be 6,000 square feet, but the minimum would be 5,000 square feet, and smaller lots (4,500 square feet or less) may be permitted in neighborhoods meeting specified community design standards, subject to specific review requirements. This classification is mainly intended for detached single-family dwellings, but attached single-family units may be permitted, provided each unit has ground-floor living area and private outdoor open space. The average density assumed for General Plan build out calculations is 4.5 units per gross acre.
- **MHDR (Medium-High Density Residential).** From 14.01 to 22 units per gross acre (31.0 to 48.4 persons per gross acre). Dwelling types may include townhouses, garden apartment, and other forms of multi-family housing. The average density assumed for General Plan buildout calculations is 17 units per gross acre.
- **MUNC (Mixed-Use Neighborhood Core).** This designation accommodates businesses, institutions, and service organizations serving the daily needs of nearby residents. Allowable uses include retail shops, small-scale financial, business and personal services and small-scale restaurants; the maximum non-residential Floor Area Ratio is 1.0. Upper-story residential uses are permitted, subject to appropriate standards and a maximum of 22 units per gross acre. Limitations on the size and location of parking, coupled with building orientation and design standards, will ensure that a pedestrian-oriented environment is created.
- **Open Space for Environmental Conservation/Safety.** This designation includes sensitive habitats including oak and riparian woodlands, wetlands, creek ways, riparian corridors, groundwater recharge areas, power transmission line corridors, areas providing range for Eastern Tehama Deer herds and other hillside areas; viewshed management areas, and areas subject to flooding which are not areas for agriculture. Areas with sensitive biotic habitats included in this classification are further classified as Resource Conservation Areas (RCAs) or Resource

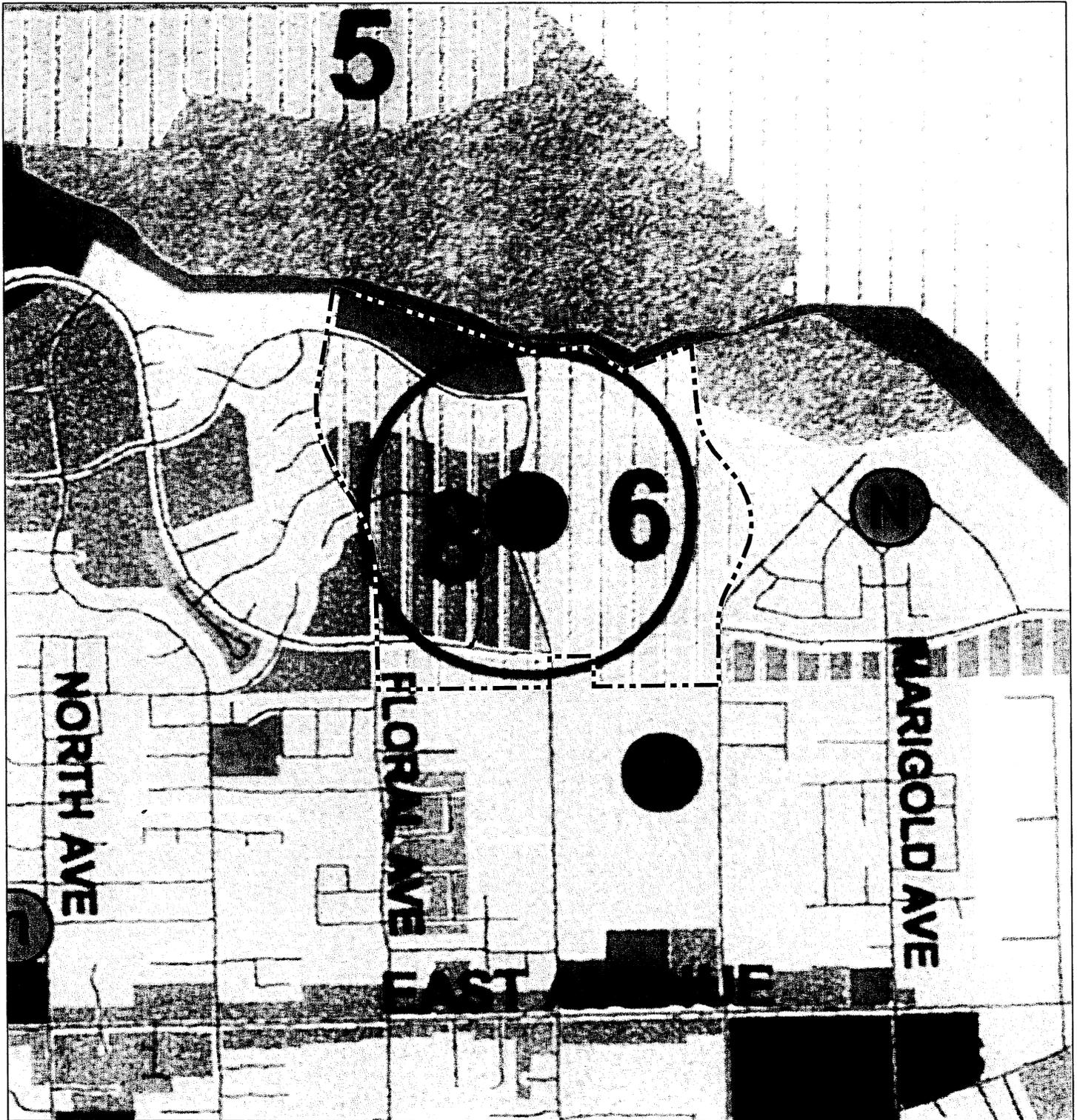


FIGURE IV. G-1

LSA

Existing
 ES - Elementary School
 JHS - Junior High School
 HS - High School
 H - Hospital

Future
 es - Elementary School
 hs - High School
 n - Neighborhood park
 c - Community Park

- Rural Residential
- Very Low Density Residential
- Low Density Residential
- ▨ Medium Density Residential
- ▨ Medium High Density Residential
- ▨ High Density Residential
- Downtown
- ▨ Community Commercial
- ▨ Commercial Services
- ▨ Mixed-Use Neighborhood Core
- ▨ Visitor Services
- ▨ Offices

- ▨ Manufacturing and Warehousing
- ▨ Industrial Park
- ▨ Public Facilities and Services
- ▨ Parks
- ▨ Creekside Greenways
- ▨ Open Space for Environmental Conservation/Safety
- Open Space for Agriculture/Resource Management
- Project Boundary
- 1/4 Mile Walking Distance Radius

*Sycamore Glen/
 Mountain Vista EIR*
 General Plan Designations

SOURCE: CITY OF CHICO 2003.

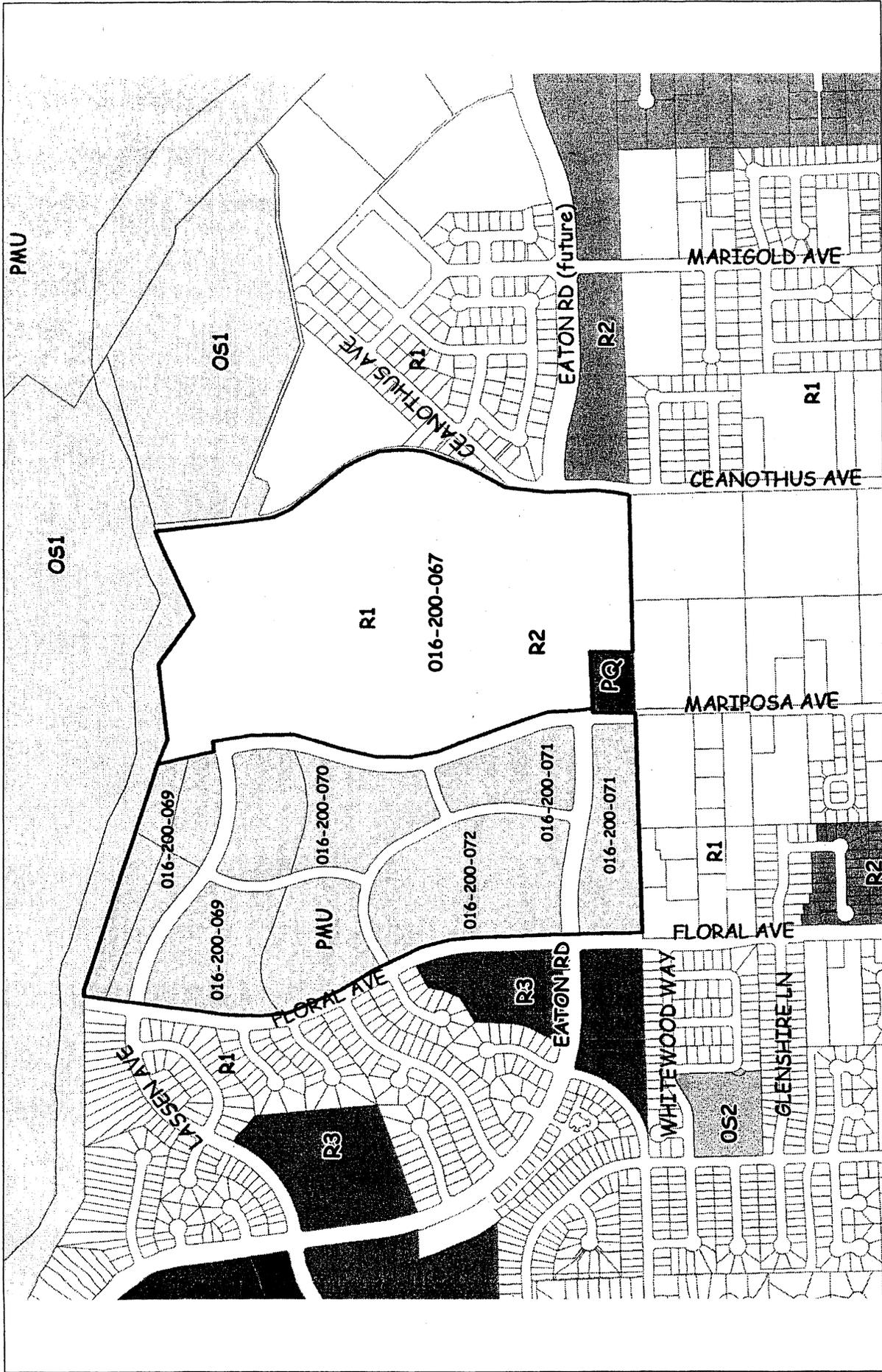


FIGURE IV.G-2

Sycamore Glen/Mountain Vista EIR
Zoning Designations

- LEGEND**
- R1 Low Density Residential
 - R2 Medium Density Residential
 - R3 Medium-High Density Residential
 - PMU Planned Mixed-Use
 - PQ Public/Quasi Public Facilities
 - OS1 Primary Open Space

LSA



NOT TO SCALE

SOURCE: CITY OF CHICO 2003.

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Management Areas (RMAs). Development in these areas would be subject to habitat protection standards. For RMAs, Resource Management Plans would be required as a condition of development approval. For properties that are designated Open Space for Environmental Conservation/Safety along with a residential land use designation (e.g. Low Density Residential or Medium-High Density Residential), the City's Housing Element has assumed a 50 percent reduction in buildable acreage.

(2) Zoning Designations.

- **R1 (Low Density Residential).** The R1 zoning district is applied to parcels appropriate for traditional neighborhoods consisting of attached or detached single-family housing units. Permitted densities range from a minimum of 2.01 to a maximum of six units per acre (up to seven units per acre may be approved through the planned development permit process or in compliance with the small lot subdivision standards). The R1 zoning district is consistent with the Low Density Residential land use classification of the General Plan. The designation of an area in the R1 zoning district may include establishing specific minimum parcel area requirements for new subdivisions, expressed as a suffix to the R1 zoning map symbol.
- **R3 (Medium-High Density Residential).** The R3 zoning district is applied to parcels appropriate for medium-high density residential neighborhoods. Permitted densities range from range from a minimum of 14.01 to a maximum of 22 units per acre. The R3 zoning district is consistent with the Medium-High Density Residential land use classification of the General Plan.
- **PMU (Planned Mixed-Use).** The PMU zoning district is applied to large areas, either vacant or suitable for redevelopment, as an interim or holding zone district until a specific plan establishes a variety of uses with precise zoning classifications. The PMU zoning district is consistent with all land use classifications of the General Plan, subject to the approval of a planned development permit or a specific plan.
- **-RM (Resource Management) Overlay Zone.** The Resource Management overlay zone is intended to ensure orderly planning for the development of large, unsubdivided areas of the City with sensitive biotic resources that are not suitable for designation in the OS2 (Open Space Secondary) zoning district; maintain a sustainable environment consistent with existing biotic resources, soils, geology, topography and drainage patterns; avoid development that would result in adverse or unmitigated environmental impacts; and encourage sensitive site planning and design. The RM overlay zone may be combined with any primary zoning district, but should only apply to areas of at least 2 acres that are identified by the General Plan as Resource Management Areas. Proposed development and new land uses within the RM overlay zone shall comply with the development standards of the primary zoning district, all other applicable provisions of the Land Use and Development Regulations, any conditions of approval providing measures to preserve and protect existing resources. Subdivisions of land shall not be permitted except in compliance with required mitigation measures for resource preservation and protection. Proposed structures shall be clustered where necessary to preserve and protect identified resources.

3. Impacts and Mitigation Measures

The following discussion describes land use impacts associated with implementation of the project. The subsection begins with the criteria of significance, which establish the thresholds for

determining whether an impact is significant. The latter part of this subsection presents the impacts associated with the proposed project. Conflicts between a project and applicable policies do not constitute significant physical environmental impacts in and of themselves: as such, the proposed project's consistency with applicable policies is discussed separately from the physical land use impacts associated with the proposed project. However, questions of policy consistency are used to inform analysis of the physical environmental implications of a project. That is, a policy inconsistency is considered to be a significant adverse environmental impact only when it is related to a policy adopted for the purpose of avoiding or mitigating an environmental effect and it is anticipated that the inconsistency would result in a significant adverse physical impact. The proposed project's consistency with regional policies related to physical environmental topics (e.g., air quality, transportation, and noise) is fully analyzed and discussed in those topical sections of this EIR.

a. Criteria of Significance. Implementation of the project may result in a significant effect on land use if it would:

- Physically divide an established community.
- Result in a fundamental conflict between adjacent or nearby land uses.
- Fundamentally conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the project, including, but not limited to the City of Chico General Plan and zoning regulations adopted for the purpose of avoiding or mitigating an environmental effect and actually result in a physical change in the environment.

b. Land Use Impacts. Following is a summary of the less-than-significant land use impacts that would result from implementation of the proposed project.

(1) Less-Than-Significant Land Use Impacts. The following discussion describes land use impacts associated with the implementation of the proposed project.

Division of a Community. The physical division of an established community typically refers to the construction of a physical feature (such as an interstate highway or railroad tracks) or removal of a means of access (such as a local road or bridge) that would impair mobility within an existing community, or between a community and outlying areas. For instance, the construction of an interstate highway through an existing community may constrain travel from one side of the community to another; similarly, such construction may also impair travel to areas outside of the community.

The project proposes a low and medium-high density residential development as an infill project within an existing residential area. A small neighborhood commercial site is also planned. The site is surrounded on the south, east, and west by similar low to medium-density residential subdivisions.

The project would not disrupt or divide the physical arrangement of an established community; it would change the land use on the site to a use (primarily residential) that is found throughout the surrounding area and is consistent with the General Plan. The project would also provide connectivity to existing residential uses east and west of the project area, where no convenient connection current exists.

Introduction of New Land Uses. Residential uses at the project site would not conflict with existing residential or open space uses in the vicinity. During construction, impacts related to noise, air quality, and traffic could occur due to the proximity of residential units to the site. These potential secondary impacts are addressed in other sections of the EIR.

The addition of commercial uses at the project site (proposed for the northeast corner of Floral Avenue and Eaton Road) would change the configuration of land uses that currently exists. However, the addition of commercial uses within the project site is consistent with General Plan MUNC designation and would serve the surrounding neighborhoods, as well as benefit the area by increasing neighborhood activity and vibrancy. The neighborhood commercial use would also help to reduce the total vehicle miles traveled by residents in the vicinity. Therefore, the introduction of neighborhood commercial uses would not result in any incompatibility.

Implementation of the proposed project would not result in the development of uses that would be intrinsically incompatible with surrounding land uses (e.g., a power plant, factory, or other noise, air pollution, or hazard-generating land use). Development of the proposed residential project would not permanently interfere with the daily operations of surrounding land uses, including the residential uses to the south, east, and west, and the open space uses to the north of the project site.

Proposed residential and commercial land uses would not adversely affect surrounding uses. Surrounding land uses, including residential uses, are not of a type that would result in a fundamental land use conflict with the proposed residential and commercial uses.

(2) **Significant Land Use Impacts.** Implementation of the proposed project would not result in any significant land use impacts.

c. Policy Consistency.

(1) **General Plan.** As discussed in Chapter III, Project Description, the project would require a change to the City's General Plan diagram from Low Density Residential (LDR) to Medium-High Density Residential (MHDR) for 6.8 acres in the southern portion of the Sycamore Glen subdivision. The Mountain Vista site, designated as Open Space for Environmental Conservation/Safety and Low Density Residential, and Medium-High Density Residential with Mixed-Use Neighborhood Core (MUNC), would not require a zone change or General Plan Amendment. Alternatively, through a planned development, the land use designations and project densities for both projects may be blended for a single project. Under this approach, a GPA/rezone would not be necessary.

The proposed mixed-use project is generally consistent with the General Plan designation for the project site which permits residential, open space, and business, institutional, and service uses.

The project includes preservation, restoration, and enhancements of approximately 56 acres of permanent open space that would have a zoning designation of OS1, Primary Open Space with a - RM (Resource Management) Overlay district, after approval of the project. Additionally, the project would also provide usable open space to local residents in the form of a bike path, which would be located along the length of the open space area. Therefore, the proposed project is anticipated to be in compliance with the Open Space and Environmental Conservation Element.

An analysis of the project's consistency with relevant General Plan Land Use Element and Community Design Element policies is provided in Table IV.G-1. Potential policy conflicts are described individually below.

(2) Title 19, Land Use and Development Regulations. As part of the proposed project, a Rezoning is proposed for a portion of the project site, as discussed in Chapter III, Project Description. The Rezoning would change the existing zoning of the 6.8 acres in the southern portion of the Sycamore Glen site (south of the planned extension of Eaton Road) from R1/-RM (Low Density Residential with a Resource Management (-RM) Overlay Zone) to R3/-RM (Medium-High Density Residential with a Resource Management Overlay Zone).

The following analysis assumes that the Rezoning would be adopted, as proposed, and evaluates the project's consistency with the Land Use and Development Regulations. It is noted that, while the identified policy inconsistencies do not qualify as significant environmental impacts, the information in this section was taken into account as part of the analysis of the physical and environmental impacts identified in Chapter IV.

(3) Butte County Airport Land Use Compatibility Plan. Chico Municipal Airport, the busiest and largest airport in Butte County, is located 1.5 miles northwest of the project site. The airport currently handles nearly 70,000 aircraft takeoffs and landings annually and is home to more than 130 based aircraft. Chico Municipal Airport also includes a major fire attack aircraft base operated by the California Department of Forestry (CDF).¹

The project site is located within Zones C and Zone B2 of the Airport Influence Area Boundary set forth by the Butte County Airport Land Use Compatibility Plan (ALUCP) (see Figure IV.E-1). The majority of the project site is contained within Zone C. The northern portion of the project site is contained within Zone B2.

According to the ALUCP, Zone C contains the normal traffic pattern for both runways of the Chico Municipal Airport. The outer boundary of Zone C is defined as the area commonly overflown by aircraft at an altitude of 1,000 feet or less above ground level. Locations beneath the traffic pattern and pattern entry points are included in Zone C, as well as lands within the Federal Aviation Regulations (FAR) Part 77 transitional and horizontal zones. Restrictions on objects greater than 70 feet in height may be required. Within this zone, risk is a concern mostly with respect to uses such as schools, hospitals, and ones involving very high use intensities.

The ALUCP defines Zone B2 as the extended approach/departure zone for the airport and may also include some land lateral to the runways. This zone is affected by moderate degrees of risk. Aircraft overfly much of this area at altitudes of less than approximately 600 feet above the runway elevation on either visual or straight-in instrument approaches. The State Department of Transportation's Airport Land Use Planning Handbook indicates that 10 to 15 percent of near-airport general aviation aircraft accidents occur within the area comparable to that defined by Zone B2.²

¹ Butte County, 2000. *Butte County Airport Land Use Compatibility Plan*. December 20.

² Ibid.

Table IV.G-1: General Plan Policy Consistency

| General Plan Policy Number | Policy Summary | Project's Relationship to Policy |
|--|---|---|
| Guiding Policies: Growth and Physical Expansion | | |
| LU-G-2: | Promote infill development. | Consistent. The proposed project would develop a site which is bounded on three sides by existing residential development. It is considered infill development; thus, there is no conflict with Policy LU-G-2. |
| LU-G-3: | Ensure that new development is at an intensity to ensure a long-term compact form. | Consistent. The densities are consistent with the General Plan; and the proposed zone change would allow for more multi-family residential uses, allowing densities consistent with a long-term compact form. |
| LU-G-4: | Maintain long-term boundaries between urban and agricultural uses in the west, and urban uses and the hillside in the east, and limit expansion north and south to maintain compact form. The hillside is generally defined as the area where oak woodland habitat begins, approximately the 300-foot contour in all areas... | Consistent. The project site is designated as a Resource Management Area in the General Plan. The proposed project maintains the northern 1/3 of the site as open space. Areas north of Sycamore Creek are designated Resource Conservation Areas and Resource Management Areas. Thus, the project would limit expansion to the north and is consistent with Policy LU-G-4 |
| Guiding Policies: Residential Land Use | | |
| LU-G-6: | Preserve the scale and character of established neighborhoods. With growth, there is a need to ensure that the character of established neighborhoods is not lost. | Consistent. The proposed project would be consistent with the scale and character of existing residential uses, which are single- and multi-family. |
| LU-G-7: | Encourage new residential growth in the form of neighborhoods. | Consistent. The project is a residential development that provides street and bike connections to adjacent neighborhoods and open space. It is therefore consistent with Policy LU-G-7. |
| LU-G-10: | Improve community orientation of new residential developments. A community orientation calls for greater attention to the relationship between residences, streets and shared spaces, and does not require sacrifice of privacy or amenities. Gated neighborhoods isolate parts of the community from others and will not be allowed. | Consistent. The project is a residential development that provides street and bike connections to adjacent neighborhoods and open space. It is therefore consistent with Policy LU-G-7. |
| LU-G-11: | Provide for appropriate relationships between higher density and lower density residential areas, and require buffers of varying size between residential uses and non-residential uses without restricting foot and bicycles access. | Consistent. Multi-family housing is planned for the south side of Eaton Road; single-family housing is planned for the north side, except for the northeast corner of Floral Avenue and Eaton Road, where multi-family housing buffers single-family housing from commercial uses. Existing multi-family housing is located across Floral Avenue. Designs for multi-family housing to be built on the project site will be subject to review by the Architectural Review Board (ARB) to ensure appropriate design adjacent to lower density to the south. |
| LU-G-12: | Encourage and provide incentives for infill development within existing residential areas, at a density not less than surrounding development, subject to appropriate standards to ensure compatibility with adjacent uses. | Consistent. The proposed project would develop a site which is surrounded by existing residential development. It is considered infill development. The densities are consistent with the General Plan; and the proposed zone change would allow for more multi-family residential uses, which would ensure compatibility with adjacent multi-family uses. |

Table IV.G-1 *continued*

| General Plan Policy Number | Policy Summary | Project's Relationship to Policy |
|--|--|---|
| Implementing Policies: Commercial and Retail Land Use | | |
| LU-I-31: | Limit the size of commercial space in the neighborhood mixed-use centers to no more than 200,000 square feet of total floor space and 120,000 square feet of retail space. | Consistent. The 1.9-acre commercial site would likely not exceed 25,000 square feet, and would therefore be in scale with the neighborhood. |
| LU-I-32: | "Retrofit" existing neighborhoods that lack convenience retail facilities with small (3-5 acre-sized) neighborhood mixed-use centers, provided suitable sites are available. | Potentially Consistent. The 1.9-acre commercial site proposed for the project is smaller than the 3-5 acre neighborhood-scale commercial center recommended by this policy. However, the applicant has submitted an economic analysis which concludes that providing a commercial site great than 3 acres in size would not be viable. The Planning Commission will ultimately determine the project's consistency with this policy. |
| Guiding Policies: Airport | | |
| LU-G-33: | Prevent development in the Airport environs that will pose hazards to aviation or interfere with or endanger the landing, taking off, or maneuvering of aircraft. | Consistent. Butte County Airport Land Use Compatibility Plan classifies the northern portion of the project site as Zone B-2 (high-risk due to the potential for low-flying aircraft). This portion of the site is planned as open space with the exception of Lots 56 and 57 within the Mountain Vista subdivision, at the northwest corner of the site. The remainder of the residential portion of the project would be located within Zone C, which permits residential uses. Therefore, the project is generally consistent with Policy LU-G-33. Development of homes within Zone B2 would be determined through review by the ALUC. |
| Guiding Policies: Continuity and Connection | | |
| CD-G-5 | Make improvements to the major corridors traversing the city to heighten their visibility and accessibility. | Consistent. The project would preserve open space along the Sycamore Creek corridor, providing a contiguous open space area between the proposed development area and the open space preserve to the north. The project would also connect the existing Sycamore Creek bike path through the site. In addition, Eaton Road would be extended through the site. The roadway would include a landscaped median, bike lanes, sidewalks, and landscaping in the parkway adjacent to the roadway. |
| CD-G-6 | Design street and creekside improvements in consideration of their hierarchical role and function within the larger system. | Consistent. Sycamore Creek is an intermittent stream located at the northern boundary of the City's urbanized area. The project would preserve open space south of the creek to complement and connect with open space to the north. As such, no improvements are proposed within the creek, consistent with the desire to be sensitive to the open space preserve. Consistent with this vision, the Sycamore Creek bike path is proposed to be routed to the south, along the perimeter of the open space area, adjacent to the planned homes. Eaton Road, consistent with its role as an important arterial street is planned to have a landscaped median as well as landscaping adjacent to the roadway. |

Table IV.G-1 *continued*

| General Plan Policy Number | Policy Summary | Project's Relationship to Policy |
|----------------------------|--|--|
| CD-G-7 | Extend new street patterns that heighten the sense of the creeks and are connected to existing patterns of development. | Consistent. Due to the sensitivity of Sycamore Creek and the open space areas to be preserved at the northern portion of the site, single-loaded streets are proposed to open up public views of the open space preserve area. |
| CD-G-10 | Heighten the visual prominence of the creek corridors which help to establish a sense of orientation and identity within the City. | Consistent. The planned open space preserve would enhance the visibility and prominence of the Sycamore Creek corridor. The project provides for a single-loaded street along a portion of the creek, as well as a cul-de-sac that ends at the creek, to provide some views into open space. A bike path, which also provides views to open space, is included in the project. |
| CD-G-11 | Open up creeks to public views and access. | Consistent. The planned open space preserve would preserve the visibility and prominence of the Sycamore Creek corridor. The project provides for a single-loaded street along a portion of the creek, as well as a cul-de-sac that ends at the creek, to provide some views into open space. A bike path, which also provides views to open space, is included in the project. |
| CD-G-12 | Extend the amenity value of the creeks. | The planned open space preserve would preserve the visibility and prominence of the Sycamore Creek corridor, thus improving the amenity value of the creek. The project provides for a single-loaded street along a portion of the creek, as well as a cul-de-sac that ends at the creek, to provide some views into open space. A bike path, which also provides views to open space, is included in the project. |

Source: LSA Associates, Inc., 2004.

With the exception of two residential lots (Lots 56 and 57) planned at the northwest corner of the Mountain Vista subdivision, and the storm water treatment lots, all of Zone B2 is designated as an open space preserve within the project boundaries. The remainder of the proposed development would be located within Zone C, which permits residential uses. As stated in the definition of Zone C, "Risk is a concern mostly with respect to uses such as schools, hospitals, and ones involving very high usage intensities."

Residential uses with Zone B2 are typically limited to lots greater than 5.0 acres. The two homes proposed within Zone B2 will be subject to review approval by the ALUC.

The Caltrans Aeronautics Division³ also states that "Safety Zone C offers two residential density options at the discretion of the local land use jurisdiction. Option (1) requires an average parcel size of at least 5.0 gross acres. Option (2) requires a density of at least 4.0 dwellings per acre." Consist-

³ Department of Transportation, Aeronautics Division, 2003. Letter in response to Notice of Preparation of a Draft Environmental Impact Report for Mountain Vista and Sycamore Glen Subdivisions. May 5.

ent with the City's General Plan, the project proposes single-family residential densities over four dwelling units per acre, and multi-family residential uses at approximately 16 dwelling units per acre.

Public Utilities Code (PUC) Section 21676 requires local General Plans to be consistent with the adopted ALUCP developed by Butte County Airport Land Use Commission (ALUC). Because the project site is within the ALUCP, it will be submitted to the Butte County ALUC for a consistency determination.

d. Significant Impacts with Mitigation Measures. Implementation of the proposed project would result in no significant land use impacts.

e. Cumulative Impacts. The project would contribute to the urbanization of the area, but this contribution would not be considered cumulatively significant because the proposed project is consistent with the City's General Plan and the level of development anticipated by the plan.

H. NOISE

This section describes the general characteristics of sound and the categories of audible noise. It then summarizes the regulatory framework related to noise issues at the City, State, and federal levels. Existing sources of noise near the project site are described. Impacts that may result from the proposed project are identified and mitigation measures to reduce potential impacts are recommended where appropriate.

1. Setting

This setting section begins with an introduction to several key concepts and terms that are used in evaluating noise. It then explains the various agencies that regulate the noise environment in the City of Chico and summarizes key standards that are applied to proposed development. This setting section concludes with a description of current noise sources that affect the project site and the noise conditions that are experienced in the project vicinity.

a. Characteristics of Sound. To the human ear, sound has two significant characteristics: *pitch* and *loudness*. A specific pitch can be an annoyance, while loudness can affect our ability to hear. Pitch is the number of complete vibrations or cycles per second of a wave that results in the range of tone from high to low. Loudness is the strength of a sound that describes a noisy or quiet environment, and it is measured by the amplitude of the sound wave. Loudness is determined by the intensity of the sound waves combined with the reception characteristics of the human ear. Sound intensity refers to how hard the sound wave strikes an object, which in turn produces the sound's effect. This characteristic of sound can be precisely measured with instruments.

Noise is usually defined as unwanted sound. Noise consists of any sound that may produce physiological or psychological damage and/or interfere with communication, work, rest, recreation or sleep.

Several noise measurement scales exist which are used to describe noise in a particular location. A *decibel* (dB) is a unit of measurement which indicates the relative intensity of a sound. The 0 point on the dB scale is based on the lowest sound level that the healthy, unimpaired human ear can detect. Changes of 3.0 dB or less are only perceptible in laboratory environments. Audible increases in noise levels generally refer to a change of 3.0 dB or more, as this level has been found to be barely perceptible to the human ear in outdoor environments. Sound levels in dB are calculated on a logarithmic basis. An increase of 10 dB represents a 10-fold increase in acoustic energy, while 20 dB is 100 times more intense, 30 dB is 1,000 times more intense. Each 10-dB increase in sound level is perceived as approximately a doubling of loudness. Sound intensity is normally measured through the *A-weighted sound level* (dBA). This scale gives greater weight to the frequencies of sound to which the human ear is most sensitive. Table IV.H-1 shows representative outdoor and indoor noise levels in units of dBA.

As noise spreads from a source, it loses energy so that the farther away the noise receiver is from the noise source, the lower the perceived noise level would be. Geometric spreading causes the sound level to attenuate or be reduced, resulting in a 6-dB reduction in the noise level for each doubling of distance from a single point source of noise to the noise sensitive receptor of concern.

Table IV.H-1: Typical A-Weighted Sound Levels

| Noise Source | A-Weighted Sound Level in Decibels | Noise Environment | Subjective Evaluation |
|--|------------------------------------|----------------------|-----------------------|
| Near Jet Engine | 140 | Deafening | 128 times as loud |
| Civil Defense Siren | 130 | Threshold of Pain | 64 times as loud |
| Hard Rock Band | 120 | Threshold of Feeling | 32 times as loud |
| Accelerating Motorcycle a few feet away | 110 | Very Loud | 16 times as loud |
| Pile Driver; Noise Urban Street/Heavy City Traffic | 100 | Very Loud | 8 times as loud |
| Ambulance Siren; Food Blender | 95 | Very Loud | |
| Garbage Disposal | 90 | Very Loud | 4 times as loud |
| Freight Cars; Living Room Music | 85 | Loud | |
| Pneumatic Drill; Vacuum Cleaner | 80 | Loud | 2 times as loud |
| Busy Restaurant | 75 | Moderately Loud | |
| Near Freeway Auto Traffic | 70 | Moderately Loud | |
| Average Office | 60 | Moderate | 1/2 as loud |
| Suburban Street | 55 | Moderate | |
| Light Traffic; Soft Radio Music in Apartment | 50 | Quiet | 1/4 as loud |
| Large Transformer | 45 | Quiet | |
| Average Residence Without Stereo Playing | 40 | Faint | 1/8 as loud |
| Soft Whisper | 30 | Faint | |
| Rustling Leaves | 20 | Very Faint | |
| Human Breathing | 10 | Very Faint | Threshold of Hearing |

Source: Compiled by LSA Associates, Inc., 2003.

b. Fundamentals of Noise. Sound is a pressure wave transmitted through the air. It is described in terms of loudness or amplitude (measured in decibels), frequency or pitch (measured in Hertz [Hz] or cycles per second), and duration (measured in minutes or hours). The standard unit of measurement for sound intensity is the decibel (dB), with 0 dB corresponding roughly to the threshold of hearing.

Typical human hearing can detect changes in sound levels of approximately 3 dB under normal conditions. However, the human ear is not equally sensitive to all frequencies. Sound waves below 16 Hz are not heard at all and are “felt” more as a vibration. Similarly, while people with extremely sensitive hearing can hear sounds as high as 20,000 Hz, most people cannot hear above 15,000 Hz. In all cases, hearing acuity falls off rapidly above approximately 10,000 Hz and below approximately 200 Hz.

Noise is defined as unwanted sound and is known to have several adverse effects on people, including hearing loss, speech and sleep interference, physiological responses, and annoyance. Based on these known adverse effects of noise, the federal government, the State of California, and many local governments have established maximum allowed noise levels to protect public health and safety and to prevent disruption of certain activities.

Various noise measurements are used to assess the level and the annoyance potential of community noise such as that generated by aircraft activity and arterial traffic. They include:

(1) **A-Weighted Sound Level (dBA).** The A-weighted sound pressure level is commonly abbreviated dBA. The dB refers to a measurement in decibels. The "A" identifies a particular setting of the measurement instrument, the sound level meter. The A-weighted sound level provides a scale with the range and characteristics most consistent with human hearing ability. The dBA measures sound over a period of time, typically 1 hour, to identify the minimum and maximum levels and the statistical variation of fluctuating sounds.

(2) **Continuous Equivalent (Average) Noise Level (L_{eq}).** The continuous equivalent (average) noise level is an energy equivalent level of fluctuating noise for a measured time period. Data from this measurement are applied to the 24-hour measurement of noise.

(3) **Community Noise Equivalent Level (CNEL) or Day-Night Sound Level (L_{dn}).** A given level of noise may be more or less tolerable depending on the time of day and duration of exposure experienced by an individual. The U.S. Department of Housing and Urban Development (HUD) and the Environmental Protection Agency (EPA) have adopted the L_{dn} as their standard unit of measurement for noise levels. This measure increases the average noise level (L_{eq}) for late evening and early morning hours (10:00 p.m. to 7:00 a.m.) by 10 dBA. The daytime noise levels (7:01 a.m. to 9:59 p.m.) are then combined with these weighted levels and are averaged to obtain a 24-hour averaged noise level. The CNEL, which weights noise events in the late evening through early morning, as well as noise events occurring between 7:00 p.m. and 10:00 p.m. (increasing them by 5 dBA), is also widely used by jurisdictions concerned with noise.

Noise levels that are less than 40 dB CNEL/ L_{dn} are not considered significant. This threshold is commonly used to assess noise impacts in environmental impact documents. In addition, generally established regulatory standards throughout California do not typically address noise levels that are less than 40 dBA. However, even low levels of noise can be annoying to people when concurrent background noise is very low.

c. **Noise Regulation Framework.** The following section summarizes the regulatory framework related to noise, including federal, State, and City of Chico plans, policies and standards.

(1) **U.S. Environmental Protection Agency (EPA).** In 1972 Congress enacted the Noise Control Act. This act authorized the EPA to publish descriptive data on the effects of noise and establish levels of sound "requisite to protect the public welfare with an adequate margin of safety." These levels are separated into health (hearing loss levels) and welfare (annoyance levels) as shown in Table IV.H-2. The EPA cautions that these identified levels are not standards because they do not take into account the cost or feasibility of the levels. For protection against hearing loss, 96 percent of the population would be protected if sound levels are less than or equal to an $L_{eq}(24)$ of 70 dB. The "(24)" signifies an L_{eq} duration of 24 hours. The EPA activity and interference guidelines are designed to ensure reliable speech communication at about 5 feet in the outdoor environment. For outdoor and indoor environments, interference with activity and annoyance should not occur if levels do not exceed 55 dBA and 45 dBA, respectively.

Table IV.H-2: Summary of EPA Noise Levels for Protection of Public Health and Welfare with an Adequate Margin of Safety

| Effect | Level | Area |
|---|------------------|---|
| Hearing loss | Leq(24) ≤ 70 dBA | All areas |
| Outdoor activity interference and annoyance | Ldn ≤ 55 dBA | Outdoors in residential areas and farms and other outdoor areas where people spend widely varying amounts of time and other places in which quiet is a basis for use. |
| | Leq(24) ≤ 55 dBA | Outdoor areas where people spend limited amounts of time, such as school yards, playgrounds, etc. |
| Indoor activity interference and annoyance | Leq ≤ 45 dBA | Indoor residential areas. |
| | Leq(24) ≤ 45 dBA | Other indoor areas with human activities such as schools, etc. |

Source: U.S. Environmental Protection Agency, "Information on Levels of Environmental Noise Requisite to Protect Public Health and Welfare with an Adequate Margin of Safety", March 1974.

The noise effects associated with an outdoor CNEL of 55 dB are summarized in Table IV.H-3. At 55 dB CNEL, 95 percent sentence clarity (intelligibility) may be expected at 3.5 meters, and no community reaction. However, 1 percent of the population may complain about noise at this level and 17 percent may indicate annoyance.

For the purposes of this EIR, the EPA findings provide a more complete understanding of the issue of noise as well as a context in which to evaluate the proposed project.

(2) **State of California.** The State of California has established regulations that help prevent adverse impacts to occupants of buildings located near noise sources. Referred to as the "State Noise Insulation Standard," it requires buildings to meet performance standards through design or building materials that would offset any noise source in the vicinity of the receptor. State regulations include requirements for the construction of new hotels, motels, apartment houses, and dwellings other than detached single-family dwellings that are intended to limit the extent of noise transmitted into habitable spaces. These requirements are found in the California Code of Regulations, Title 24 (known as the Building Standards Administrative Code), Part 2 (known as the California Building Code), Appendix Chapters 12 and 12A. For limiting noise transmitted between adjacent dwelling units, the noise insulation standards specify the extent to which walls, doors, and floor ceiling assemblies must block or absorb sound. For limiting noise from exterior noise sources, the noise insulation standards set an interior standard of 45 dBA CNEL in any habitable room with all doors and windows closed. In addition, the standards require preparation of an acoustical analysis demonstrating the manner in which dwelling units have been designed to meet this interior standard, where such units are proposed in area with exterior noise levels greater than 60 dBA CNEL.

Table IV.H-3: Summary of Human Effects in Areas Exposed to 55 dBA CNEL

| Type of Effects | Magnitude of Effect |
|----------------------------|--|
| Speech – Indoors | 100 percent sentence intelligibility (average) with a 5 dB margin of safety. |
| Speech – Outdoors | 100 percent sentence intelligibility (average) at 0.35 meters. 99 percent sentence intelligibility (average) at 1.0 meters. 95 percent sentence intelligibility (average) at 3.5 meters. |
| Average Community Reaction | None evident; 7 dB below level of significant complaints and threats of legal action and at least 16 dB below “vigorous action.” |
| Complaints | 1 percent dependent on attitude and other non-level related factors. |
| Annoyance | 17 percent dependent on attitude and other non-level related factors. |
| Attitude Towards Area | Noise essentially the least important of various factors. |

Source: U.S. Environmental Protection Agency, “Information on Levels of Environmental Noise Requisite to Protect Public Health and Welfare with an Adequate Margin of Safety,” March 1974.

The State has also established land use compatibility guidelines for determining acceptable noise levels for specified land uses, as shown in Table IV.H-4 below.¹ This bar chart also recommends steps to be taken if one of the specified land uses (e.g., a school or church) is proposed for an area exposed to a high noise level (e.g., >85 dB): “Clearly unacceptable. New construction or development should generally not be undertaken.”

(3) City of Chico. The City of Chico in its General Plan Noise Element (adopted November 1994, Revised 1999), has established exterior noise standards for the evaluation of compatibility between land uses and future noise levels in the City. Noise sensitive land uses include hospitals, nursing homes, churches, schools, libraries, assembly halls, and other recreational and residential uses. The Noise and Land Use Compatibility Standards established by the Office of Noise Control of the California Department of Health Services (DHS) have been adopted by reference by the City. The following noise criteria are applicable from the General Plan policies and exceedance of standards would be considered a significant impact.

- Conditional Approval of all new development in residential areas with an actual or projected exterior noise level of greater than 60 dB CNEL on the use of noise mitigation measures to reduce exterior sound levels in those residential areas to less than or equal to 60 dB CNEL. The Uniform Building Code, states that “interior community noise levels (CNEL) with windows closed, attributable to exterior sources, shall not exceed an annual CNEL or Ldn or 45 dB in any habitable room.” This standard is to apply to all new hotels, motels, apartment houses, and dwellings other than single-family detached dwellings. State law also required noise insulation of new multi-family dwellings constructed within the 60 dB CNEL noise exposure contours.

¹ State of California, Governor’s Office of Planning and Research, *General Plan Guidelines, 1998* (Appendix A, Figure 2).

Table IV.H-4: Land Use Compatibility Standards for Community Noise Environments

| Land Use Category | Community Noise Exposure in Decibels (CNEL) Day/Night Average Noise Level in Decibels (Ldn) | | | | | |
|---|--|-----------------------|--------------------------|--------------------------|----------------------|----------------------|
| | 55 | 60 | 65 | 70 | 75 | 80 |
| Residential Low Density Single-Family, Duplex, Mobile Homes | Normally Acceptable | Normally Acceptable | Conditionally Acceptable | Normally Unacceptable | Clearly Unacceptable | Clearly Unacceptable |
| Residential – Multi-Family | Normally Acceptable | Normally Acceptable | Conditionally Acceptable | Normally Unacceptable | Clearly Unacceptable | Clearly Unacceptable |
| Transient Lodging – Motels, Hotels | Normally Acceptable | Normally Acceptable | Conditionally Acceptable | Normally Unacceptable | Clearly Unacceptable | Clearly Unacceptable |
| Schools, Libraries, Churches, Hospitals, Nursing Homes | Normally Acceptable | Normally Acceptable | Conditionally Acceptable | Normally Unacceptable | Clearly Unacceptable | Clearly Unacceptable |
| Auditoriums, Concert Halls, Amphitheaters | Normally Unacceptable | Normally Unacceptable | Clearly Unacceptable | Clearly Unacceptable | Clearly Unacceptable | Clearly Unacceptable |
| Sports Arena, Outdoor Spectator Sports | Normally Unacceptable | Normally Unacceptable | Clearly Unacceptable | Clearly Unacceptable | Clearly Unacceptable | Clearly Unacceptable |
| Playgrounds, Neighborhood Parks | Normally Acceptable | Normally Acceptable | Normally Acceptable | Normally Unacceptable | Clearly Unacceptable | Clearly Unacceptable |
| Golf Courses, Riding Stables, Water Recreation, Cemeteries | Normally Acceptable | Normally Acceptable | Normally Acceptable | Conditionally Acceptable | Clearly Unacceptable | Clearly Unacceptable |
| Office Buildings, Business Commercial and Professional | Normally Acceptable | Normally Acceptable | Conditionally Acceptable | Normally Unacceptable | Clearly Unacceptable | Clearly Unacceptable |
| Industrial, Manufacturing, Utilities, Agriculture | Normally Acceptable | Normally Acceptable | Conditionally Acceptable | Normally Unacceptable | Clearly Unacceptable | Clearly Unacceptable |

 **NORMALLY ACCEPTABLE**
Specified land use is satisfactory, based upon the assumption that any buildings involved are of normal conventional construction, without any special noise insulation requirements.

 **CONDITIONALLY ACCEPTABLE**
New construction or development should be undertaken only after a detailed analysis of the noise reduction requirements is made and needed noise insulation features included in the design.

 **NORMALLY UNACCEPTABLE**
New construction or development should be discouraged. If new construction or development does proceed, a detailed analysis of the noise reduction requirements must be made and needed noise insulation features included in the design.

 **CLEARLY UNACCEPTABLE**
New construction or development clearly should not be undertaken.

Source: Modified from State of California General Plan Guidelines, June 1987.

- In making a determination of impact under the California Environmental Quality Act (CEQA), consider an increase of four or more dBA to be “significant” if the resulting noise level would exceed that described as normally acceptable for the affected land use in Table IV.H-4.

The City of Chico lists the following noise limits within its Municipal Code;

- No person shall produce, suffer or allow to be produced by human voice, machine, animal, or device, or any combination of same, on residential property, a noise level at any point outside of the property plane that exceeds, at any point outside of the property plane, seventy (70) dBA between the hours of 7:00 a.m. and 9:00 p.m. or (60) dBA between the hours of 9:00 p.m. and 7:00 a.m.
- No person shall produce, suffer or allow to be produced by human voice, machine, animal, or device, or any combination of same, on multi-family residential property, a noise level more than sixty (60) dBA 3 feet from any wall, floor, or ceiling inside any dwelling unit on the same property, when the windows and doors of the dwelling unit are closed, except within the dwelling unit in which the noise source or sources may be located.
- No person shall produce, suffer or allow to be produced by human voice, machine, animal, or device, or any combination of same, on commercial or industrial property, any point outside of the property plane that exceeds (70) dBA.
- Between the hours of 10:00 a.m. and 6:00 p.m. on Sundays and holidays, and 7:00 a.m. and 9:00 p.m. on other days, construction, alteration or repair of structures shall be subject to one of the following limits:
 1. No individual device or piece of equipment shall produce a noise level exceeding eighty-three (83) dB at a distance of twenty-five (25) feet from the source. If the device or equipment is housed within a structure on the property, the measurement shall be made outside the structure at a distance as close as possible to 25 feet from the equipment.
 2. The noise level at any point outside of the property plane of the project shall not exceed eighty-six (86) dBA.

d. Existing Noise Environment. Noise levels in the City of Chico and their effects on the City’s quality of life will revolve around at least five key sources as described below.

(1) Existing Noise Level Measurements. To determine the existing noise environment at the project site and in the vicinity, noise measurements were taken by LSA Associates, Inc. (October 2003) at four representative locations within the project site to determine the existing noise environment. The results of the noise monitoring are shown in Table IV.H-5. Currently the project site is located in a relatively quiet area. The existing noise levels in the project area range from 42 to 63 dBA L_{eq} .

(2) Construction Activity. Short-term noise impacts are associated with demolition, excavation, grading, and building construction. Construction-period noise levels are higher than existing noise levels, but eventually cease once construction is complete.

Table IV.H-5: Ambient Noise Monitoring Results

| Location | Time | L _{eq} | L _{max} | Source |
|---|------------|-----------------|------------------|---|
| 1. On Floral Avenue north of Whitewood Way, south of Eaton Road. | 9:02 a.m. | 62.5 | 80.3 | Vehicles, construction vehicles, aircraft. |
| 2. On Floral Avenue north of Easton Road, south of Silkwood Way. | 9:50 a.m. | 53.0 | 71.8 | Vehicles, aircraft. |
| 3. On project site 300 feet east of Floral Avenue and Lexington Drive. | 10:58 a.m. | 42.2 | 59.7 | Aircraft. |
| 4. South boundary of project site approximately 500 feet east of PG&E substation. | 12:17 p.m. | 45.3 | 60.9 | Aircraft, helicopter, construction noise, helicopter. |

Source: LSA Associates, Inc., October 2003.

Construction is performed in discrete steps, each of which has its own mix of equipment and, consequently, its own noise characteristics. The character of the noise generated on each construction site and, therefore, the noise levels surrounding the site, changes as construction progresses through its sequential phases. Despite the variety in the type and size of construction equipment, similarities in the dominant noise sources and patterns of operation allow construction related noise ranges to be categorized by work phase. Table IV.H-6 lists typical construction equipment noise levels recommended for noise impact assessments, based on a distance of 50 feet between the equipment and a noise receptor.

Typical noise levels range up to 91 dBA L_{max} at 50 feet during the noisiest construction phases. The site preparation phase, which includes excavation and grading of the site, tends to generate the highest noise levels because the noisiest construction equipment is earth-moving equipment. Earth moving equipment includes excavating machinery such as backhoes, bulldozers, draglines and front loaders, and earth moving and compacting equipment, which includes compactors, scrapers and graders. Typical operating cycles for these types of construction equipment may involve 1 or 2 minutes of full power operation followed by 3 to 4 minutes at lower power settings.

(3) Stationary Sources. A wide variety of stationary sources also contribute to noise throughout the City. These sources include machinery or equipment that emit noise during operation (e.g., air conditioners, generators). Noise associated with certain land uses (e.g., industrial and commercial) could be considered stationary sources if the point for noise generation was stationary and not mobile (e.g., a forklift operated in a certain area of a building or outdoor facility).

(4) Vehicular Traffic. The amount of motor vehicle noise varies according to many factors, such as traffic volumes, vehicle mix (percentage of cars and trucks), average traffic speed, and distance from the observer. Major contributing roadway noise sources in the project area include Cohasset Avenue, East Avenue, and other roadways.

Table IV.H-6: Typical Construction Equipment Noise Levels

| Type of Equipment | Range of Maximum Sound Levels Measured (dBA at 50 feet) | Suggested Maximum Sound Levels for Analysis (dBA at 50 feet) |
|---|---|--|
| Pile Drivers, 12,000 to 18,000 ft-lb/blow | 81 to 96 | 93 |
| Rock Drills | 83 to 99 | 96 |
| Jackhammers | 75 to 85 | 82 |
| Pneumatic Tools | 78 to 88 | 85 |
| Pumps | 68 to 80 | 77 |
| Dozers | 85 to 90 | 88 |
| Tractors | 77 to 82 | 80 |
| Front-end Loaders | 86 to 90 | 88 |
| Hydraulic Backhoe | 81 to 90 | 86 |
| Hydraulic Excavators | 81 to 90 | 86 |
| Graders | 79 to 89 | 86 |
| Air Compressors | 76 to 86 | 86 |
| Trucks | 81 to 87 | 86 |

Source: Noise Control for Buildings and Manufacturing Plants, Bolt, Beranek & Newman, 1987.

The Federal Highway Administration (FHWA) highway traffic noise prediction model (FHWA RD-77-108) was used to evaluate traffic-related noise conditions along roadway links within the project study area. A typical vehicle mix for urban/suburban areas in California was used in this modeling effort. Table IV.H-7 shows the existing traffic noise levels in the project area. As shown the noise levels in the project area range from low to moderate with the 65 dBA CNEL along Cohasset Avenue and East Avenue extending beyond the roadway right-of-way.

(5) Aircraft Operations. Aircraft overflights also contribute to the ambient noise levels in the project area. The proposed project is located approximately 7,250 feet southeast of the approach/departure flight path (along the extended centerline for the runway) and the Fire Attack Aircraft Departure Route. The Chico General Plan identifies the west-central portion of the project site as being between the 55 and 60 dB CNEL airport noise contours (outside the 60dB CNEL contour). The eastern portion of the site (generally east of Mariposa Avenue) is outside of the 55 dB CNEL noise contour. However, on a "Peak Fire Attack Day" a greater portion of the project site is located within the 55 dB CNEL airport noise contours, and a small portion of the site in the southwest corner is located within the 60 dB CNEL zone.² Based on the recent noise monitoring at the site, single aircraft flyovers generate noise levels of up to 62 dBA L_{max} .

² Department of Transportation, Division of Aeronautics, Notice of Preparation comment letter, May 3, 2003.

Table IV.H-7: Existing (2003) Traffic Noise Levels

| Roadway Segment | ADT | Centerline to 70 CNEL (Feet) | Centerline to 65 CNEL (Feet) | Centerline to 60 CNEL (Feet) | CNEL (dBA) 50 Feet From Outermost Lane |
|--|--------|------------------------------------|------------------------------------|------------------------------------|--|
| Cohasset Avenue | | | | | |
| North of Eaton Road | 10,700 | < 50 ^a | 81 | 169 | 65.7 |
| South of Eaton Road | 9,210 | < 50 | 74 | 153 | 65.0 |
| Floral Avenue | | | | | |
| North of Eaton Road | 1,290 | < 50 | < 50 | < 50 | 55.3 |
| Between Eaton Road and East Avenue | 7,105 | < 50 | < 50 | 85 | 62.7 |
| South of East Avenue | 4,460 | < 50 | < 50 | 62 | 60.7 |
| Mariposa Avenue | | | | | |
| North of East Avenue | 3,170 | < 50 | < 50 | < 50 | 59.2 |
| South of East Avenue | 4,870 | < 50 | < 50 | 66 | 61.1 |
| Ceanothus Avenue | | | | | |
| North of East Avenue | 1,710 | < 50 | < 50 | < 50 | 56.8 |
| South of East Avenue | 1,210 | < 50 | < 50 | < 50 | 55.0 |
| Eaton Road | | | | | |
| Between Cohasset Road and Floral Avenue | 4,180 | < 50 | < 50 | 93 | 61.6 |
| East Avenue | | | | | |
| West of Floral Avenue | 10,780 | < 50 | 82 | 170 | 65.7 |
| Between Floral Avenue and Mariposa Avenue | 13,935 | < 50 | 96 | 201 | 66.8 |
| Between Mariposa Avenue and Ceanothus Avenue | 12,070 | < 50 | 88 | 183 | 66.2 |
| East of Ceanothus Avenue | 10,220 | < 50 | 79 | 164 | 65.5 |

^a Traffic noise within 50 feet of roadway centerline requires site specific analysis.

Source: LSA Associates, Inc., October 2003.

2. Impacts and Mitigation Measures

- a. **Criteria of Significance.** A significant impact would occur if the proposed project would:
- Expose persons to or generate noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies;
 - Expose persons to or generate excessive ground borne vibration or ground borne noise levels;
 - Create a substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project;
 - Create a substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project; or

- For a project located within an airport land use plan or, where such a plan has not been adopted, within 2 miles of a public airport or public use airport, expose people residing or working in the project area to excessive noise levels.

b. Less than Significant Impacts. The following noise sources would produce less-than-significant effects on residents and employees at the project site.

(1) **Vibration Impacts.** The proposed project does not include any sources that would generate long-term vibrations that would be perceptible to humans at nearby sensitive receptors. (Impact NOISE-1 below addresses short-term construction period pile driving and the resulting impact.)

c. Significant Impacts and Mitigation Measures. Noise impacts related to the following sources would result in potentially significant impacts.

(1) **Construction Noise.**

Impact NOISE-1: Noise levels from construction activities may range up to 85 dBA L_{max} at the nearest land uses to the project site for a limited time period. (S)

The transport of workers and construction equipment and materials to the project site would incrementally increase noise levels on access roads leading to the site. Because workers and construction equipment would use existing routes, noise from passing trucks (87 dBA L_{max} at 50 feet) would be similar to existing truck-generated noise. For this reason, short-term intermittent noise from trucks would be minor when averaged over a longer time period. In addition, noise associated with on-road vehicles is regulated by federal and state governments and is exempted from local government regulations. Therefore, short-term construction-related impacts associated with worker and equipment transport to the proposed project site would result in a less than significant impact on receptors along the access routes leading to the proposed project site.

However, noise generated during excavation, grading, and building erection on the project site would result in potential noise impacts on off-site uses and to on-site uses if they were to occupy the site while later phases of construction were continuing. Existing residents in the project vicinity may be subject to short-term noise generated by construction equipment and activities on the project site when construction occurs near the project boundary.

Construction is performed in discrete steps, each of which has its own mix of equipment and, consequently, its own noise characteristics. These phases would change the character of the noise generated on the project site and, therefore, the noise levels surrounding the site as construction progresses. Despite the variety in the type and size of construction equipment, similarities in the dominant noise sources and patterns of operation allow construction-related noise ranges to be categorized by work phase. Table IV.H-6 lists typical construction equipment noise levels recommended for use in noise impact assessments, based on a distance of 50 feet between the equipment and a noise receptor. Typical construction noise levels vary up to a maximum of 91 dBA L_{max} at 50 feet during the noisiest construction phases. The site preparation phase, which includes excavation and grading of the site, tends to generate the highest noise levels because the noisiest construction equipment is earthmoving equipment. Earthmoving equipment includes excavating machinery such

as backhoes, bulldozers, draglines, and front loaders and earthmoving and compacting equipment, which includes compactors, scrapers, and graders. Typical operating cycles for these types of construction equipment may involve 1 or 2 minutes of full power operation followed by 3 to 4 minutes at lower power settings.

Construction of the proposed project is expected to require the use of earthmovers such as bulldozers and scrapers, loaders and graders, water trucks, and pickup trucks. As shown in Table IV.H-6, the typical maximum noise level generated by each earthmover on the proposed project site is assumed to be 88 dBA L_{max} at 50 feet from the operating earthmover. The maximum noise level generated by water and pickup trucks is approximately 86 dBA L_{max} at 50 feet from these vehicles. Each doubling of the sound sources with equal strength would increase the noise level by 3 dBA. Assuming each piece of construction equipment operates at some distance apart from the other equipment, the worst-case combined noise level at the nearest residences during this phase of construction would be 91 dBA L_{max} at a distance of 50 feet from an active construction area. The closest homes to the project site are located at a distance of approximately 100 feet from the project boundary. Therefore, the nearest land uses would be exposed to noise levels of up to 85 dBA L_{max} .

Therefore, the following measures shall be implemented during construction of the proposed project to minimize noise impacts during construction.

Mitigation Measure NOISE-1: The following measures shall be implemented during construction of the proposed project.

- All construction vehicles or equipment, fixed or mobile, shall be equipped with properly operating and maintained mufflers.
- As part of the proposed project, all operations would comply with the noise ordinance standards, and stockpiling and/or vehicle staging areas would be located as far as practicable from dwellings.
- Construction activities shall be restricted to between 7:00 a.m. and 9:00 p.m. Monday through Saturday, and 10:00 a.m. and 6:00 p.m. on Sundays or federal holidays.

Level of Significance After Mitigation: Construction period impacts would still occur with implementation of the measure detailed above. However they would be short-term in duration and the mitigation measure would reduce impacts to less-than-significant levels. (LTS)

(2) Traffic Noise.

Impact NOISE-2: Local traffic will generate long-term exterior noise levels exceeding 60 dBA CNEL on the project site. (S)

The FHWA highway traffic noise prediction model (FHWA RD-77-108) was used to evaluate traffic-related noise conditions in the vicinity of the project site. The traffic volumes were taken from the traffic report prepared for this project by Fehr & Peers Associates (September 2003). The resultant noise levels were weighted and summed over a 24-hour period in order to determine the CNEL values. CNEL contours are derived through a series of computerized iterations to isolate the 60, 65, and 70 dBA CNEL contour for traffic noise levels in the project area. The future traffic noise levels with and without the project are shown in Tables IV.H-8 and IV.H-9.

Table IV.H-8: Year 2020 Baseline Traffic Noise Levels

| Roadway Segment | ADT | Centerline to 70 CNEL (Feet) | Centerline to 65 CNEL (Feet) | Centerline to 60 CNEL (Feet) | CNEL (dBA) 50 Feet From Outermost Lane |
|--|--------|------------------------------|------------------------------|------------------------------|--|
| Cohasset Avenue | | | | | |
| North of Eaton Road | 20,170 | 60 | 121 | 256 | 68.4 |
| South of Eaton Road | 15,900 | < 50 ^a | 104 | 219 | 67.4 |
| Floral Avenue | | | | | |
| North of Eaton Road | 7,510 | < 50 | < 50 | 147 | 64.2 |
| Between Eaton Road and East Avenue | 8,555 | < 50 | 53 | 167 | 64.8 |
| South of East Avenue | 6,500 | < 50 | < 50 | 127 | 63.6 |
| Mariposa Avenue | | | | | |
| North of East Avenue | 3,710 | < 50 | < 50 | 55 | 59.9 |
| South of East Avenue | 7,610 | < 50 | < 50 | 149 | 64.3 |
| Ceanothus Avenue | | | | | |
| North of East Avenue | 1,570 | < 50 | < 50 | < 50 | 56.4 |
| South of East Avenue | 2,300 | < 50 | < 50 | < 50 | 59.1 |
| Eaton Road | | | | | |
| Between Cohasset Road and Floral Avenue | 11,600 | < 50 | 129 | 401 | 67.6 |
| East of Floral Avenue ^b | 13,290 | < 50 | 147 | 459 | 68.2 |
| East Avenue | | | | | |
| West of Floral Avenue | 17,450 | 65 | 192 | 602 | 69.4 |
| Between Floral Avenue and Mariposa Avenue | 15,555 | 59 | 171 | 537 | 68.9 |
| Between Mariposa Avenue and Ceanothus Avenue | 14,515 | < 50 | 98 | 206 | 67.0 |
| East of Ceanothus Avenue | 13,070 | < 50 | 92 | 193 | 66.5 |

^a Traffic noise within 50 feet of roadway centerline requires site specific analysis.

^b Modeled traffic noise levels along Eaton Road east of Floral Avenue do not account for 4 dBA reduction in noise levels due to special paving required for the Eaton Road Extension.

Source: LSA Associates, Inc., October 2003.

Table IV.H-9 shows that the change in the traffic noise levels associated with the implementation of the project would be small. As shown, the largest project related increase in traffic noise is 2.7 dBA. This increase in traffic noise is less than the 3 dBA increase considered to be perceptible to humans in an outdoor environment. Therefore, as the proposed project will not contribute to any significant noise level increases, no mitigation is required for off-site areas.

Table IV.H-9 shows that buildings located along Eaton Road would be exposed to noise levels exceeding 70 dBA CNEL. Buildings located along Floral Avenue would be exposed to noise levels exceeding 65 dBA CNEL.

Table IV.H-9: Year 2020 Plus Project Traffic Noise Levels

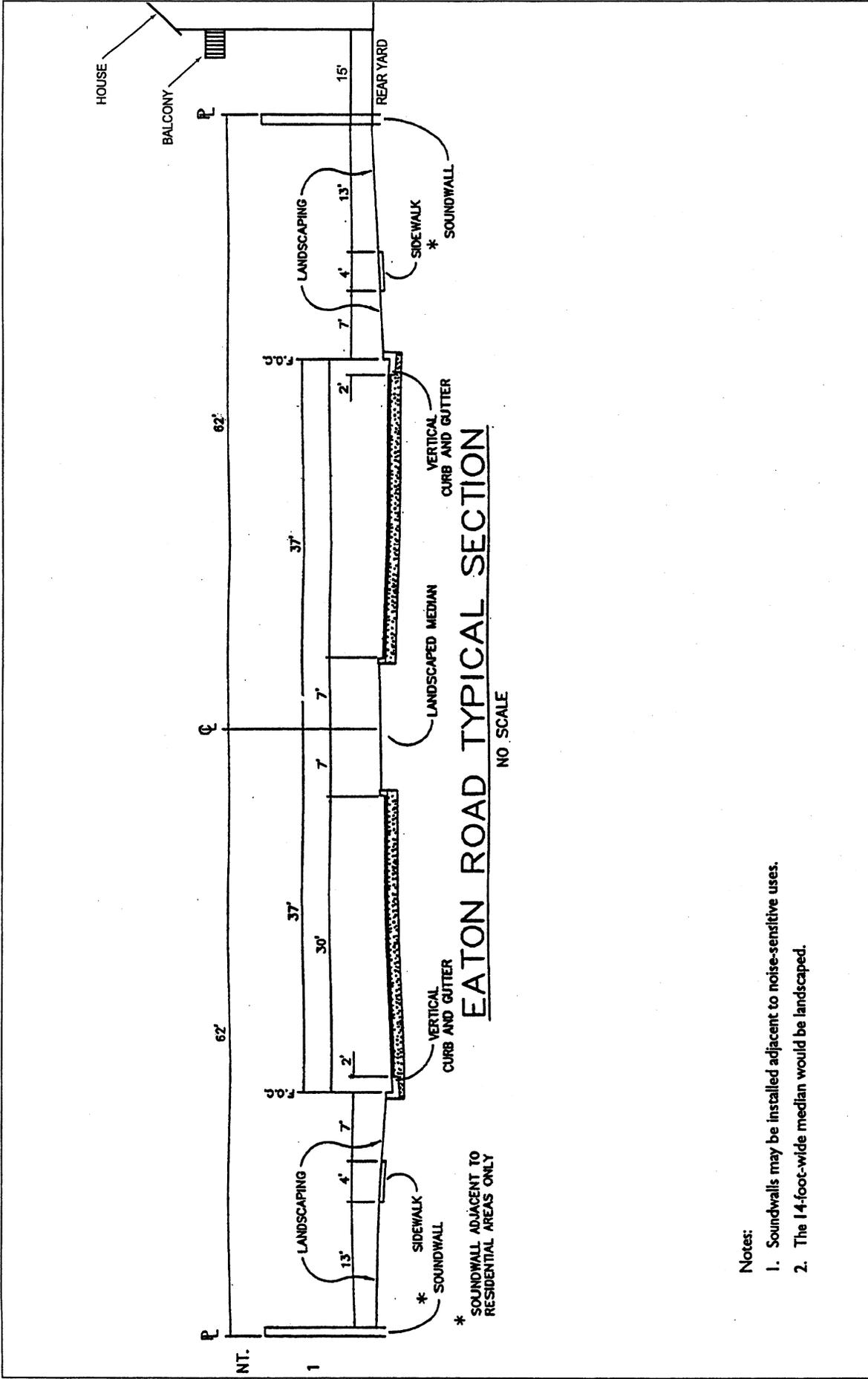
| Roadway Segment | ADT | Centerline to 70 CNEL (Feet) | Centerline to 65 CNEL (Feet) | Centerline to 60 CNEL (Feet) | CNEL (dBA) 50 Feet From Outermost Lane | Change from No Project Level (dBA) |
|--|---------|------------------------------|------------------------------|------------------------------|--|------------------------------------|
| Cohasset Avenue | | | | | | |
| North of Eaton Road | 31,000 | 77 | 160 | 341 | 70.3 | 1.9 |
| South of Eaton Road | 24,900 | 68 | 138 | 295 | 69.3 | 1.9 |
| Floral Avenue | | | | | | |
| North of Eaton Road | 13,900 | < 50* | 86 | 271 | 66.9 | 2.7 |
| Between Eaton Road and East Avenue | 15,395' | < 50 | 95 | 300 | 67.3 | 2.5 |
| South of East Avenue | 11,740 | < 50 | 73 | 229 | 66.1 | 2.5 |
| Mariposa Avenue | | | | | | |
| North of East Avenue | 6,880 | < 50 | < 50 | 83 | 62.6 | 2.7 |
| South of East Avenue | 7,610 | < 50 | 81 | 255 | 66.6 | 2.3 |
| Ceanothus Avenue | | | | | | |
| North of East Avenue | 2,780 | < 50 | < 50 | < 50 | 58.9 | 2.5 |
| South of East Avenue | 3,960 | < 50 | < 50 | 77 | 61.4 | 2.3 |
| Eaton Road | | | | | | |
| Between Cohasset Road and Floral Avenue | 18,770 | 69 | 206 | 648 | 69.7 | 2.1 |
| East of Floral Avenue ^b | 21,990 | 68 | 202 | 634 | 69.6 | 1.4 |
| East Avenue | | | | | | |
| West of Floral Avenue | 29,910 | 89 | 274 | 862 | 70.9 | 1.5 |
| Between Floral Avenue and Mariposa Avenue | 25,970 | 79 | 238 | 749 | 70.3 | 1.4 |
| Between Mariposa Avenue and Ceanothus Avenue | 22,865 | 70 | 210 | 659 | 69.7 | 2.7 |
| East of Ceanothus Avenue | 20 | 62 | 181 | 568 | 69.1 | 2.6 |

^a Traffic noise within 50 feet of roadway centerline requires site specific analysis.

^b Modeled traffic noise levels along Eaton Road east of Floral Avenue do not account for 4dBA reduction in noise levels due to special paving required for the Eaton Road Extension.

Source: LSA Associates, Inc., October 2003.

The proposed residential rear yards along Eaton Road are located approximately 62 feet from the roadway centerline. In addition, homes would be setback approximately 15 feet from the property line. Figure IV.H-1 shows a typical cross section of Eaton Road. At this distance, the outdoor yard access for residences would be exposed to noise levels of approximately 71 dBA CNEL. However, Mitigation Measure 7-2 included in the Environmental Impact Report prepared for the Eaton Road Extension Project, requires the use of noise-reducing asphalt on Eaton Road. This asphalt is projected to reduce the long-term noise levels along Eaton Road by 4 dBA or more. The modeled



Notes:

1. Soundwalls may be installed adjacent to noise-sensitive uses.
2. The 14-foot-wide median would be landscaped.

LSA

FIGURE IV.H-1

Sycamore Glen/Mountain Vista EIR
Typical Cross Section of Eaton Road

noise levels shown in Tables IV.H-8 and IV.H-9 for Eaton Road east of Floral Avenue do not reflect the 4 dB reduction that would be achieved with the implementation of Mitigation Measure 7-2 from the Eaton Road Extension EIR. Therefore, the future noise levels at the proposed residences along Eaton Road would be 67 dBA CNEL or less with the noise-reducing pavement on Eaton Road. This noise level exceeds the City's 60 dBA CNEL exterior noise threshold for outdoor areas for residential uses. Therefore, mitigation measures are required for outdoor land uses. With respect to interior noise levels, standard residential construction in northern California would provide 25 dBA exterior-to-interior noise reduction with windows closed and 15 dBA noise reduction with windows open. Therefore, the proposed structures would not require building façade upgrades to meet the 45 dBA interior noise standard ($67 \text{ dBA} - 25 \text{ dBA} = 42 \text{ dBA}$). However, to ensure that windows can remain closed for prolonged periods of time, an air-conditioning system would be required. Any second-story balconies facing the roadway are expected to be exposed to traffic noise exceeding the City's 60 dBA CNEL exterior noise standard and would require a plexiglas (or other sound attenuation material) barrier with a minimum height of 6 feet to ensure that the exterior noise levels meet the City's standard.

The proposed residences along Floral Avenue are located approximately 45 feet from the roadway centerline. At this distance the residences will be exposed to noise levels of approximately 69 dBA CNEL. This noise level is above the City's 60 dBA CNEL exterior standard. Therefore, mitigation measures are required for outdoor land uses. The proposed residences along Floral Avenue will not need building façade upgrades to meet the interior noise standard ($69 \text{ dBA} - 25 \text{ dBA} = 44 \text{ dBA}$). However, with windows open the interior noise level will exceed the City standard ($69 \text{ dBA} - 15 \text{ dBA} = 54 \text{ dBA}$). Therefore, to ensure that windows can remain closed for prolonged periods of time, an air-conditioning system would be required. Any balconies directly exposed to traffic noise exceeding the City's 60 dBA CNEL exterior noise standard and would require a plexiglass barrier with a minimum height of 6 feet to ensure that the exterior noise levels meet the City's standard.

Mitigation Measure NOISE-2: Proposed sensitive land uses will require the following mitigation measures.

- Sound walls (Plexiglas or equivalent material with a minimum height of 6 feet) would be required for any balconies located along Eaton Road or Floral Avenue.
- All exterior residential uses facing Eaton Road shall be protected by a sound barrier with an effective height of 6 feet. This barrier will provide approximately 7 to 8 dBA in noise reduction for ground floor receptors, when the direct line of sight to the traffic is blocked. This will reduce the exterior noise level to at or below the exterior noise standard ($67 \text{ dBA} - 7 \text{ dBA} = 60 \text{ dBA}$).
- All exterior residential uses facing Floral Avenue shall be protected by a sound barrier with an effective height of 8 feet. This barrier will provide approximately 9-10 dBA in noise reduction for ground floor receptors, when the direct line of sight to the traffic is blocked. This will reduce the exterior noise level to at or below the exterior noise standard ($69 \text{ dBA} - 9 \text{ dBA} = 60 \text{ dBA}$).
- To achieve the indoor fresh-air ventilation requirements specified in Chapter 35 of the Uniform Building Code, all units adjacent to Eaton Road or Floral Avenue will require mechanical ventilation to ensure that windows can remain closed for a prolonged period of time.

Level of Significance After Mitigation: Implementation of Mitigation Measure NOISE-2 would reduce the impact to a less-than-significant level. (LTS)

Impact NOISE-3: Long-term stationary noise sources on the project site could potentially generate noise levels in excess of the thresholds set in the City's Municipal Code. (S)

As noise spreads from a source, it loses energy so that the farther away the noise receiver is from the noise source, the lower the perceived noise level would be. Geometric spreading causes the sound level to attenuate, resulting in a six-decibel reduction in the noise level for each doubling of distance from a single point source of noise to the noise receptor.

Mechanical equipment and other on-site sources (e.g., air-conditioning or other mechanical ventilation equipment, delivery loading docks or areas, emergency generators, etc.) from the proposed retail and residential uses could generate noise that would exceed the City's noise standards.

To prevent noise impacts on adjacent land uses, loading docks or loading areas and noise-generating equipment associated with the proposed uses should be located as far as practical from all existing and planned residential properties.

Mitigation Measure NOISE-3: The following measures are required for the operations of the proposed project:

- All on-site stationary noise sources shall comply with the standards listed in Section 9.38.030 of the City's Municipal Code.
- Loading docks or loading areas and noise-generating equipment associated with the retail uses will be located as far as practical from all existing and planned residential uses.

Level of Significance After Mitigation: Implementation of the above mitigation measure would reduce the impact to below a level of significance. (LTS)

(3) Aircraft Noise.

Impact NOISE-4: Homes within the 55 dB CNEL noise contour would be impacted by noise from aircraft overflights. (S)

The proposed project is located approximately 1.5 miles southeast of the Chico Municipal Airport. Based on the City's existing and future noise contours from the City's Noise Element of the General Plan, the project site is not located within the 60 dBA CNEL airport noise contour, but the west-central portion of the site is between the 55 and 60 dB CNEL noise contours. Both single-family and multi-family homes are proposed within this area. Also, a portion of the site would fall within the 60 dBA CNEL noise contour on a Peak Fire Attack Day. However, this is not the baseline for land use planning and is therefore not considered significant.

The Chico General Plan contains the following related policies:

- N-I-1: Use the "normally acceptable" noise levels for new land uses as established in Table 9-1 (Noise and Land Use Compatibility) as review criteria.

- N-I-2: Condition approval of all new development in residential areas with an actual or projected exterior noise level of greater than 60 dB CNEL on the use of noise mitigation measures to reduce exterior sound levels in those residential areas to less than or equal to 60 dB CNEL.

Chico General Plan Noise Element Table 9-1 considers single-family residential uses to be “normally or conditionally acceptable” between the 55 and 60 dB CNEL noise contours and “normally acceptable” outside of the 55 dB CNEL contour. Multi-family residential use is considered “normally acceptable” between 50 and 60 dB CNEL.

In the Butte County Airport Land Use Compatibility Plan (ALUCP), single-family residential is considered “normally unacceptable” between the 55 and 60 dB CNEL airport noise contours. Multi-family residential uses are considered “marginally acceptable” within the 55 dB CNEL contour.³ Because the site falls within the ALUCP, the Airport Land Use Commission will also review the project for consistency. The ALUCP’s Exhibit 4F, which depicts the future noise contours, is shown in Figure IV.H-2.

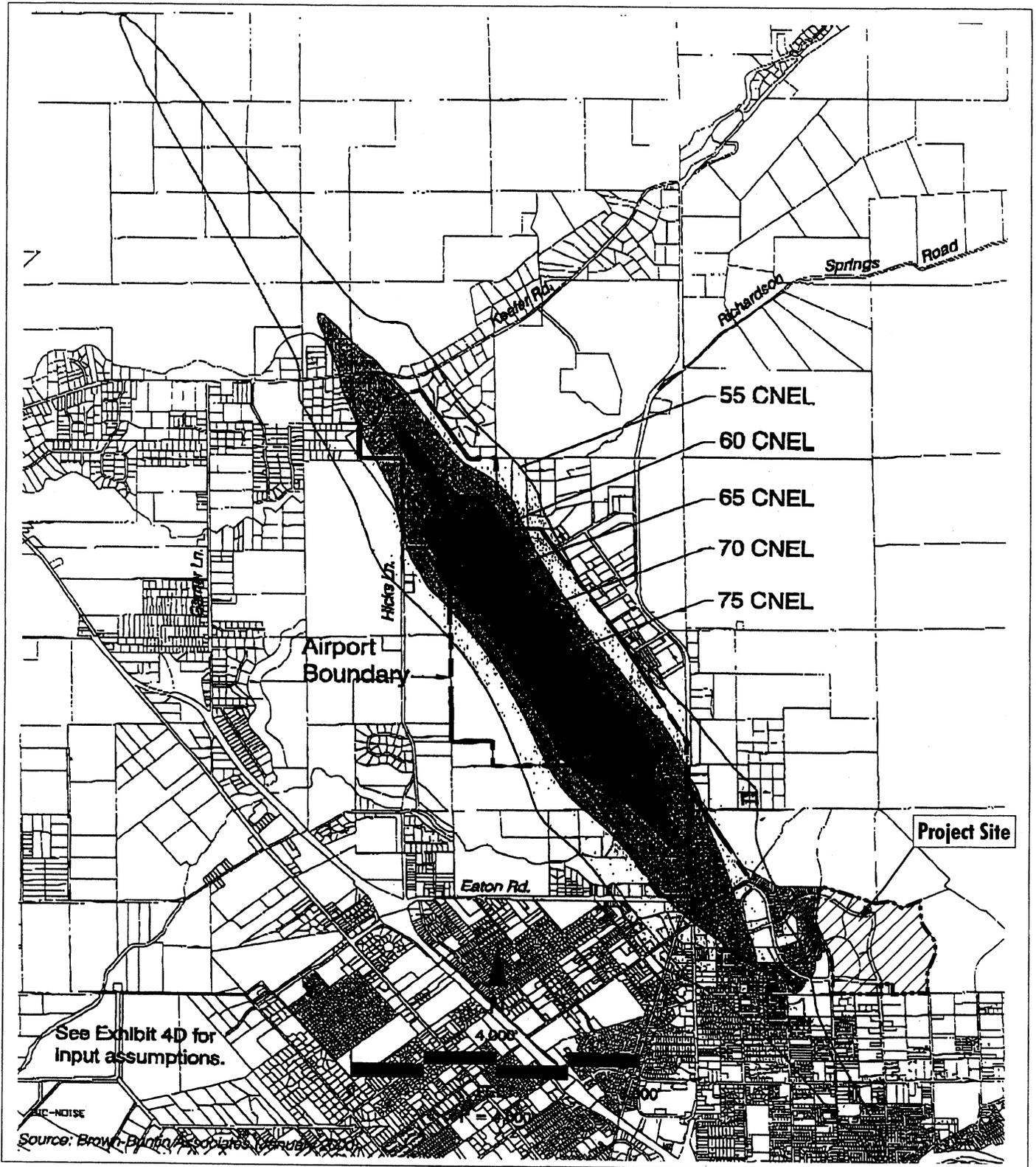
While both the City General Plan and the ALUCP both permit residential uses within the 55 dB CNEL noise contour, both documents state that residential structures should be constructed with noise attenuation features to minimize disruption to residents. Mitigation Measure NOISE-4 requires that the residences within the 55dB CNEL noise contour be constructed with such features.

Mitigation Measure NOISE-4: Prior to the issuance of building permits for any residential structures within the 55dB CNEL noise contour, the building division shall verify that homes within this area shall be constructed utilizing noise attenuation features to reduce interior noise levels to less than 45 dB CNEL within all habitable rooms. Attenuation features that may be incorporated to meet this criterion could include, but are not limited to, special noise insulating construction and the installation of air conditioning so that windows can be kept closed.

Level of Significance After Mitigation: Implementation of Mitigation Measure Noise-4 would reduce this impact to less-than-significant. (LTS)

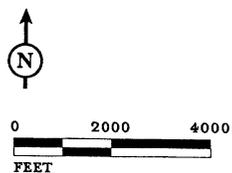
d. Cumulative Impacts. As shown in Table IV.H-9, traffic generated by the project would contribute to increased noise levels on area roadways in the cumulative (Year 2020) condition. However, the largest noise increase contributed by the project would be 2.7 dBA, which would not be perceptible to humans. Because the project’s contribution to cumulative noise impacts would not exceed 3 dBA, the contribution is not considered significant.

³ Butte County Airport Land Use Compatibility Plan, Table 2B. Noise Compatibility Criteria, p. 2-27.



LSA

FIGURE IV.H-2



Sycamore Glen/Mountain Vista EIR
 ALUCP Exhibit 4F
 Noise Impacts - Expanded Forecast

SOURCE: BUTTE COUNTY ALUCP, 2000

I:\CHC330 sycamore glen\figures\Fig_IVH2.ai (10/05/04)

I. PUBLIC SERVICES

This section describes existing public utility systems in the vicinity of the project site and utility-related policies that are relevant to the proposed project. Potential impacts to public services that would result from implementation of the proposed project are identified and mitigation measures are recommended, as necessary.

1. Setting

a. Law Enforcement. Law enforcement for the project would be provided by the Chico Police Department (CPD). There is one CPD station in the City, which serves as CPD headquarters. The station is located at 1460 Humboldt Road, approximately 3.25 miles from the project site. Two substations, which are typically unmanned, are used by officers and volunteer officers to follow up on reports. The substations are located at Fire Station 5 at the corner of Manzanita Avenue and Wildwood Avenue, and in the downtown parking structure at the corner of 4th Street and Salem Street. Currently, there are approximately 85 sworn officers on the CPD force.¹

The CPD service area consists of 3 beats. The project site is located within Beat 1. There were a total of 2,012 reported crimes in Beat 1 in 2002. The top four incident types reported in Beat 1 include drunk in public, D.U.I., simple assault, and in-house warrant.²

The CPD average response time for responding to Priority 1 calls (defined as involving immediate danger to life or property) or Priority 2 calls (non-emergency situations) is six minutes.

b. Fire Protection. Fire protection for the project would be provided by the Chico Fire Department (CFD) and the California Department of Forestry and Fire Protection/Butte County Fire Department (CDF/BCFD). The Chico Fire Department operates six fire stations and a Fire Training Center. Station 5, located approximately 1.91 miles from the project site at 1777 Manzanita Avenue, is the closest fire station to the project site.

The Chico Fire Department has 69 full-time personnel, 66 of which are uniformed. Additionally, there are 36 volunteer firefighters. (105 total personnel). CFD received 7,205 calls for service in 2002. Station 5 responded to 966 incidents in 2002.³

c. Paramedics. The CFD is the first responder to emergency medical calls, with an average response time of four minutes. All CFD firefighters are trained paramedics. Two private companies, Enloe Health Systems and First Responder EMS, provide secondary response to medical emergencies. The average response time for these secondary responders is eight minutes.⁴ A 911 dispatcher notifies the paramedic companies when secondary services are required. First

¹ Chico, City of, 2003. Police Department. http://www.chico.ca.us/Police/Home_Page.asp

² Smith, Laura, 2003. Records Clerk, Chico Police Department. Personal communication with LSA. August 27.

³ Brown, Steve, 2003. Chief, Chico Fire Department. Personal communication with LSA. April 18.

⁴ Brown, Steve, 2004. Chief, Chico Fire Department. Personal communication with LSA. July 19.

Responder's closest station to the project site is located on East Avenue and Cohasset Road. Enloe Health System's closest facility is located at Cohasset Road and Rio Lindo Avenue.

d. Schools. The project site and vicinity are within the Chico Unified School District (CUSD). CUSD currently operates 16 elementary schools (on both traditional and single-track year round schedules), a charter school, three junior high schools, two comprehensive high schools, one continuation high school, a grades 7-12 opportunity school, and a grades K-12 independent study school.

e. Solid Waste. Solid waste collection in the project area is provided by North Valley Waste Management and Norcal Waste Systems of Butte County, both privately-owned companies. No service areas or routes have been delineated, and collection is provided on a competitive basis. These two haulers are currently permitted to collect residential and commercial waste within the City. Either hauler could collect waste from the project.

The Neal Road Sanitary Landfill, a Class III facility operated by Butte County Public Works, accepts solid and yard waste from Butte County. The City also has a green-waste composting yard off Cohasset Road, just south of the airport. The landfill is located off Neal Road, east of Highway 99 at 1023 Neal Road west of Paradise, California. The landfill receives approximately 450 to 500 tons per day from residential and commercial customers in Chico and surrounding areas. The current lifespan of the landfill is 15 years. The County plans to expand the landfill in phases over the next 10 to 15 years. This expansion would increase the landfill's lifespan from 2030 to 2035.

As required by the State's Integrated Waste Management Act of 1989 (AB 939) the City is required by the to divert 50 percent of its solid waste from landfills by the end of calendar year 2000 through the implementation of various strategies, including source reduction, composting, recycling, and yard waste programs. The City reported a diversion rate of 39 percent in 2000. Preliminary data for the years 2001 and 2002 show waste diversion rates of 47 percent and 50 percent, respectively.⁵ The State has approved the City's application for a time extension regarding compliance with AB 939 until 2005.

f. Parks and Recreation Facilities. The Chico Area Recreation and Park District (CARD) is responsible for acquisition, development, and operation of community parks and recreational facilities. The Chico Park Division is responsible for development and maintenance of parks and recreational facilities.

Chico has about 3,835 acres of public parkland. Bidwell Park, which is 3,670 acres in size, makes up a majority of the parkland in Chico. Several community and neighborhood parks, as well as school sites, provide recreational opportunities for residents. Marigold School and Pleasant Valley High School serve as recreational facilities in the vicinity of the project site.

2. Impacts and Mitigation Measures

a. Criteria of Significance. The project would have a significant effect on the City's service systems if it would:

⁵ Rodowick, Steve, 2003. Recycling Coordinator, Butte County Public Works. Personal communication with LSA. September 15.

- Result in an increased demand for police and fire services exceeding existing or planned staffing levels, facilities, or equipment;
- Result in substantial adverse impacts associated with the provision of or need for new or physically altered school services and facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios or other performance objectives;
- Substantially increase demand for neighborhood parks, regional parks, or recreational facilities that would accelerate their physical deterioration, or decrease the quality of the facilities or users' experience; or
- Result in the removal of a neighborhood park or open space area.

b. Less-than-Significant Impacts. Implementation of the project would result in the following less-than-significant impacts to public services.

(1) **Law Enforcement.** Police services go through an annual budgeting process during which citywide priorities are established and service levels monitored. The increased demand for police services that would result from the introduction of the housing and commercial uses proposed for the site would require the addition of approximately two additional officers to maintain the current staffing rate of 1.23 officers/1,000 residents.⁶ The project would not require the construction of a new station or result in a significantly increased demand for police services. Funding for additional law enforcement personnel would be provided through property taxes, therefore, impacts would be less-than-significant.

(2) **Fire Protection.** The increased demand for fire services that would result from the introduction of the housing and commercial uses proposed for the site would require additional staffing on the aerial ladder truck at Fire Station 5. An eastward extension of Eaton Road is planned and would be implemented with the project. This extension would be a key piece of infrastructure in improving emergency fire response from Station 5. No new fire station will be required as a result of the project.⁷ The project would not require the construction of a new station or result in a significantly increased demand for fire protection services. Funding for additional fire protection personnel would be provided through property taxes, therefore, impacts would be less-than-significant.

(3) **Paramedics.** The increased demand for paramedic services that would result from the introduction of housing and commercial uses proposed for the site would not exceed existing or planned staffing levels, facilities or equipment.⁸

(4) **Solid Waste.** As noted above, sufficient capacity exists at the Neal Road Sanitary Landfill at least until 2018. With the County planning to expand the landfill in phases over the next 10-15

⁶ Rucker, John, 2003. Lieutenant, Chico Police Department. Personal communication with LSA. October 8.

⁷ Brown, Steve, 2003. Chief, Chico Fire Department. Personal communication with LSA. September 19.

⁸ Marshall, Marty, 2003. Director of Emergency Medical Services, Enloe Health Systems. Personal communication with LSA. September 25.

years, the landfill's lifespan would be increased until 2030-2035. Consistent with City policies, construction and demolition activities will be subject to recycling standards, and the new buildings will be designed to facilitate recycling activities.

(5) **Schools.** Development of the Sycamore Glen/Mountain Vista project would result in increased student enrollment at the three schools serving the project area. A student generation rate (SGR) is an estimate of the average number of students that would live in each dwelling unit. An SGR is employed to calculate anticipated student yields from new residential development. According to the CUSD, single- and multi-family development generate 0.22 K-6 students per unit, 0.07 grade 7 to 8 students per unit, and 0.13 grade 9 to 12 students per unit.⁹ Utilizing the CUSD student generation rates, the project is anticipated to generate 150 grade K-6 students, 48 grade 7 to 8 students, and 88 grade 9 to 12 students. The total number of students generated by the project would be approximately 286, as shown in Table IV.I-1.

Table IV.I-1: Students Generated by Project

| Grades | Generation Rate | # Students Generated by Project |
|--------|-----------------|---------------------------------|
| K-6 | 0.22 | 150 |
| 7-8 | 0.07 | 48 |
| 9-12 | 0.13 | 88 |
| Total | - | 286 |

The CUSD schools that would serve the project site are listed in Table IV.I-2. According to the District, Marigold Elementary School is currently at capacity; however, the District has capacity at other K-6 schools for the approximately 150 students that the project will generate. Elementary students would be bused to other schools that are not at capacity. School attendance boundaries may be adjusted and change may be made to school programs to accommodate the additional students generated by this and other residential projects. Bidwell Junior High School and Pleasant Valley Senior High would remain at less than capacity as shown in Table IV.I-2.

Table IV.I-2: Chico Unified School District Student Enrollment Versus School Capacities

| School | 2003-04 Student Enrollment | 2003-04 Capacities | Capacity Status |
|-----------------------------|----------------------------|--------------------|-----------------|
| Marigold Elementary | 481 | 476 | Over Capacity |
| Bidwell Junior High | 855 | 1,164 | Not at Capacity |
| Pleasant Valley Senior High | 1,937 | 2,341 | Not at Capacity |

Source: Pat Bigler, Registrar, Chico Unified School District. August, 2003.

State law (Government Code §65996) specifies the method by which a development project can offset its effect on the adequacy of school facilities: payment of a school impact fee prior to issuance of a building permit. In Chico, a project applicant can either negotiate directly with the affected school district or they can make a "presumptive payment" of \$2.14 per square foot for single- and multi-family dwelling units. The school district is responsible for implementing the specific methods for mitigating school effects under the Government Code. The school impact fees and the school district's methods of implementing measures specified by Government Code §65996 would offset project-related student enrollment, therefore, impacts will be less-than-significant.

⁹ Rafter, Pat, 2003. Accounting Technician, Chico Unified School District. Personal communication with LSA. August 21.

(6) Parks and Recreation Facilities. The additional population resulting from the Sycamore Glen and Mountain Vista projects could increase usage of the parks and recreational facilities. The General Plan's implementing policy PP-I-1 for parks and recreational open spaces establishes a goal of 5 acres of neighborhood, community and creekside/linear parks per 1,000 new residents and strives to maintain a neighborhood park standard of at least 0.68 acres per 1,000 new residents.

The project is expected to generate approximately 1,620 new residents. To comply with the policy for parks and recreation and open space, 8.1 acres of neighborhood, community and creekside/linear parks would be required. To maintain the neighborhood park standard, 1.1 additional acres of parkland would be required. The project proposes to dedicate 56.4 acres of the project site as permanent open space; however, this dedication is for habitat mitigation, not parks and recreation mitigation. The applicant will pay established park fees at the time of building permit issuance. With payment of park fees, impacts will be less than significant.

c. Significant Impacts. Implementation of the project would not result in significant impacts to public services.

d. Cumulative Impacts. As described in the preceding section, the project would contribute to growth in the City of Chico and would increase demands on public services. However, through compliance with existing regulations and payment of required development impact fees, the project's impact to public services would not be cumulatively considerable.

J. TRANSPORTATION AND CIRCULATION

This section describes the existing transportation systems serving the City of Chico and the project site, including the local roadway network, and transit and pedestrian facilities. Potential traffic and circulation impacts that would result from implementation of the proposed project are identified, and mitigation measures are recommended, as appropriate. This section is adapted from the *Transportation Impact Analysis for the Sycamore Glen/Mountain Vista Development (Chico, California)*, which was prepared by Fehr and Peers Associates, Inc. and published on August, 18, 2004. A copy of the Traffic Impact Analysis is included in Appendix G.

1. Setting

The following setting section describes the existing transportation system around the project site, including roadway facilities, transit service, and bicycle and pedestrian facilities.

a. Existing Roadway Network. The major roadway facilities that provide access to the project site are described below.

- *Eaton Road.* Eaton Road currently begins near Esplanade and extends eastward, through its interchange with SR 99, to its current terminus at Floral Avenue. There is a planned extension of Eaton Road from its existing terminus at Floral Avenue to Manzanita Avenue (East Avenue). The impacts associated with this roadway extension were analyzed in the *City of Chico Eaton Road Extension Draft EIR* (SCH No. 2002092053). Eaton Road is a two- to four-lane arterial with bicycle lanes and sidewalks near the project site. Land uses on Eaton Road near the project site are primarily residential. Eaton Road provides regional and direct access to the project site.
- *East Avenue.* East Avenue is a four-lane arterial roadway providing regional access to the project vicinity. East Avenue begins near Nord Avenue (State Route 32) and extends eastward, through its interchange with SR 99, to Wildwood Avenue. At Wildwood Avenue, East Avenue becomes Manzanita Avenue and continues to the south. Near the project site, land uses on East Avenue are primarily commercial.
- *Floral Avenue.* Floral Avenue is a north-south collector roadway that provides direct access to the project site. Near the project site, Floral Avenue is a two-lane roadway that provides access to primarily residential land uses.

b. Existing Transit Service. Public transit service is provided to the project site and its surroundings by the Chico Area Transit Service (CATS). All CATS buses are equipped with bike racks to help facilitate the use of transit and bicycling for longer distance trips. The primary routes serving the project site and the vicinity of the project site are summarized below.

- *Route 1 Esplanade.* Route 1 Esplanade is a bus route providing service between the Chico Transit Center in Downtown Chico, Enloe Hospital (Cohasset Road campus), and the project area. Adjacent to the project site, Route 1 operates on E. Lassen Avenue. Route 1 operates on weekdays from 6:20 a.m. to 9:15 p.m. on 30- to 60-minute headways, and on Saturdays from 9:20 a.m. to 6:15 p.m. on one-hour headways.
- *Route 2 Mangrove.* Route 2 Mangrove is a bus route beginning at the Chico Transit Center in Downtown Chico, extending northward on Mangrove to Enloe Hospital (Cohasset Road cam-

- pus). It continues northward to East Avenue, then proceeds East to Cohasset Road, where it continues northward toward the project area. Route 2 operates during weekdays on 30- to 60-minute headways from 6:20 a.m. to 9:20 p.m. On Saturdays, Route 2 operates on one-hour headways between 9:25 a.m. to 6:20 p.m.
- *Route 4 First & East.* Route 4 First & East is a bus route operating on weekdays from 6:20 a.m. to 8:15 p.m. on 30- to 60-minute headways. On Saturdays, it operates from 8:20 a.m. to 5:15 p.m. on one-hour headways. Route 4 provides service between the Chico Transit Center, Pleasant Valley High School, and Bidwell Junior High School. In the project area, Route 4 operates on East Avenue between Marigold Avenue and North Avenue with stops at most cross-streets.
 - *Route 7 Bruce-Manzanita.* Route 7 Bruce-Manzanita is a bus route that operates between Sycamore Glen and the Chico Mall. Near the project area, Route 7 operates on Lassen Avenue, Eaton Road, Floral Avenue, and East Avenue-Manzanita Avenue. Route 7 operates on weekdays between 6:50 a.m. and 8:20 p.m. on one-hour headways. On Saturdays, it operates between 8:50 a.m. and 6:45 p.m. on on-hour headways.
- c. **Bicycle and Pedestrian Facilities.** Bicycle facilities are typically classified as Class I, Class II, or Class III facilities. Class I facilities are bicycle paths that are typically paved trails separated from roadways. Class II facilities are lanes on roadways designated for bicycle use by striping, pavement legends, and signs. Class III facilities (bicycle routes) are roadways that are designated for bicycle use with signs.

Pedestrian facilities include sidewalks, crosswalks, and pedestrian signals. The existing bicycle and pedestrian facilities in the vicinity of the project site are described below:

- A Class I bicycle facility beginning at the Chico Municipal Airport and extending south paralleling (on the west side) Cohasset Road to Eaton Road. At Eaton Road, it proceeds southwest to the Esplanade.
 - Portions of a Class I bicycle facility exist along Sycamore Creek, just north of Eaton Road adjacent to the project site. The proposed facility, after completion, will extend eastward through the project site to Manzanita Avenue. An additional facility is planned with an alignment along Big Chico Creek, according to the Chico Urban Area 1998 Bicycle Plan.
 - Class II bicycle lanes are located on Eaton Road, between Cohasset Road and Lassen Avenue. The proposed Eaton Road extension will include bicycle lanes, and the discontinuous section through the project site between Lassen Avenue and Floral Avenue is a planned bicycle facility, according to the Chico Urban Area 1998 Bicycle Plan.
 - North Avenue, Floral Avenue, Marigold Avenue, and Manzanita Avenue are all planned to have Class II bicycle lanes, according to the Chico Urban Area 1998 Bicycle Plan.
 - Most roadways in the study areas have sidewalks with pedestrian crosswalks at most intersections.
- d. **Analysis Procedures.** The following five key intersections were subject to detailed level of service (LOS) analysis to determine if they would be substantially adversely affected by traffic associated with the proposed project: Eaton Road/Cohasset Road; East Avenue/Mariposa Avenue; Eaton Road/Floral Avenue; East Avenue/Floral Avenue; and East Avenue/Ceanothus Avenue. "Level of

service” is a qualitative description of traffic flow based on such factors as speed, travel time, delay, and freedom to maneuver. Six levels are defined, from LOS A, as the best operating conditions, to LOS F, the worst operating conditions. LOS E represents “at-capacity” operations. When volumes exceed capacity, stop-and-go conditions result, and operations are designated as LOS F. In the City of Chico, acceptable intersection operation is LOS C or better on residential streets and LOS D or better on arterials during the peak hours.

The key intersections were analyzed under weekday AM, weekday PM, and Saturday midday peak-hour traffic conditions. Peak conditions usually occur from 7:00 a.m. to 9:00 a.m., from 4:00 p.m. to 6:00 p.m., and from 12:30 p.m. to 2:30 p.m., for the AM, PM, and Saturday midday analysis periods, respectively. Intersection operations were evaluated for the one hour during each of these periods for which the highest traffic volumes were measured. Traffic counts were obtained from available count data from the Eaton Road Extension EIR and were supplemented with new counts at the Floral Avenue/Eaton Road intersection. The new traffic counts are presented in Appendix A of the Transportation Impact Analysis. The peak-hour traffic volumes at the study intersections are shown on Figure IV.J-1.

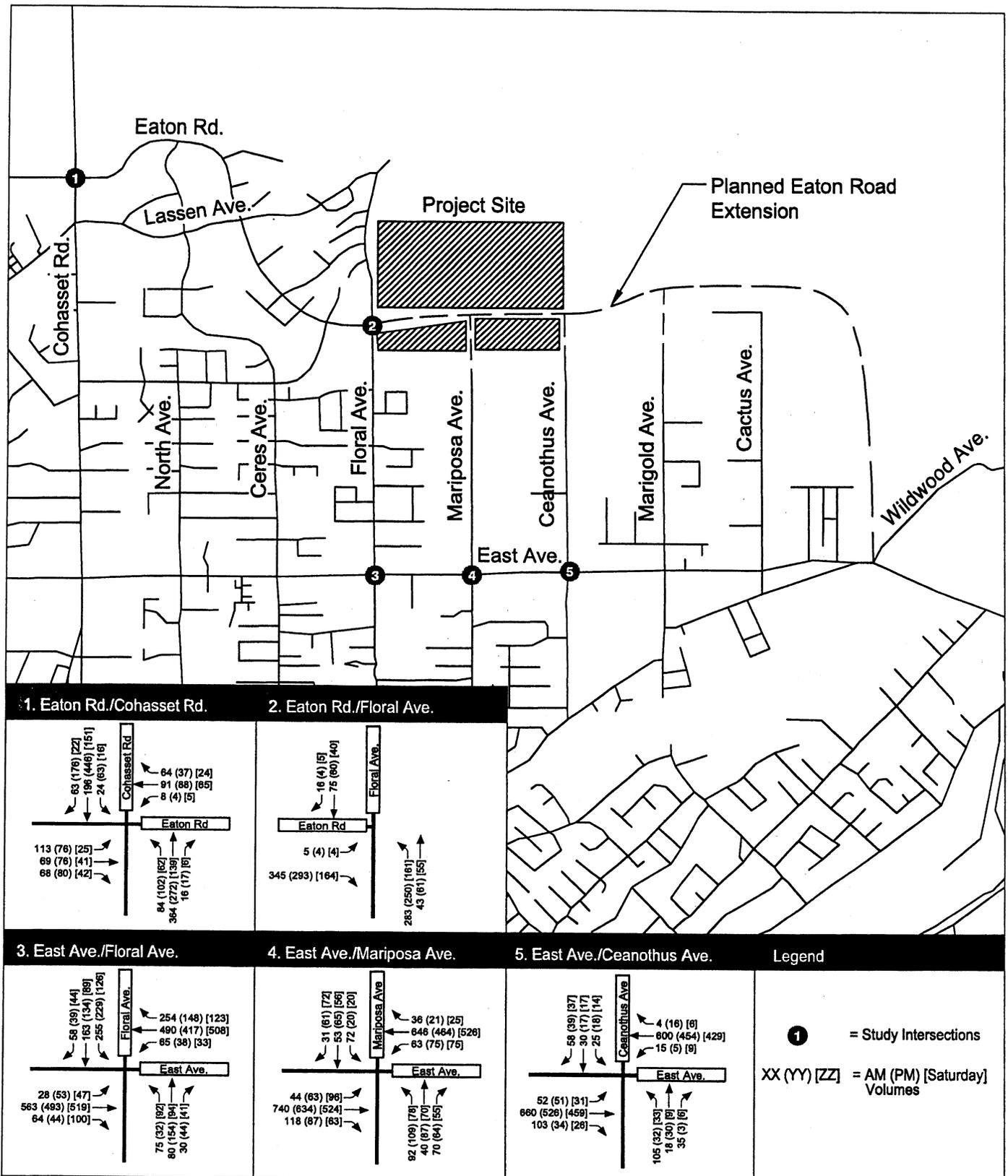
The existing lane configurations, traffic control devices, cycle lengths, and turn pocket lengths at the study intersections were obtained during a field visit. The existing geometrics at the analyzed intersection are illustrated in Figure IV.J-2. Please refer to the Transportation Impact Analysis for a discussion of the methodologies and assumptions used in determining the LOS of the analyzed intersections.

e. Existing Intersection Levels of Service. The peak-hour turning movement volumes and the existing intersection geometries were used to calculate the AM, PM, and Saturday midday peak-hour levels of service at the analyzed intersections. The results of the existing LOS analysis are presented in Table IV.J-1 and the corresponding calculation sheets are contained in Appendix B of the Transportation Impact Analysis.

f. Baseline Intersection Levels of Service. The baseline traffic condition comprises the expected operations at the analyzed intersections under present-day conditions, assuming the Eaton Road extension has been completed. This analysis scenario forms the baseline that is used to identify project-related traffic impacts.

The City of Chico travel demand forecasting model is maintained by TMODEL Corporation. To estimate the amount of traffic expected on the local roadway system under near-term conditions, peak hour traffic forecasts were obtained from TMODEL under base year (1998) conditions with and without the proposed Eaton Road Extension project. The forecasting model assumes that Eaton Road would be constructed as a four-lane arterial roadway.

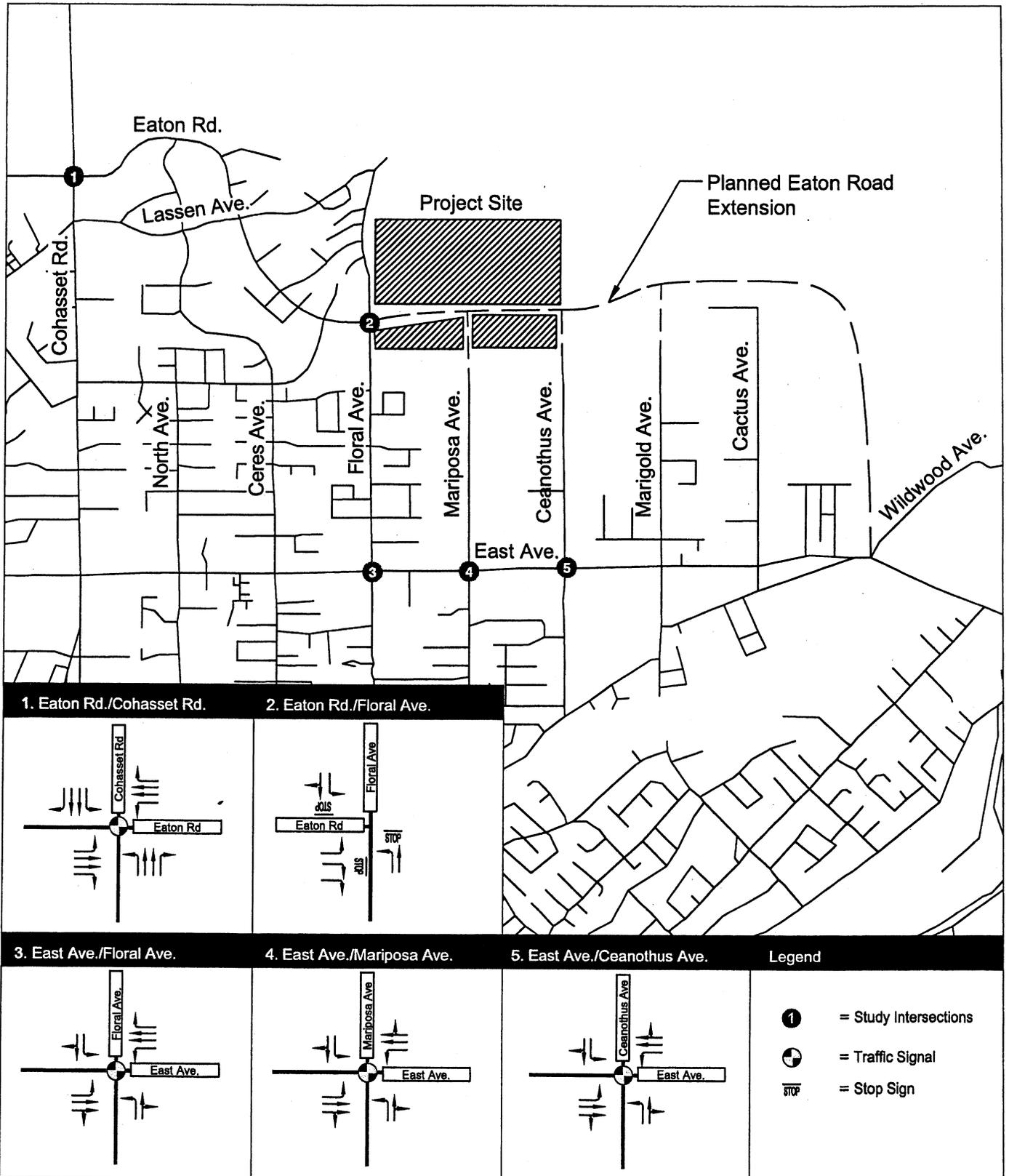
The traffic forecasts were reviewed and refined by Fehr & Peers Associates for the purpose of conducting intersection operations analysis for the Eaton Road Extension Draft EIR (June 2003). The raw intersection turning movement counts from the 1998 land use without Eaton Road extension model run were compared to the existing (2003) intersection counts. Adjustment factors were developed by intersection and by movement. The differences between the existing counts and the 1998 model run were calculated. These calculated differences were used to adjust the intersection turning movements produced by the model runs with the 1998 land use and Eaton Road extension.



LSA

FIGURE IV.J-1

Sycamore Glen/Mountain Vista EIR
Existing Peak Hour
Intersection Volumes



LSA

FIGURE IV.J-2

Sycamore Glen/Mountain Vista EIR
**Existing Intersection
 Lane Configurations**

SOURCE: FEHR & PEERS, 2004.

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Table IV.J-1: Existing Intersection Levels of Service

| Intersection | Traffic Control | AM Peak Hour | | PM Peak Hour | | Saturday Midday Peak Hour | |
|----------------------------------|-------------------------|--------------------|------------------|--------------------|------------------|---------------------------|------------------|
| | | Delay ^a | LOS ^b | Delay ^a | LOS ^b | Delay ^a | LOS ^b |
| Eaton Road/ Cohasset Road | Signal | 18.9 | B | 17.9 | B | 16.4 | B |
| Eaton Road/ Floral Avenue | All-Way Stop-Control | 11.7 | B | 10.6 | B | 8.8 | A |
| East Avenue/ Floral Avenue | Signal | 24.7 | C | 24.4 | C | 19.2 | B |
| East Avenue/ Mariposa Avenue | Signal | 24.2 | C | 30.5 | C | 24.3 | C |
| East Avenue/ Ceanothus Avenue | Signal | 14.8 | B | 10.9 | B | 11.7 | B |

^a Intersection delay is for the average control delay and is expressed in seconds per vehicle. Analysis conducted using the methodologies in the *2000 Highway Capacity Manual*, Transportation Research Board. Delays calculated using the Synchro 5.0 software package for signalized intersections. The TRAFFIX software package was used to calculate LOS at the Eaton Road/Floral Avenue intersection.

^b LOS = Level of Service

Source: Fehr & Peers, 2004.

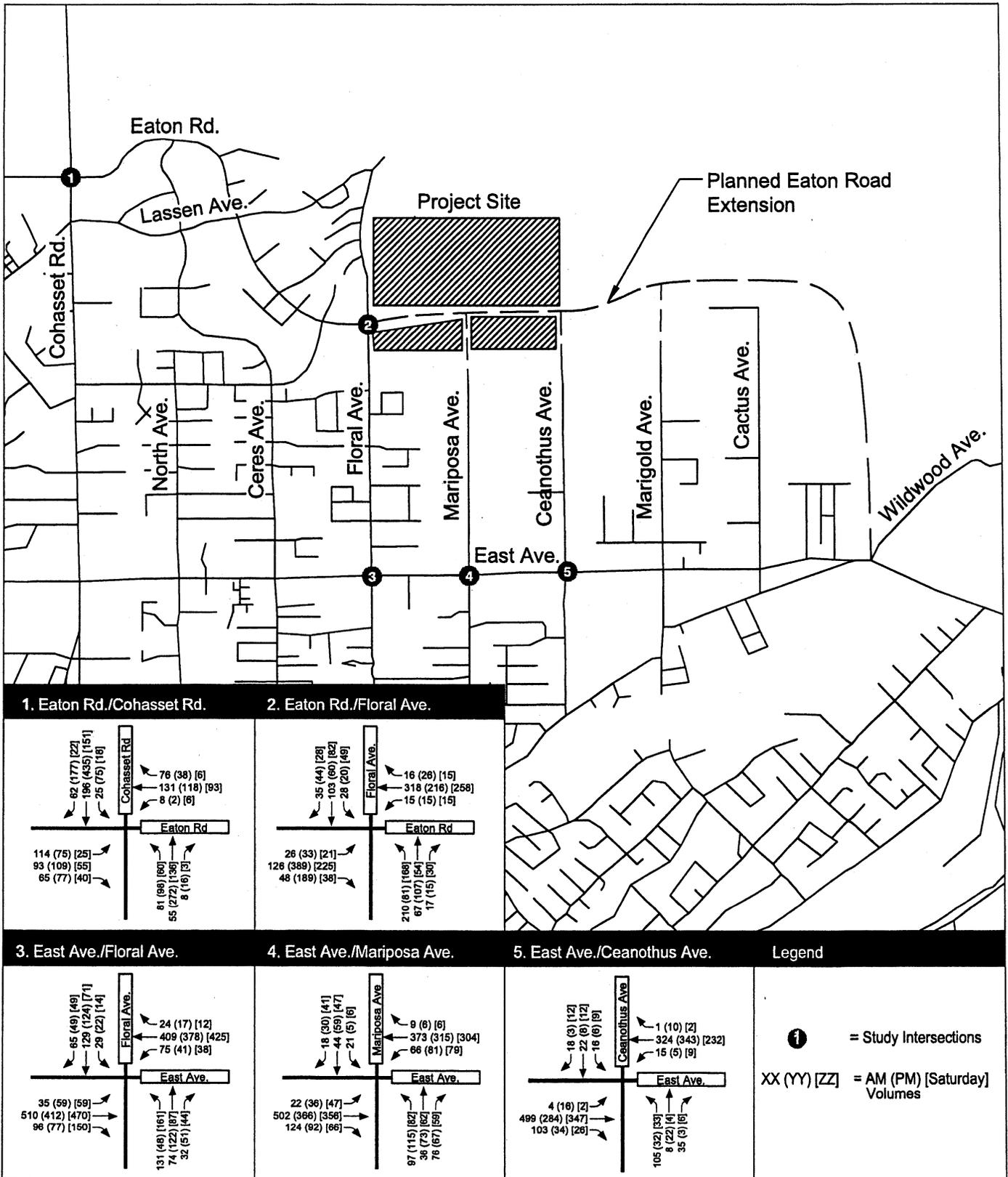
The volumes developed using this process were obtained from the Eaton Road Extension Draft EIR and are presented on Figure IV.J-3.

(1) With Eaton Road Extension Intersection Geometrics. The lane configurations will change at the Eaton Road/Floral Avenue intersection (study intersection 2) as the Eaton Road extension will add a fourth leg to the intersection. For the purposes of the Transportation Impact Analysis, and to be consistent with assumptions made in the Eaton Road Extension Draft EIR analysis, the intersection was assumed to be all-way stop-controlled.

The assumed lane configuration at the Eaton Road/Floral Avenue intersection is presented on Figure IV.J-4.

(2) With Eaton Road Extension Intersection Levels of Service. Levels of service were calculated at the study intersections using the volume and lane configuration assumptions developed for the Existing with Eaton Road Extension Conditions analysis. Table IV.J-2 presents the LOS results under this condition and the corresponding LOS calculation sheets are included in Appendix B of the Transportation Impact Analysis.

The results of the intersection analysis indicate that, with the Eaton Road extension, all of the study intersections are projected to operate at acceptable levels during the AM, PM, and Saturday midday peak hours.

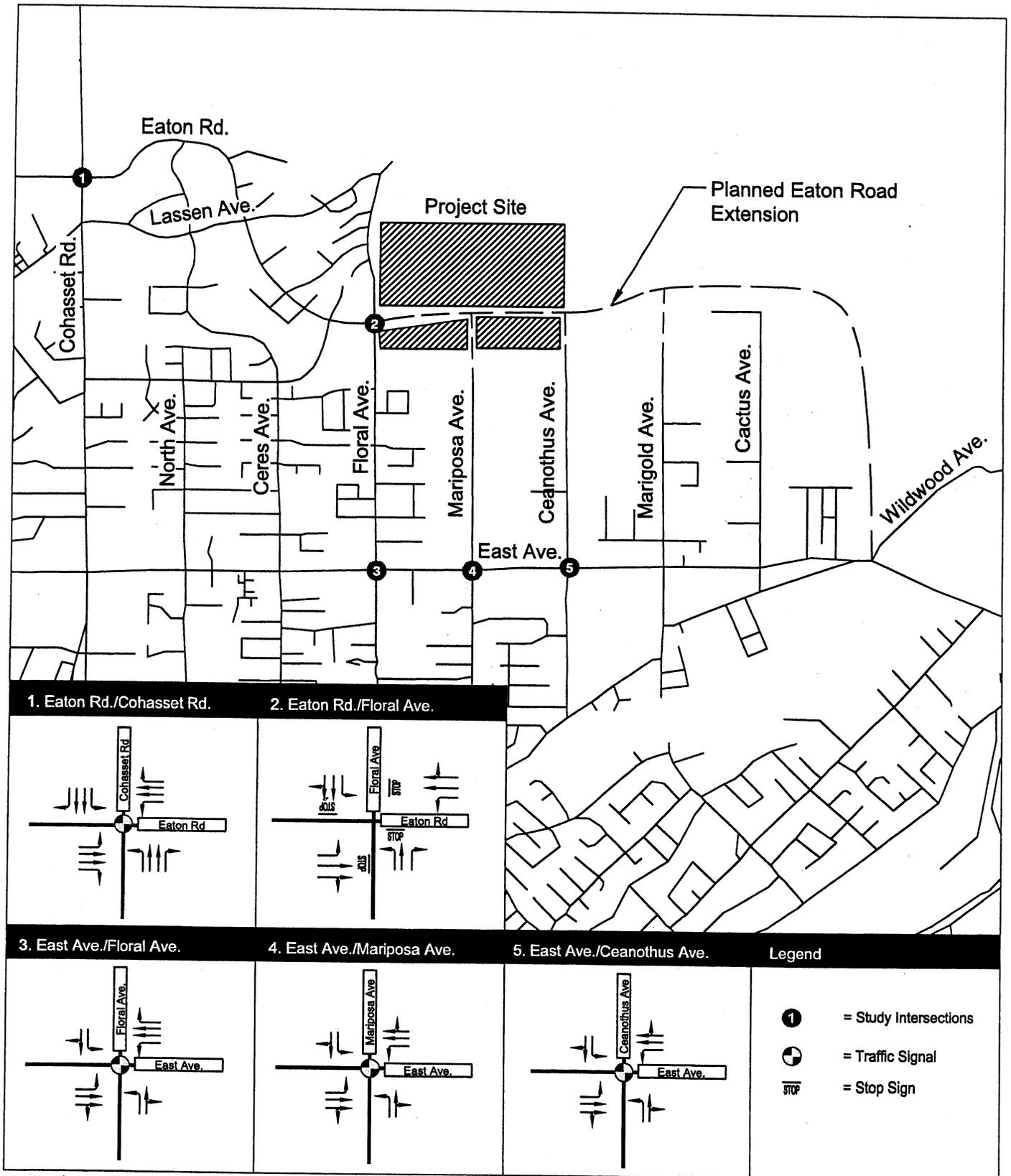


LSA

FIGURE IV.J-3

Sycamore Glen/Mountain Vista EIR
 Existing with Eaton Road Extension
 Peak Hour Intersection Volumes

SOURCE: FEHR & PEERS, 2003.



LSA

FIGURE IV.J-4

Sycamore Glen/Mountain Vista EIR
 Existing with Eaton Road Extension Intersection
 Lane Configurations

SOURCE: FEHR & PEERS, 2003.

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Table IV.J-2: Existing With Eaton Road Extension Intersection Levels of Service

| Intersection | Traffic Control | AM Peak Hour | | PM Peak Hour | | Saturday Midday Peak Hour | |
|----------------------------------|-------------------------|--------------------|------------------|--------------------|------------------|---------------------------|------------------|
| | | Delay ^a | LOS ^b | Delay ^a | LOS ^b | Delay ^a | LOS ^b |
| Eaton Road/ Cohasset Road | Signal | 18.9 | B | 18.4 | B | 16.5 | B |
| Eaton Road/ Floral Avenue | All-Way Stop-Control | 13.1 | B | 14.8 | B | 12.3 | B |
| East Avenue/ Floral Avenue | Signal | 31.0 | C | 18.7 | B | 20.5 | C |
| East Avenue/ Mariposa Avenue | Signal | 20.4 | C | 31.5 | C | 28.0 | C |
| East Avenue/ Ceanothus Avenue | Signal | 10.4 | B | 9.9 | A | 13.9 | B |

^a Intersection delay is for the average control delay and is expressed in seconds per vehicle. Analysis conducted using the methodologies in the *2000 Highway Capacity Manual*, Transportation Research Board. Delays calculated using the Synchro 5.0 software package for signalized intersections. The TRAFFIX software package was used to calculate LOS at the Eaton Road/Floral Avenue intersection.

^b LOS = Level of Service

Source: Fehr & Peers, 2004.

g. Regulatory Setting. The local transportation regulations that apply to the proposed project include the City of Chico General Plan (City of Chico, 1994 and amended in 1999) and the Chico Urban Area 1998 Bicycle Plan (City of Chico, 1998). Relevant policies from these two plans are listed below:

(1) **City of Chico General Plan.** Applicable General Plan policies are found in various sections of the plan and are discussed below.

Bicycle and Pedestrian Circulation

- T-G-1. Develop a system of sidewalks and bikeways that promote safe walking and bicycle riding for transportation and recreation.
- T-G-2. Provide safe and direct pedestrian routes and bikeways between and through residential neighborhoods and other places within the Planning Area, particularly where no or undersized facilities are provided.
- T-G-3. Provide adequate bicycle parking facilities.
- T-G-5. Provide and plan for bicycle and pedestrian access to new development including on-site access for new residential development.
- T-G-6. Plan and design pedestrian facilities to meet the needs of disabled persons.

- T-I-16. At high volume bicycle/automobile intersections that have actuated signals, install bicycle detector loops and consider the feasibility of providing mid-block, bicycle activated signals, where appropriate.
- T-I-19. Provide for pedestrian-friendly zones in conjunction with the development, redevelopment, and design of mixed use neighborhood core areas, the Downtown area, schools, parks, and other high use areas by constructing wide sidewalks, providing intersection "bulbing," continuing to provide pedestrian facilities at all signalized intersection, providing landscaping, and constructing adequately lighted and safe access through subdivision sites.

Standards for Traffic Levels

- T-G-11. Strive to maintain traffic LOS C on residential streets and LOS D or better on arterial and collector streets, at all intersections, and on principal arterials in the CMP during peak hours. *Note: Since all of the study intersections are on arterial roadways (Eaton Road, East Avenue, or Cohasset Road), LOS D is considered the minimal acceptable operating level of the study intersections for the purpose of this analysis.*
- T-G-13. Establish and implement engineering standards and cross-section specifications for Planning Area roadway networks, consistent with Table 4.4-1 and Caltrans adopted standards for highways and bicycle facilities. Continued coordination between the City and County on transportation standards will be needed.
- T-I-29. Improve intersections as needed to maintain LOS standards and safety on major arterials.

Neighborhood Streets

- T-I-46. Discourage speeding and "cut-through" traffic on local neighborhood streets by installing appropriate traffic control devices, such as bulbing and narrower street widths.
- T-I-47. Discourage parking intrusion in residential neighborhoods from commercial areas by adopting parking control strategies such as restrictions, signs, or permit systems, where appropriate.

(2) Chico Urban Area 1998 Bicycle Plan. The Chico Urban Area 1998 Bicycle Plan, adopted by the City Council on March 16, 1999, documents the existing and planned bikeways in the City of Chico. It also includes the following transportation goals, objectives, and policy statements that are applicable to the proposed project:

Goal 1. Provide safe and direct routes for cyclists between and through residential neighborhoods, commercial areas, schools, and other major destinations within the Chico Urban Area.

Objective. Identify needed bike paths, lanes, and/or routes, and related bike facilities needed in the Chico Urban Area.

Policies:

3. Promote bikeways between educational, recreational, shopping, governmental, residential, and other attractions.
4. Provide cyclists with direct connections between origins and destinations.

Goal 3. Provide adequate bicycle parking facilities.

Objective. Improve availability of bicycle parking facilities at a variety of land uses.

Policies:

1. Require provision of secure, well-lit, covered bicycle parking at all existing and future multiple-family, commercial, industrial, and office/institutional uses.
6. Encourage the school district to provide for safe, secure, convenient, and covered bicycle parking for students and staff.

Goal 4. Provide and plan for bicycle and pedestrian access to new development including on-site access for new residential development.

Objective. Provide a continuous system of bicycle and pedestrian paths that link new residential development with existing facilities.

Policies:

4. Maintain continuity of bike lanes along arterials through developing areas, avoiding piecemeal bike lane construction.

2. Impacts and Mitigation Measures

This analysis compares intersection LOS, traffic safety, pedestrian and bike safety, transit conditions, and site circulation before and after project traffic is added to the roadway network. This analysis examines and compares four conditions:

- *Scenario 1 – Existing Conditions.* This scenario includes existing traffic volumes obtained from counts, representing peak one-hour traffic conditions during the morning, evening, and Saturday midday peak periods.
 - *Scenario 2 – Existing with Eaton Road Extension Conditions.* This scenario represents existing conditions, assuming the planned Eaton Road extension has been completed.
 - *Scenario 3 – Project Conditions.* Scenario 3 represents existing conditions with the Eaton Road extension plus traffic associated with the proposed project.
 - *Scenario 4 – Cumulative Conditions.* Cumulative conditions comprise the traffic that would result from complete buildout of the City of Chico General Plan.
- a. **Criteria of Significance.** According to City of Chico significance criteria, the proposed project would have a significant effect if it:

Roadway System Criteria

1. Causes the existing or buildout no-project level service at an intersection to deteriorate from an acceptable level (LOS D or better) to LOS E or F; or
2. Exacerbates existing or buildout no-project unacceptable intersection operations (LOS E or F) by adding additional traffic; or
3. Creates inconsistencies with adopted roadway system plans, guidelines, policies, or standards of the City of Chico; or
4. Creates or increases conflicts between travel modes (e.g. between vehicles and bicycles).

Bicycle and Pedestrian System Criteria

1. Disrupts existing bicycle or pedestrian facilities; or
2. Interferes with planned bicycle or pedestrian facilities; or
3. Creates inconsistencies with adopted bicycle or pedestrian system plans, guidelines, policies, or standards of the City of Chico.

Transit System Criteria

1. Creates demand for public transit services above that which is provided or planned by the City of Chico; or
2. Disrupts existing transit services or facilities; or
3. Interferes with planned transit services or facilities; or
4. Creates inconsistencies with adopted transit system plans, guidelines, policies, or standards of Chico.

a. **Less-than-Significant Impacts.** This section describes several less-than-significant transportation and circulation impacts that could result from implementation of the proposed project. First, the methodology of the traffic impact analysis is provided below.

Project Traffic Volumes. The amount of traffic that would be generated by the proposed project was estimated using a three-step process: (1) trip generation, (2) trip distribution, and (3) trip assignment. In the first step, the amounts of traffic entering and exiting the project site were estimated. In the second step, the directions the trips use to approach and depart from the site were projected. The trips were assigned to specific street segments and intersection turning movements in the third step. The results of this process are described in the following sections.

Trip Generation. The proposed project includes 409 single-family homes, 271 multi-family homes, and 25,000 square feet of commercial floor space. Trip generation for the proposed project was estimated using appropriate rates presented in the Institute of Transportation Engineers' (ITE) *Trip Generation* (6th Edition). These rates and the proposed project's trip generation estimates are summarized in Table IV.J-3.

It should be noted that the proposed project is a mixed-use development (i.e. retail with housing) and some of the trip ends generated will be contained within the project site. However, no mixed-use trip

Table IV.J-3: Trip Generation Estimates

| Use | Size | Daily | | AM Peak Hour | | | PM Peak Hour | | | Saturday Midday Peak Hour | | | | | |
|----------------------------|--------|-------|--------------|--------------|------------|------------|--------------|------|------------|---------------------------|------------|------|------------|------------|------------|
| | | Rate | Trips | Rate | Inbound | Outbound | Total | Rate | Inbound | Outbound | Total | Rate | Inbound | Outbound | Total |
| Single Family ^a | 409 | 9.26 | 3,788 | 0.72 | 74 | 222 | 296 | 0.93 | 244 | 138 | 382 | 0.91 | 202 | 172 | 373 |
| Apartments ^a | 271 | 6.49 | 1,758 | 0.51 | 22 | 116 | 138 | 0.61 | 111 | 55 | 166 | 0.52 | 76 | 65 | 141 |
| Commercial ^b | 25,000 | 40.67 | 1,017 | 1.11 | 16 | 10 | 26 | 2.59 | 28 | 37 | 65 | 4.97 | 65 | 60 | 124 |
| <i>Totals</i> | | | <i>6,563</i> | | <i>112</i> | <i>348</i> | <i>460</i> | | <i>383</i> | <i>230</i> | <i>613</i> | | <i>343</i> | <i>297</i> | <i>640</i> |

^a Trip generation estimates for single-family and apartment land uses based on rates and equations presented in the Institute of Transportation Engineers' (ITE) *Trip Generation* (6th Edition). ITE does not present inbound/outbound splits during the Saturday midday peak hour for apartments. Therefore, inbound/outbound splits assumed to be equivalent to single-family.

^b Trip generation estimates for commercial land use based on ITE rates. Daily and PM peak hour rates from "specialty retail" land use. AM and Saturday midday peak hour rates from "shopping center" land use.

Note: It should be noted that no mixed-use trip reductions were applied to account for internalized trips between the housing and retail land uses. This is considered a conservative approach for the purposes of this analysis.

Source: Fehr & Peers, 2004.

reductions were used in this analysis. Therefore, this analysis errs on the side of over-estimating project-related trips.

The proposed project is expected to generate 6,563 weekday trips, 460 a.m. peak hour trips (112 inbound/348 outbound), 613 PM peak hour trips (383 inbound/230 outbound), and 640 Saturday midday peak hour trips (343 inbound/297 outbound).

Trip Distribution. The TMODEL travel demand forecasting model was run under the 1998 land use scenario plus the proposed project (assuming the Eaton Road extension). The results of the model run were compared to the 1998 land use scenario (no project) with Eaton Road conditions model runs to determine the trip distribution for the proposed project. The assumed project trip distribution is presented on Figure IV.J-5.

Trip Assignment. Trips generated by the proposed project were manually assigned to the roadway system based on the anticipated directions of approach and departure. The trip assignments during the AM, PM, and Saturday midday peak hours are shown on Figure IV.J-6.

The project trip assignments were added to the Existing with Eaton Road Extension volumes to determine Project Condition volumes. Project Condition volumes are presented on Figure IV.J-7 and are described below.

(1) **Intersection Levels of Service.** Intersection LOS calculations were conducted to evaluate intersection operations under Project Conditions. The results of the LOS analysis for Existing with Eaton Road Extension and Project Conditions are summarized in Table IV.J-4. The corresponding LOS calculation sheets are included in Appendix B of the Transportation Impact Analysis.

The results of the intersection level of service analysis under Project Conditions indicates that all of the study intersections are projected to operate at an acceptable LOS C or better during the AM, PM, and Saturday midday peak hours. Therefore, the proposed project would not result in a significant project-level impact to intersection levels of service.

(2) **Policy Consistency and Conflicts Between Travel Modes.** The proposed project would be designed to accommodate a 124-foot-wide Eaton Road. This cross-section would be adequate to accommodate four lanes (two in each direction), a center median with left-turn pockets at intersections, bicycle lanes, and sidewalks. The proposed cross-section is expected to be adequate to design the roadway consistent with City of Chico design standards. The proposed cross-section is also consistent with the City of Chico General Plan. Therefore, the proposed project would not conflict with applicable policies or result in significant conflicts between travel modes.

(3) **Transit System.** The proposed project is not expected to disrupt existing transit service, interfere with planned transit services or facilities, or be inconsistent with adopted transit system plans, guidelines, policies, or standards.

(4) **Vehicular Site Access and On-Site Circulation.** This subsection describes potential site access and circulation-related impacts that could result from implementation of the proposed project.

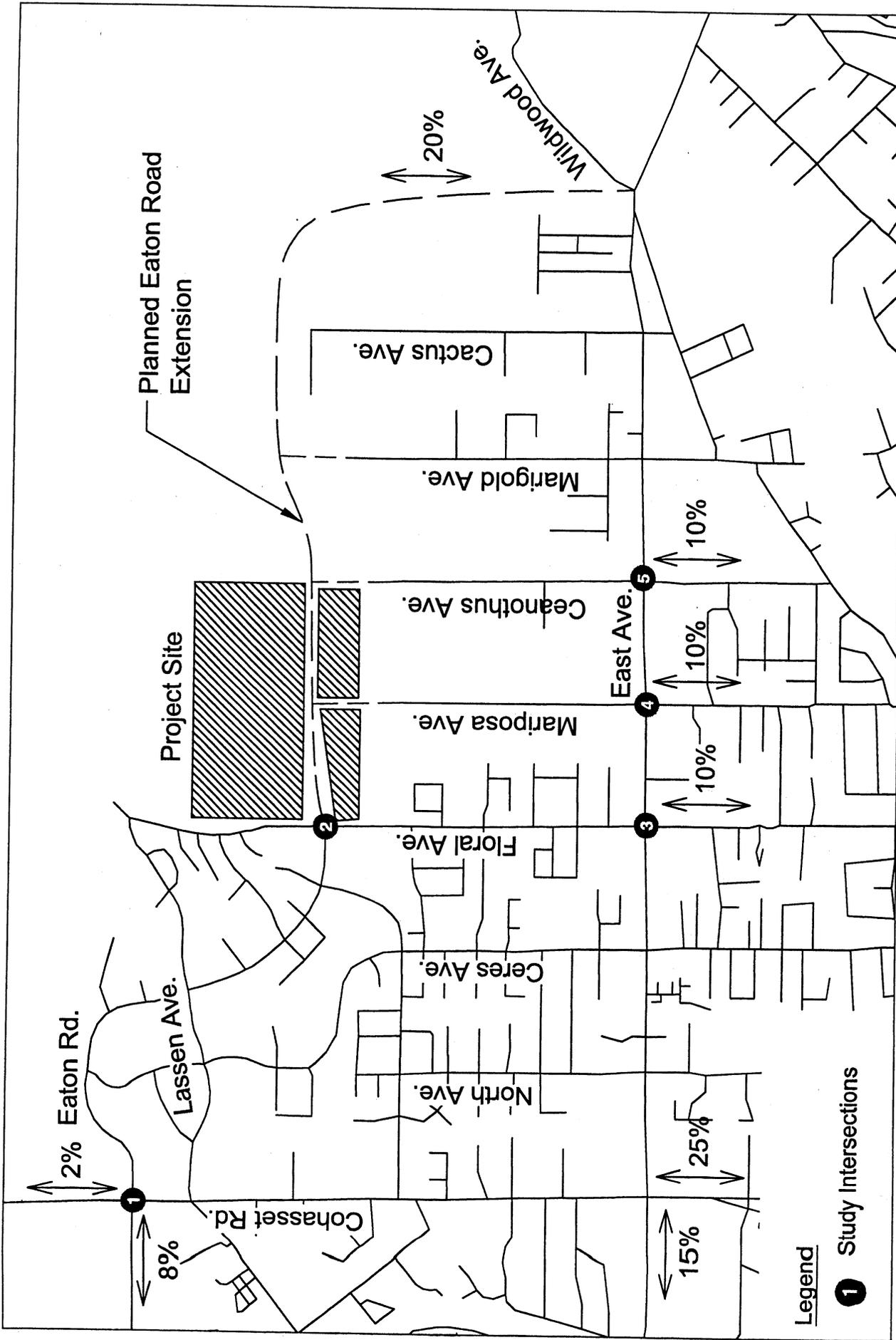
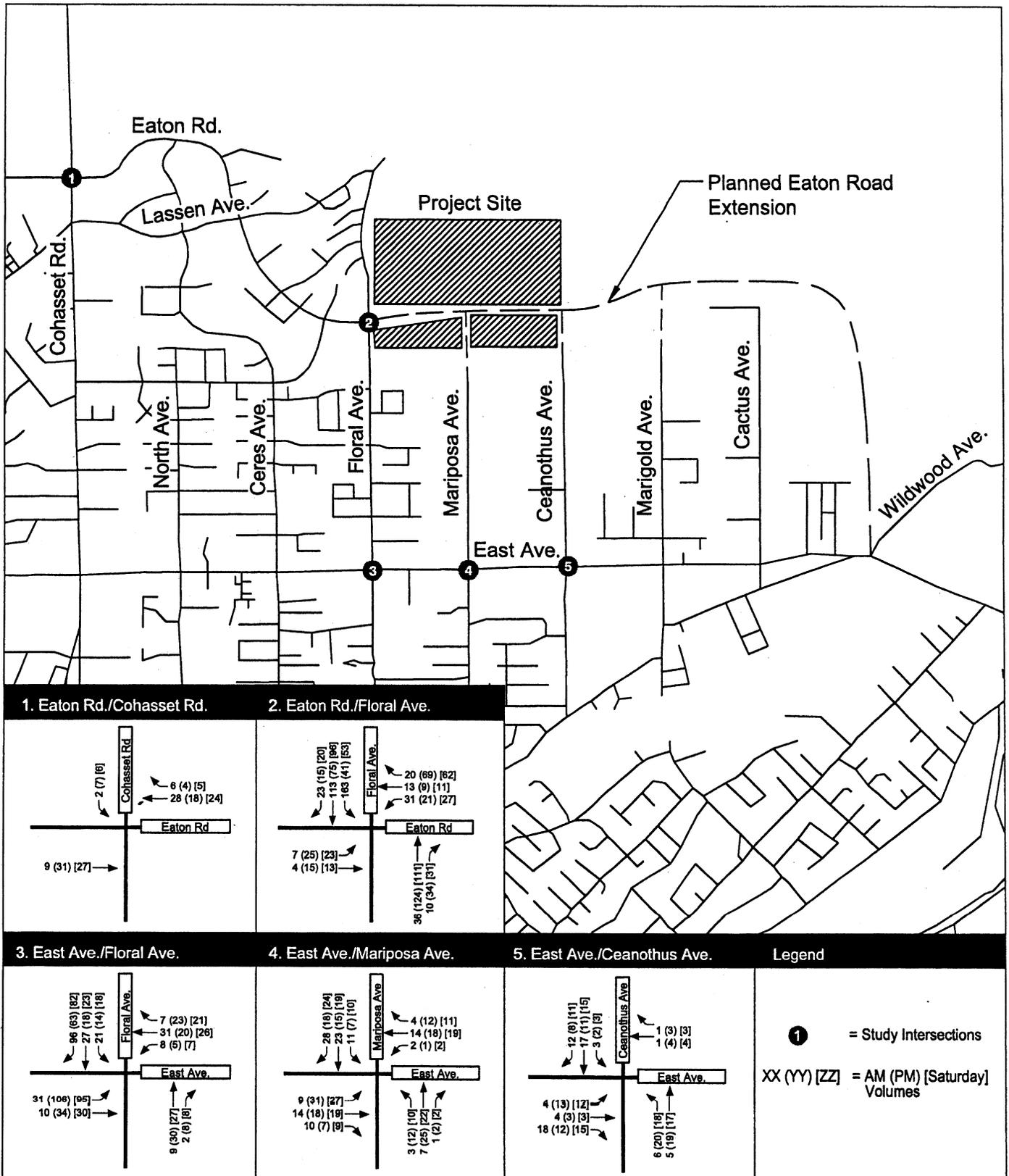


FIGURE IV.J-5
 Sycamore Glen/Mountain Vista EIR
 Project Trip Distribution

SOURCE: FEHR & PEERS, 2003.
 I:\CHC330 SYCAMORE GLEN\FIGURES\FIG_IVJ5.AI (06/02/04)

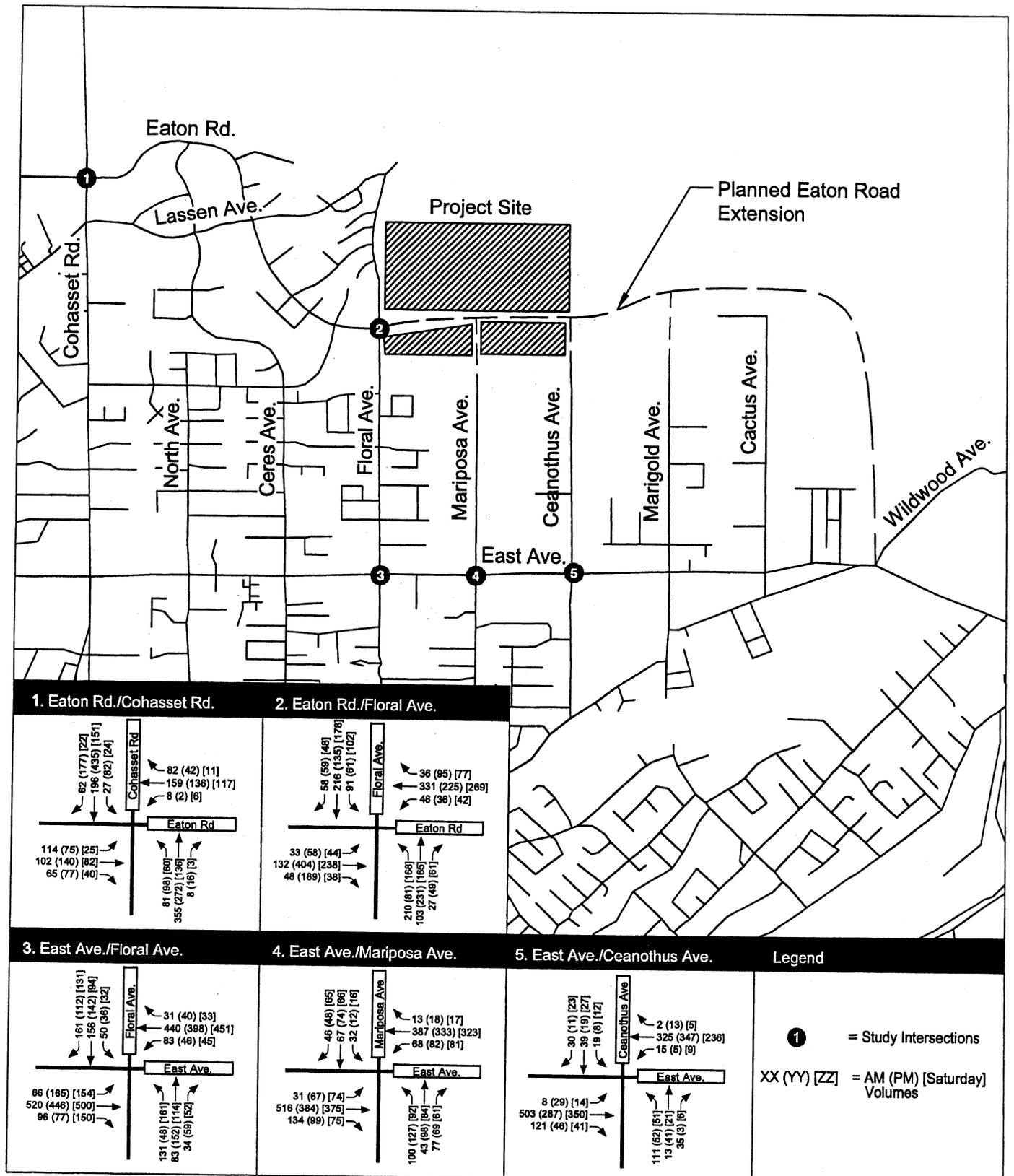


LSA

FIGURE IV.J-6

Sycamore Glen/Mountain Vista EIR
 Project Trip Assignment

SOURCE: FEHR & PEERS, 2004.



LSA

FIGURE IV.J-7

Sycamore Glen/Mountain Vista EIR
Project Peak Hour
Intersection Volumes

SOURCE: FEHR & PEERS, 2003.

Table IV.J-4: Existing With Eaton Road Extension and Project Intersection Levels of Service

| Intersection | Peak Hour | Existing with Eaton Road Extension Conditions | | Project Conditions | |
|------------------------------|-----------------|---|------------------|--------------------|------------------|
| | | Delay ^a | LOS ^b | Delay ^a | LOS ^b |
| Eaton Road/Cohasset Road | AM | 18.9 | B | 19.5 | B |
| | PM | 18.4 | B | 19.4 | B |
| | Saturday Midday | 16.5 | B | 17.1 | B |
| Eaton Road/Floral Avenue | AM | 13.1 | B | 16.0 | C |
| | PM | 14.8 | B | 24.6 | C |
| | Saturday Midday | 12.3 | B | 16.5 | C |
| East Avenue/Floral Avenue | AM | 31.0 | C | 29.6 | C |
| | PM | 18.7 | B | 24.0 | C |
| | Saturday Midday | 20.5 | C | 28.1 | C |
| East Avenue/Mariposa Avenue | AM | 20.4 | C | 31.1 | C |
| | PM | 31.5 | C | 31.9 | C |
| | Saturday Midday | 28.0 | C | 25.3 | C |
| East Avenue/Ceanothus Avenue | AM | 10.4 | B | 11.0 | B |
| | PM | 9.9 | A | 11.3 | B |
| | Saturday Midday | 13.9 | B | 12.0 | B |

^a Intersection delay is for the average control delay and is expressed in seconds per vehicle. Analysis conducted using the methodologies in the *2000 Highway Capacity Manual*, Transportation Research Board. Delays calculated using the Synchro 5.0 software package for signalized intersections. The TRAFFIX software package was used to calculate LOS at the Eaton Road/Floral Avenue intersection.

^b LOS = Level of Service

Note: Decreases in delay between Existing with Eaton Road Extension Conditions and Project Conditions occur when project traffic is added to turning movements with less delay.

Source: Fehr & Peers, 2004.

Site Access. Access to the project site would be accommodated via new roadways intersecting with Eaton Road, Floral Avenue, Mariposa Avenue, and Ceanothus Avenue. The proposed access points to the residential component of the proposed project (four from Floral Avenue, one from Eaton Road, four from Mariposa Avenue, and one from Ceanothus Avenue) are considered to be sufficient to serve expected demand.

On-Site Circulation. The preliminary site plan indicates that proposed internal roadways would be 58 to 62 feet wide. This width is sufficient to accommodate pedestrian facilities, on-street parking, and one travel lane in each direction. All dead-end roadways are cul-de-sacs that provide sufficient turning radii. On-site circulation is therefore considered to be acceptable. The local fire department would review the site plan to ensure that adequate emergency vehicle access is provided.

Bicycle and Pedestrian System. Eaton Road is designated in the City of Chico General Plan as a four-lane arterial with bicycle lanes. The Chico Urban Area 1998 Bicycle Plan also designates

Eaton Road as a Class II facility. City staff has indicated that the road will be designed to City standards, which include bicycle lanes and sidewalks. The proposed cross-section of Eaton Road (as exhibited in Figure IV.H-1) is considered sufficient to accommodate bicycle and pedestrian facilities. Therefore, the project would not have a significant impact on the pedestrian and bicycle system.

b. Significant Impacts and Mitigation Measures. Implementation of the project would result in one significant project-level transportation-related impact. This impact is described below.

Impact TRANS-1: Implementation of the proposed project may create demand for public transit service above that which is currently planned or provided for by the City of Chico. (S)

Transit ridership information was obtained from the Butte County Association of Governments, the responsible agency for CATS. The data indicate that CATS has approximately 850,000 riders per year, and staff indicated that bus service on some routes is near capacity during the AM commute period. Assuming six ridership days per week (to account for reduced service and use on weekends) over 52 weeks per year, CATS is estimated to carry on an average day almost 2,700 riders per day. Area census data indicate that there are just over 34,000 households in the City of Chico, which equates to 0.08 transit trips per day per household.

Using the rate developed above, the proposed project, which includes 680 households, would generate 54 daily transit trips. The additional demand created by the proposed project may exceed the available capacity during the AM commute period. However, implementation of the following mitigation measure would reduce this impact to a less-than-significant level:

Mitigation Measure TRANS-1: The project applicant shall work with CATS to ensure that sufficient service is provided to the study area, if deemed necessary by CATS. In addition, the project shall coordinate with CATS to provide two convenient transit stops within the project site. The transit stops shall be located on Eaton Road and shall include pedestrian shelters. In addition, adequate bus turn-out areas shall be provided so that stopped buses do not interfere with through vehicles on the roadway system.

Level of Significance After Mitigation: Implementation of Mitigation Measure TRANS-1 would reduce this potential impact to the transit system to a less-than-significant level. The mitigation measure would ensure the provision of adequate transit service and stops to serve the project site. (LTS)

c. Cumulative Impacts. This section describes the cumulative impacts to the City's transportation and circulation system that could result from implementation of the proposed project.

Cumulative transportation impacts associated with the proposed project were identified by comparing the results of the Cumulative Plus Project Conditions evaluation to the results of the Cumulative No Project Conditions evaluation. Cumulative No Project Conditions are defined as projected traffic operations under buildout of the City of Chico General Plan. Cumulative Plus Project Conditions are defined as projected traffic operations of the City of Chico General Plan plus any additional traffic added by the proposed project (when compared to the project site's original General Plan land use designation).

To determine the difference in trip generation between the General Plan land use designation at the project site and the proposed land use at the project site, a trip generation comparison was conducted. The results of the trip generation comparison are summarized in Table IV.J-5.

The results of the trip generation comparison indicate that the proposed project is consistent, from a trip generation standpoint, with the land uses assumed at the project site in the General Plan. Therefore, since intersection operations between Cumulative No Project and Cumulative Plus Project Conditions should be similar, the following discussion describes only Cumulative Plus Project Conditions.

(1) Cumulative Traffic Estimates. Similar to the methodology used to estimate intersection turning movement volumes under Existing with Eaton Road Extension Conditions, TMODEL Corporation provided PM peak hour traffic forecasts from the City of Chico travel demand forecasting model. The model runs were conducted by changing the General Plan land use at the project site's location to more accurately reflect the proposed project. Growth factors for each specific approach were developed by comparing the 1998 land use model run with the Eaton Road extension and the proposed project to the General Plan Buildout model run with the Eaton Road extension and the proposed project during the PM peak hour. These growth factors were refined by Fehr & Peers Associates to develop traffic forecasts for the AM, PM, and Saturday midday peak hours. After the growth factors were applied to the Existing with Eaton traffic volumes, project trips were then added.

To be consistent with other studies conducted in the City of Chico, it is assumed that General Plan Buildout conditions will occur in year 2020. The Cumulative intersection volumes are presented on Figure IV.J-8.

(2) Cumulative Intersection Levels of Service. Operations were evaluated with level of service calculations at the study intersections, and the results are summarized in Table IV.J-6. The calculation worksheets are included in Appendix B of the Transportation Impact Analysis.

The results of the level of service analysis indicate that most of the study intersections are expected to maintain acceptable LOS D or better operations during the AM, PM, and Saturday midday peak hours. The Eaton Road/Floral Avenue all-way stop-controlled intersection is expected to operate at an unacceptable level of service during the during the PM and Saturday midday peak hours. The intersection would operate at acceptable LOS D during the AM peak hour. For this intersection to operate at an acceptable level, a traffic signal would need to be installed. A traffic signal, with protected left-turn phasing on all approaches, would allow the intersection to operate at an acceptable LOS C during the AM, PM, and Saturday midday peak hours. This improvement is identified in the City of Chico's development impact fee program. Since the project applicant will contribute to the development impact fee program as a condition of building the project, the impact would be considered less-than-significant, and additional mitigation is not required.

Table IV.J-5: Trip Generation Comparison

| Use | Size | Daily | | AM Peak Hour | | | PM Peak Hour | | | Saturday/Midday Peak Hour | | | | | |
|--|--------|-------|-------|--------------|---------|----------|--------------|------|---------|---------------------------|-------|------|---------|----------|-------|
| | | Rate | Trips | Rate | Inbound | Outbound | Total | Rate | Inbound | Outbound | Total | Rate | Inbound | Outbound | Total |
| Proposed Project | | | | | | | | | | | | | | | |
| Single Family ^a | 409 | 9.26 | 3,788 | 0.72 | 74 | 222 | 296 | 0.93 | 244 | 138 | 382 | 0.91 | 202 | 172 | 373 |
| Apartments ^a | 271 | 6.49 | 1,758 | 0.51 | 22 | 116 | 138 | 0.61 | 111 | 55 | 166 | 0.52 | 76 | 65 | 141 |
| Commercial ² | 25,000 | 40.67 | 1,017 | 1.11 | 16 | 10 | 26 | 2.59 | 28 | 37 | 65 | 4.97 | 65 | 60 | 124 |
| <i>Totals</i> | | | 6,563 | | 112 | 348 | 460 | | 383 | 230 | 613 | | 343 | 297 | 640 |
| General Plan Land Use Designation | | | | | | | | | | | | | | | |
| Single Family ^a | 393 | 9.29 | 3,652 | 0.72 | 71 | 214 | 285 | 0.94 | 236 | 133 | 369 | 0.91 | 194 | 165 | 359 |
| Apartments ^a | 440 | 6.30 | 2,771 | 0.50 | 36 | 186 | 222 | 0.58 | 172 | 85 | 257 | 0.52 | 124 | 105 | 229 |
| <i>Totals</i> | | | 6,423 | | 107 | 400 | 507 | | 408 | 218 | 626 | | 318 | 270 | 588 |
| <i>Difference^c</i> | | | +140 | | +5 | -62 | -47 | | -25 | +12 | -13 | | +30 | +27 | +57 |

^a Trip generation estimates for single-family and apartment land uses based on rates and equations presented in the Institute of Transportation Engineers' (ITE) *Trip Generation* (6th Edition). ITE does not present inbound/outbound splits during the Saturday midday peak hour for apartments. Therefore, inbound/outbound splits assumed to be equivalent to single-family.

^b Trip generation estimates for commercial land use based on ITE rates. Daily and PM peak hour rates from "specialty retail" land use. AM and Saturday midday peak hour rates from "shopping center" land use.

^c Difference between the proposed project and the City of Chico General Plan land use designation.

Note: It should be noted that no mixed-use trip reductions were applied to account for internalized trips between the housing and retail land uses. This is considered a conservative approach for the purposes of this analysis.

Source: Fehr and Peers, 2003.

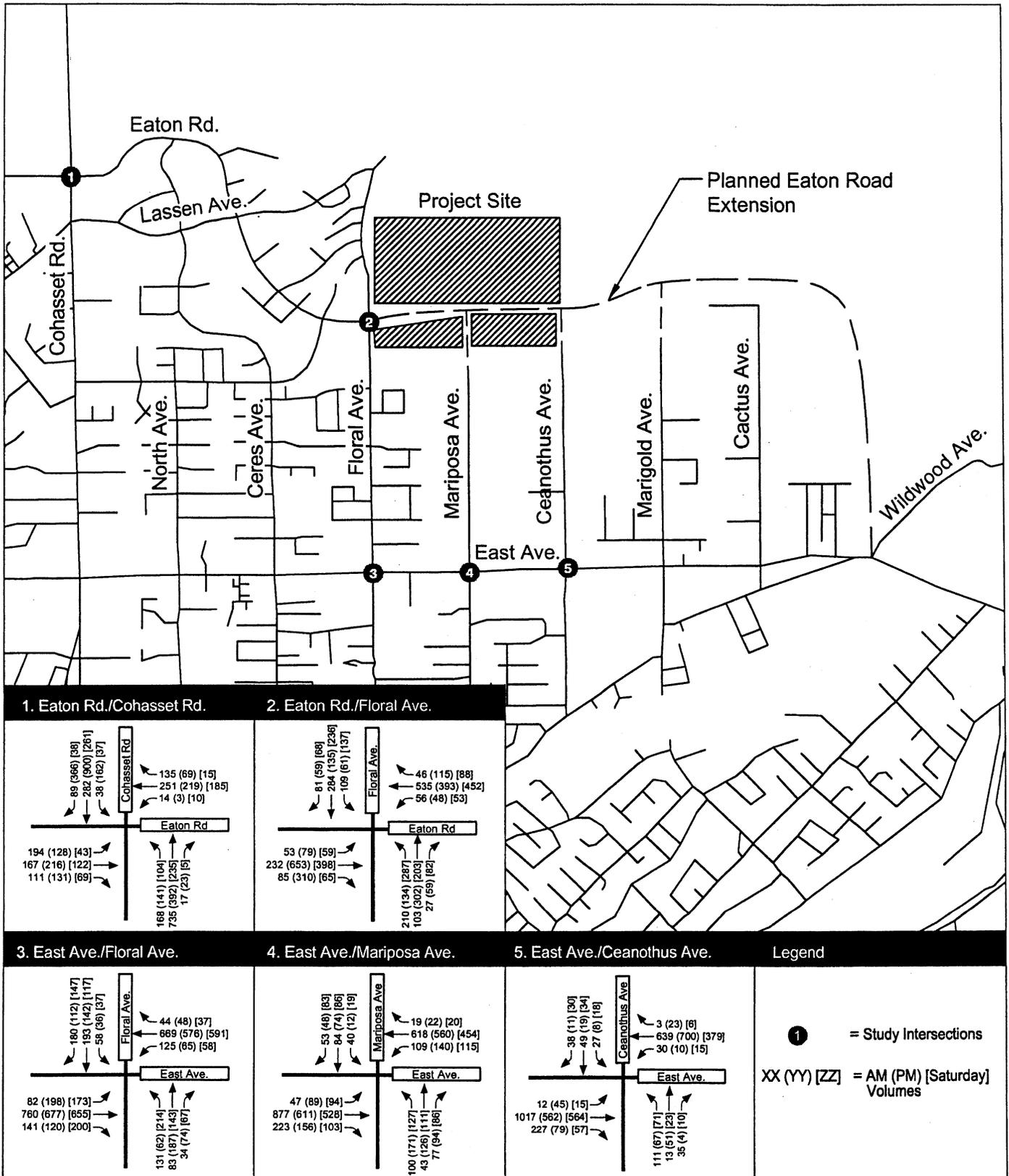


FIGURE IV.J-8

Sycamore Glen/Mountain Vista EIR
 Cumulative Peak Hour
 Intersection Volumes

SOURCE: FEHR & PEERS, 2003.

I:\CHC330\FIGURES\FIG_IVJ8.AI (06/02/04)

Table IV.J-6: Cumulative Intersection Levels of Service

| Intersection | Traffic Control | AM Peak Hour | | PM Peak Hour | | Saturday Midday Peak Hour | |
|----------------------------------|-------------------------|--------------------|------------------|--------------------|------------------|---------------------------|------------------|
| | | Delay ^a | LOS ^b | Delay ^a | LOS ^b | Delay ^a | LOS ^b |
| Eaton Road/ Cohasset Road | Signal | 24.6 | C | 26.1 | C | 17.3 | B |
| Eaton Road/ Floral Avenue | All-Way Stop-Control | 34.0 | D | 141.7 | F | 58.3 | F |
| East Avenue/ Floral Avenue | Signal | 38.3 | D | 26.8 | C | 38.7 | D |
| East Avenue/ Mariposa Avenue | Signal | 26.7 | C | 29.6 | C | 25.1 | C |
| East Avenue/ Ceanothus Avenue | Signal | 24.6 | C | 12.3 | B | 14.3 | B |

^a Intersection delay is for the average control delay and is expressed in seconds per vehicle. Analysis conducted using the methodologies in the *2000 Highway Capacity Manual*, Transportation Research Board. Delays calculated using the Synchro 5.0 software package for signalized intersections. The TRAFFIX software package was used to calculate LOS at the Eaton Road/Floral Avenue intersection.

^b LOS = Level of Service

Source: Fehr & Peers, 2004.

K. UTILITIES

1. Setting

This analysis examines the following public utilities: water supply, wastewater, storm drainage, natural gas, electricity, and telephone service.

a. Sanitary Sewer. The City of Chico's Public Works Department is responsible for the collection and transportation of sewage to the wastewater treatment plant. Wastewater and sewer treatment would be conveyed to and processed by the Chico Water Pollution Control Plant (WPCP), which provides secondary level treatment.

The Mountain Vista site is currently undeveloped and without sewer infrastructure. A 15-inch sewer line crosses the Sycamore Glen site in the planned Easton Road right-of-way. The subdivision could be adequately served by 6-inch or 8-inch sewer lines that would connect from Eaton Road's adjacent 15-inch trunk line. The existing sewer line is designed to accommodate development consistent with the densities permitted by the General Plan Land Use designations for the site, which is Low Density Residential and Medium to High Density Residential with Mixed-Use Neighborhood Core. Adjacent sewer infrastructure exists to the east, west and south of the project site.¹

The Chico Water Pollution Control Plant (WPCP) is located at Chico River Road southwest of the City. It is owned and operated by the City. The gravity-flow system consists of collection, conveyance, treatment, and disposal facilities with ultimate discharge of treated effluent into the Sacramento River, approximately 1.7 miles from the treatment plant site.

The WPCP has an existing capacity of 9 million gallons of sewage per day (mgd), and operates with current average flows of approximately 6.5 mgd. A population of 60,000 is currently served by the WPCP, with average per capita sewage generation of 107 gallons per day (gpd). An upgrade to the WPCP is planned to begin construction within five years. The upgrade will expand the plant's capacity to 12 mgd.²

b. Storm Drainage. The City of Chico and Butte County are responsible for the development, operation, and maintenance of Chico's storm sewer system. The local storm drain system adjacent to the project area collects runoff water from the street and carries it to Sycamore Creek and eventually, the Sacramento River.

c. Gas and Electricity. Facilities providing electricity and natural gas are built and maintained by the private utilities that provide these services under their franchise agreements with the State of California. New and expanded facilities are paid for from capital funds financed by fees paid by users. All of the utilities monitor the plans and growth patterns of the urban jurisdictions that they serve and, in doing so, maintain adequate backbone infrastructure to serve new development of the scale of the proposed project.

¹ Burgi, Rich, 2003. Associate Civil Engineer, City of Chico Public Works Department. Personal communication with LSA. August 25.

² Sulik, Marc, 2003. Plant Supervisor, Chico Water Pollution Control Plant. Personal communication with LSA. August 25.

Pacific Gas & Electric (PG&E) is the utility that provides electric and natural gas services to the project site. PG&E maintains both gas and electric facilities in the vicinity of the project site. All gas and electric connections would be linked to the project site from the existing utility infrastructure.

Electric and gas service is currently provided to adjacent subdivisions. PG&E maintains natural gas mains in the street right-of-way of Ceanothus Street & Floral Avenue to serve adjacent subdivisions.

An existing PG&E electrical substation is located on the southeast corner of Eaton Road and Mariposa. PG&E transmission lines carry high voltage electricity to the substation at 115 kV. Ten distribution lines carry electricity from 12 kV circuits, located within a 40-foot wide easement along the south property line. Four of these circuits are overhead and six circuits are underground. PG&E has no plans to expand this substation.

d. Telephone. The project area is located within SBC's Chico Exchange service area. Telephone service is currently provided to adjacent subdivisions.

e. Water Supply. Water is provided to the City of Chico by the California Water Service Company (CWSC). CWSC's water supply is derived exclusively from groundwater. Currently, CWSC operates approximately 70 wells and supply meets demand. CWSC drills wells to supply water as demand increases and foresees no problems in supplying water to the project. CWSC service to the project area vicinity in Northeast Chico is accomplished through pipeline distribution systems on Ceanothus and Floral Avenues. The average usage per residence is 100-200 gallons/day/residence.³

2. Impacts and Mitigation Measures

This section analyzed impacts related to public utilities that could result from implementation of the project. The section begins with criteria of significance, which establishes the thresholds to determine whether an impact is significant. The latter part of this section presents the impacts associated with the project and identifies mitigation measures, if required.

a. Criteria of Significance. Implementation of the project would have significant impacts on the City's utility systems if it would have the following effects:

- Require the extension or substantial reconstruction of major water and wastewater lines to serve new development;
- Create substantial demand for water beyond the existing or planned City's water supply, requiring additional water storage capacity;
- Require new or expanded entitlements for water supplies;
- Exceed wastewater treatment requirements of the Regional Water Quality Control Board (RWQCB);
- Generate wastewater flows that would exceed the existing or planned wastewater treatment, storage and disposal capacity of the Chico Water Pollution Control Plant (WPCP);

³ Pete Bonacich, 2003. Business Manager, CWSC. Personal communication with LSA. May 5.

- Result in a determination by the wastewater treatment provider that it has inadequate capacity to serve the project's projected demand in addition to the provider's existing commitments;
- Require or result in the construction of a new storm water or wastewater facility or expansion of existing facilities, the construction of which could cause significant environmental effects;

These criteria of less-than-significant impacts have been developed based on the *CEQA Guidelines*.

b. Less-than-Significant Impacts. Implementation of the project would result in the following less-than-significant impacts to public utilities.

(1) **Sanitary Sewer.** The project would be served by the 15-inch trunk line located in the Eaton Road right-of-way, and 6-inch or 8-inch line that would connect with the trunk line. The project would result in increased wastewater flows conveyed to the WPCP. Currently, the WPCP is operating 2.5 mgd under capacity. The plant's planned future expansion to 12 mgd would nearly double the current operating rate of 6.5 mgd. The WPCP has adequate capacity to serve the project. Impacts to wastewater treatment would be less-than- significant.

(2) **Storm Drainage.** The City of Chico has no designated storm drainage service area, although service is required of proposed development when necessary. The City is preparing an overall Storm Water Management Plan to assist with the future storm water requirements of the Federal Clean Water Act. The project is subject to the City's adopted Storm Drainage Master Plan (2000) for handling and treating storm water prior to being released off-site. Conformance with this plan will ensure that impacts are less-than-significant.

(3) **Gas and Electricity.** The project's 680 residential units and 25,000 square feet of commercial-uses would increase demand for electricity and gas. PG&E does not foresee any difficulties in providing electricity or gas to the proposed project and does not expect the need for a new electrical substation.⁴ Load analysis would be performed upon formal application by the project developers.⁵

(4) **Telephone.** Telephone service would be provided to the project site and maintained by SBC under their franchise agreements with the State of California.

(5) **Water Supply.** Once fully occupied, the proposed project would increase the demand for potable water by approximately 136,000 gpd for residential units.⁶ According to the California Water Service Company, adequate water supplies are available to meet this increase in demand. New lateral water supply lines within the site would have to be constructed and connected to the main lines. The responsibility for construction of these lines would rest with the developer of the site. Recent legislation (SB 610) requires projects greater than 500 units to demonstrate that water supply investigation reports have been completed to demonstrate capacity. As part of the Chico

⁴ Holtz, Frank, 2003. Electrical Engineer, PG&E. Personal communication with LSA. April 24.

⁵ Moore, Dave, 2003. Gas Distribution Engineer, PG&E. Personal communication with LSA. August 27.

⁶ Based on 100-200 gpd per Pete Bonacich, California Water Company, 2003.

General Plan EIR, the City and the Butte Basin Water Association prepared a groundwater study to evaluate the availability of groundwater to meet the demand projected for the buildout of the City's General Plan. The study found that "groundwater resources within the Butte Basin are entirely sufficient to support the growth in water consumption expected in Chico to the year 2012."⁷ CWSC indicated that it foresees no problems supplying water to the project. Therefore, the increased water demand required to serve the project would not result in any significant impact.

c. Significant Impacts. No significant adverse impacts related to utilities and service systems would result from the proposed project.

d. Cumulative Impacts. As shown in the above analysis, the project would add to the demand for utilities that serve the site. However, the project's contribution to the increased demand for utilities would not result in significant cumulative impacts.

⁷ City of Chico, 1997. *Chico General Plan Study Groundwater Resources Analysis*, page 1. March 15.

V. ALTERNATIVES

The *CEQA Guidelines* require the analysis of a range of reasonable alternatives to the project under evaluation, or to the location of the project, which would feasibly attain most of the project's basic objectives and avoid or substantially lessen any of the significant effects of the project. The range of alternatives required in an EIR is governed by a "rule of reason" that requires the EIR to set forth only those alternatives necessary to permit a reasoned choice.¹ CEQA states that an EIR should not consider alternatives "whose effect cannot be ascertained and whose implementation is remote and speculative."

The proposed project has been described and analyzed in the previous chapters, with an emphasis on significant impacts resulting from the project and recommended mitigation measures to avoid these impacts. The following discussion is intended to inform the public and decision makers of three potentially feasible alternatives to the proposed project. A discussion of the environmentally superior alternative is also provided.

In addition to the three alternatives that are analyzed in detail in this chapter, development of the project at another site was also considered by the City during the preparation of this EIR but was not formally evaluated in this chapter because such an off-site alternative is not warranted. As stated above, the purpose of the alternatives analysis is to evaluate a reasonable range of alternatives which would feasibly attain most of the project's basic objectives and avoid or substantially lessen any of the significant environmental effects of the project.

The project's objectives call for development of the site at densities consistent with the General Plan; preservation of a significant amount of open space to maximize the value to all biological resources; provision of a neighborhood-oriented commercial area; and provision of a significant number of multi-family residential units to help meet the City's projected needs for moderately-priced rental housing. While an alternative location could potentially meet some of these objectives, the project site is one of the largest undeveloped sites within the City limits that is designated for single-family and multi-family housing in the General Plan. Further, the 178-acre site is surrounded by existing and planned development on three sides, making it a logical site for in-fill development. Preservation of the entire site to avoid impacts to biological resources would place pressures on growth elsewhere in the City. Further, it can be expected that the biological resources on the site would continue to be degraded by unauthorized off-road vehicle use and other activities if the project were not implemented (see the No Project/No Build alternative below). According to the City's recent *Growth Area Feasibility Study*,² the City is reaching the limits of its developable areas and is considering new growth areas on the western edge of the urban area which could be annexed and planned for further development. Development of the project, as proposed, would provide up to 679

¹ *CEQA Guidelines*, 1998, § 15126.6.

² City of Chico, 2004. *Growth Area Feasibility Study*, Memorandum to City Council. January 20.

new housing units, which is approximately equivalent to one year of the City's annual demand for new housing. Precluding development on this site would shift this demand elsewhere.

The project's significant unavoidable adverse impacts are air quality impacts resulting from construction, vehicle emissions, and the cumulative contribution to air quality impacts. Development of the project on any site would result in similar air quality impacts, unless the area being disturbed by construction and the density of the project were substantially reduced. Other environmental topics with identified project impacts include biological resources, cultural resources, noise, and transportation and circulation. These impacts would be reduced to less-than-significant levels through the incorporation of recommended mitigation measures. Development of an off-site location could potentially avoid impacts to biological resources and cultural resources found on the project site, but some noise and transportation impacts would result with nearly any development project.

For these reasons, a detailed evaluation of off-site locations is not warranted, and this analysis focuses on the evaluation of on-site alternatives to the proposed project.

The three alternatives to the proposed project that are evaluated in this chapter include the following:

- The CEQA-required **No Project/No Build alternative**, which assumes that the proposed project would not be built, and the property would remain in its existing state.
- The **No Project/General Plan alternative**, which assumes that more multi-family housing units would be built within the Mountain Vista subdivision, and that only single-family homes would be built within the Sycamore Glen subdivision, as permitted by the existing General Plan and zoning designations. A small commercial site would also be included. This alternative would permit a greater number of units than are proposed by the project.
- A **Biological Resources alternative**, which assumes that the majority of the site would be preserved as open space to minimize impacts to the wetlands and other sensitive biological resources on the project site. The alternative would include a small commercial site. The project would be developed primarily with multi-family residential uses along Eaton Road, and a small number of single-family units would be built at the northwest corner of the site.

These alternatives were chosen to provide a reasonable range of alternatives to compare to the proposed project and its impacts. Due to the significance of the biological resources on the site, the Biological Resources alternative was conceived in cooperation with LSA's biological resources staff. Following is a discussion of each alternative, and an analysis of the anticipated environmental impacts of each alternative. The emphasis of the analysis is on comparison of the anticipated impacts of each alternative to the impacts associated with the proposed project. The discussion includes a determination as to whether or not each alternative would reduce, eliminate, or create new significant impacts.

A. NO PROJECT/NO BUILD ALTERNATIVE

1. Principal Characteristics

The No Project/No Build alternative assumes that the project would not be built and the property would remain in its existing state. Under this alternative the wetlands/vernal pool habitat would

remain on-site; however, it is expected that the site would continue to be degraded by off-road vehicle use, and the planned Eaton Road Extension project would eventually be constructed, extending the roadway through the southern portion of the site.

2. Analysis of the No Project/No Build Alternative

a. **Aesthetics.** This alternative would not result in any significant impacts. Leaving the site in its undeveloped state, existing vistas of the site from surrounding properties would remain undisturbed, permitting views to the distant horizon. Further, views to the north from the intersection of Lassen Avenue and Floral Avenue would remain open, permitting drivers and the general public a greater vista to Sycamore Creek and the open space preserve to the north. Therefore, impacts would be less than the project.

b. **Air Quality.** This alternative would not result in any air quality impacts, so the significant air quality impacts of the project resulting from construction of the project, and operation of vehicles and other sources associated with operation of the development would be avoided. Therefore, impacts would be less than the proposed project.

c. **Biological Resources.** This alternative would avoid project-related impacts to the wetlands and other sensitive biological resources on the site. However, the site would continue to be subject to impacts from off-road vehicles, illegal dumping and other activities associated with urban encroachment, because a portion of the site would not be a protected open space preserve. Further, the vernal pools and other sensitive biological habitat would not be restored, as is proposed for the northern portion of the site that would be within the open space preserve. Nevertheless, because the resource agencies (CDFG, USFWS, Corps, RWQCB) prefer preservation of on-site resources to impacts and mitigation, this alternative is assumed to have fewer biological impacts than the proposed project.

d. **Cultural Resources.** This alternative would not have the potential to impact archaeological resources because no development would occur. Therefore, impacts would be less than the proposed project.

e. **Hazards and Hazardous Materials.** There would be no hazards or hazardous materials impacts resulting from this alternative, similar to the project.

f. **Hydrology.** This alternative would not result in disturbance of the site as proposed by the project, so there would be no hydrology impacts. Therefore, impacts would be less than the proposed project.

g. **Land Use.** This alternative would leave the site undeveloped, but new development would continue to occur to the south and east, and the site would be affected by the increasing population in the area. It can be expected that the site would continue to be degraded by unauthorized activities. Because the General Plan calls for the eventual development of the site for housing and commercial use, this alternative would not implement the City's General Plan and adopted Housing Element. It would also not implement any of the project objectives.

- h. Noise.** This alternative would not have any noise generating uses, therefore impacts would be less than the proposed project.
- i. Public Services.** Because this alternative would not result in development of the site, public service impacts would be less than the project.
- j. Transportation and Circulation.** Because this alternative would not result in development of the site, traffic impacts would be less than the project.
- k. Utilities.** Because this alternative would not result in development of the site, utility impacts would be less than the project.

B. NO PROJECT/GENERAL PLAN ALTERNATIVE

1. Principal Characteristics

This alternative assumes that the project would be developed consistent with the existing General Plan designations, so there would be no General Plan Amendment to allow multi-family development on the Sycamore Glen site. As such, the eastern portion of the site would be developed with 234 single-family homes, within the same development area as the proposed project. The Mountain Vista site would be developed consistent with a 396 multi-family residential units (density of 18 du/ac) and 168 single-family homes (density of 6 du/ac). Similar to the proposed project, a 2-acre neighborhood commercial site would be included at the northeast corner of Floral Avenue and Eaton Road. Two areas of open space would be preserved within the Mountain Vista site along Sycamore Creek, and in the central portion of the site, dividing the single-family and multi-family areas. Table V-1 includes a land use summary of the alternative. In total, this alternative would have 798 dwelling units. Approximately the same amount of open space would be preserved as the proposed project. In addition, it is assumed that this alternative would also result in some off-site preservation of habitat to mitigate for impacts to resources on-site. The land use plan for this alternative is exhibited in Figure V-1.

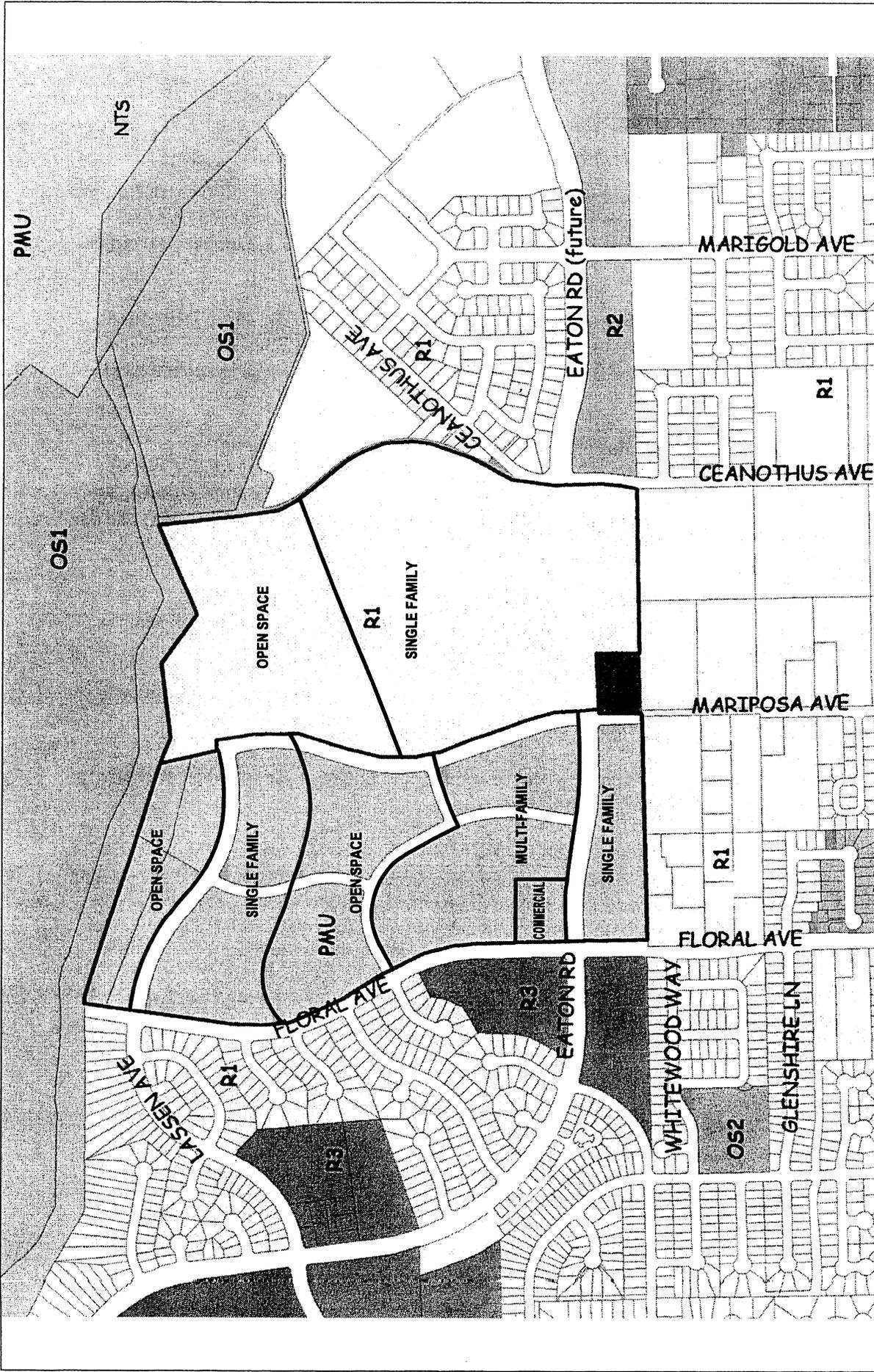
Table V-1: Land Use Summary – No Project/General Plan Alternative

| Use | # Units (Sq.Ft.) | Area (Acres) |
|-----------------------------------|---------------------|------------------------|
| Mountain Vista Subdivision | | |
| Single-Family Residential | 168 | 28 |
| Multi-Family Residential | 396 | 22 |
| Commercial | 25,000 ^a | 2 |
| Open Space & Stormwater Treatment | | 19 |
| Streets | | 19 |
| <i>Mountain Vista Subtotal</i> | <i>564</i> | <i>90</i> |
| Sycamore Glen Subdivision | | |
| Single-Family Residential | 234 | 40 |
| Multi-Family Residential | 0 | 0 |
| Open Space & Stormwater Treatment | | 31 |
| Streets | | 17 |
| <i>Sycamore Glen Subtotal</i> | <i>234</i> | <i>88</i> |
| Grand Total | 798 | 178^b |

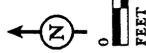
^a Estimate. 25,000 is the estimated amount of commercial floor area that is likely to be built on the 2-acre commercial site.

^b Includes right-of-way for Eaton Road project.

Source: LSA Associates, Inc., 2004.



LSA



SOURCE: CITY OF CHICO ZONING MAP, 2003.

F:\CHC330 SYCAMORE GLEN\FIGURES\FIG_III2.AI (09/02/04)

FIGURE V-1

Sycamore Glen/Mountain Vista EIR
No Project/General Plan Alternative

2. Analysis of the No Project/General Plan Alternative

- a. **Aesthetics.** Like the proposed project, this alternative would preserve a significant amount of open space on-site, allowing views from Floral Avenue through the open space to vistas beyond Sycamore Creek. Because the alternative would result in development of the site, impacts would be similar to the proposed project.
- b. **Air Quality.** Because this alternative would result in development of the site, construction impacts would be similar to the proposed project. Operational emissions from vehicle traffic and other sources would be greater than the proposed project (due to the greater number of units), and would therefore not avoid the project's significant air quality impacts.
- c. **Biological Resources.** While this alternative would preserve a similar amount of open space as the proposed project, it would break up the open space preserve within the Mountain Vista subdivision, reducing the connectivity of the habitat, and making it less valuable for biological resources. Therefore, this alternative would have greater impacts to biological resources. However, like the project, it is assumed that such impacts could be mitigated to less-than-significant levels through on-site and off-site mitigation.
- d. **Cultural Resources.** Like the project, this alternative could potentially impact archaeological resources. Therefore, impacts are considered similar to the proposed project.
- e. **Hazards and Hazardous Materials.** Because this alternative would result in development of the site, this alternative would have similar impacts as the proposed project.
- f. **Hydrology.** Because this alternative would result in development of the site, this alternative would have similar impacts as the proposed project.
- g. **Land Use.** This alternative would avoid the need for a General Plan Amendment, but it would concentrate all of the project's multi-family housing in the Mountain Vista portion of the site, around the proposed neighborhood commercial site. Due to the mix of open space and housing within the proposed Mountain Vista subdivision, this alternative may not meet the General Plan's Continuity and Connection policies as well as the proposed project. This alternative would provide a greater number of multi-family units, which may be seen as more consistent with the General Plan for Mountain Vista portion. Because this alternative is consistent with the General Plan land use designations and it would provide more multi-family housing, it would have fewer land use impacts than the proposed project.
- h. **Noise.** Because this alternative would result in 119 more dwelling units than the proposed project, the construction period would probably be longer than the proposed project, and the associated construction noise would last longer. In addition, this alternative would generate more traffic than the proposed project so traffic noise levels would be greater. Therefore, impacts would be greater than the proposed project.
- i. **Public Services.** Because this alternative would result in 119 more dwelling units than the proposed project, the alternative would have greater impacts on public services.

j. Transportation and Circulation. Because this alternative would result in 119 more dwelling units than the proposed project, a greater amount of traffic would result. This alternative would result in approximately 7,253 average daily trips (ADT), 690 ADT more than the proposed project. As such, traffic impacts would be greater than the proposed project.

k. Utilities. Because this alternative would result in 119 more dwelling units than the proposed project, the alternative would have greater impacts on utilities.

C. BIOLOGICAL RESOURCES ALTERNATIVE

1. Principal Characteristics

This alternative assumes that the majority of the site would be preserved as open space to minimize impacts to the wetlands and other sensitive biological resources on the project site. The development area has been delineated to minimize impacts the majority of the vernal pool and swale system, especially in those areas where special status species have been identified (see Figure V-2). To offset the cost of preserving and restoring habitat on three-quarters of the site, and to provide needed housing in the City, while still trying to fulfill property owners objectives for the project, 506 units of high density multi-family housing would be built along the Eaton Road corridor, and a neighborhood commercial site would be built at the corner of Eaton Road and Floral Avenue. In addition, 50 single-family homes would be built at the northwest corner of the site. Due to the amount of on-site preservation and restoration, it is assumed that off-site mitigation would not be required for this alternative. A land use summary of the alternative is provided in Table V-2.

2. Analysis of the Biological Resources Alternative

a. Aesthetics. This alternative would result in a substantial amount of housing, primarily on the southern portion of the site. However, because this alternative would preserve large amounts of the site permit substantial view corridors of the open space preserve from both Eaton Road and Floral Avenue, aesthetic impacts would be considered less than the proposed project.

b. Air Quality. While this alternative would reduce the amount of area to be disturbed by development, construction emissions are still expected to be significant. Also, operational emissions from

Table V-2: Land Use Summary – Biological Resources Alternative

| Use | # Units (Sq.Ft.) | Area (Acres) |
|-----------------------------------|---------------------|------------------------|
| Mountain Vista Subdivision | | |
| Single-Family Residential | 50 | 8 |
| Multi-Family Residential | 290 | 13 |
| Commercial | 25,000 ^a | 2 |
| Open Space & Stormwater Treatment | | 61 |
| Streets | | 6 |
| <i>Mountain Vista Subtotal</i> | <i>340</i> | <i>90</i> |
| Sycamore Glen Subdivision | | |
| Single-Family Residential | 0 | 0 |
| Multi-Family Residential | 216 ^b | 10 |
| Open Space & Stormwater Treatment | | 75 |
| Streets | | 3 |
| <i>Sycamore Glen Subtotal</i> | <i>216</i> | <i>88</i> |
| Grand Total | 556 | 178^b |

^a Estimate. 25,000 is the estimated amount of commercial floor area that is likely to be built on the 2-acre commercial site.

^b Multi-family units assume full buildout at the maximum densities permitted by the district (22 du/ac).

^c Includes right-of-way for Eaton Road project.

Source: LSA Associates, Inc., 2004.

vehicles and other sources are not expected to be significantly reduced. Therefore, air quality impacts would still probably be significant.

c. Biological Resources. This alternative would avoid impacts to most of the vernal pools on the project site, and many of the pools and swales identified as providing habitat for special status species would be preserved. Much of the site would be left open to provide nesting and foraging habitat for raptors and other wildlife. Therefore, this alternative is considered to have fewer biological impacts than the proposed project.

d. Cultural Resources. This alternative would avoid the potential for impacts to archaeological resources in the preserve area, but could still potentially impact archaeological resources in the proposed development area. Therefore, impacts would be less than the proposed project.

e. Hazards and Hazardous Materials. Because this alternative would result in development of the site, this alternative would have similar impacts as the proposed project.

f. Hydrology. Because this alternative would minimize impacts to vernal pools and swales, and would concentrate much of the development along Eaton Road, impacts would be less than the proposed project.

g. Land Use. This alternative would result in single-family and multi-family residential uses, along with a neighborhood commercial center as permitted by the General Plan. Also, the plan is sensitive to biological resources on the site, as contemplated by the Resource Management overlay zone. However, because the site is one of the largest undeveloped areas within the northeast area of the City, and it is surrounded by existing development, preservation of the majority of the site as open space, and development of only 50 single-family units (in addition to 506 multi-family units), it may not be the highest and best use of the site, and may not fully implement the City's Housing Element as the City's General Plan Housing Element assumed development of 50 percent of the site. In addition, development at high density multi-family units at the maximum of 22 dwelling units per acre may present a conflict with lower density development in the vicinity. As such, this alternative may have greater land use impacts than the proposed project.

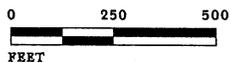
h. Noise. Because this alternative would result in 123 fewer dwelling units than the proposed project, the construction period would probably be shorter than the proposed project, and the associated construction noise would be less. In addition, this alternative would generate substantially less traffic than the proposed project so traffic noise levels would be less. Therefore, noise impacts would be less than the proposed project.

i. Public Services. Because this alternative would result in 123 fewer dwelling units than the proposed project, the alternative would have fewer impacts on public services.

j. Transportation and Circulation. Because this alternative would result in 123 fewer dwelling units than the proposed project, and because the majority of the units would be multi-family units which have a lower trip generation rate, the alternative is estimated to generate a total of 4,732 ADT, 1,830 ADT fewer trips than the proposed project. Therefore, traffic impacts would be less than the proposed project.



LSA



Project Site Boundary

Waters of the U.S.

Vernal Pool

Vernal Swale

Intermittent Drainage (CDFG Waters)

Approximate Limits of Eaton Road Extension (Area 3) Direct Impact Area

Development Area

Special Status Species

FS Vernal Pool Fairy Shrimp

TS Vernal Pool Tadpole Shrimp

CL California Linderiella

WST Western Spadefoot Toad

Note: Approximate Limits of Eaton Road Extension Impact Areas Referenced From Eaton Road Extension Draft Environmental Impact Report, SCH# 2002092053, dated March 2004

FIGURE V-2

*Sycamore Glen/
Mountain Vista EIR*
Biological Resources
Alternative

SOURCE: USGS ORTHORECTIFIED PHOTOQUAD, 1998.

I:\CHC330 sycamore glen\figures\Fig_V2.ai (08/20/04)

k. Utilities. Because this alternative would result in 123 fewer dwelling units than the proposed project, the alternative would have fewer impacts on utilities.

D. ENVIRONMENTALLY SUPERIOR ALTERNATIVE

Of the three alternatives analyzed above, only the No Project/No Build alternative would avoid the significant air quality impacts of the project. This is because no air quality impacts from construction or long-term operational air quality impacts would result. However this alternative would not meet any of the project objectives. Both the No Project/General Plan alternative, and the Biological Resources alternative would meet the project objectives. Of these two alternatives that would result in development of the site, the Biological Resources alternative would be considered the environmentally superior alternative, because it would have fewer impacts than the proposed project, primarily due to the fewer number of units that would be built. In addition, it would result in fewer impacts to biological resources.

VI. CEQA-REQUIRED ASSESSMENT CONCLUSIONS

As required by CEQA, this chapter discusses the following types of impacts that could result from implementation of the proposed project: cumulative impacts; growth-inducing impacts; significant unavoidable impacts; significant irreversible changes; and effects found not to be significant.

A. CUMULATIVE IMPACTS

CEQA defines cumulative impacts as “two or more individual effects, which, when considered together, are considerable, or which can compound or increase other environmental impacts.” Section 15130 of the *CEQA Guidelines* requires that an EIR evaluate potential environmental impacts that are individually limited, but cumulatively significant. These impacts can result from the proposed project alone, or together with other projects. The *CEQA Guidelines* state: “The cumulative impact from several projects is the change in the environment which results from the incremental impact of the project when added to other closely related past, present, and reasonably foreseeable probable future projects.” Cumulative impacts can result from individually minor, but collectively significant projects taking place over a period of time.¹

1. Methodology

This cumulative analysis considers growth projected by the City of Chico General Plan. In addition, the cumulative analysis takes into consideration the approved or contemplated projects that have been identified on the City’s Residential and Commercial Development Activity Reports, updated on June 9, 2004, which identify proposed projects totaling over 700 dwelling units in the northeast Chico area, in addition to development planned elsewhere in the City. The Foothill Park East development, occurring immediately east of the project, accounts for a substantial amount of the cumulative development approved for the region. In addition, the Eaton Road Extension Project, as described in Chapter III, is slated to begin construction in 2005/2006, and should be completed in 2010. This road project would facilitate development of the northeast Chico area. These projects are all consistent with General Plan Land Use Element and Transportation/Circulation Element. The cumulative impact assessment for each of the environmental topics analyzed in this EIR are areas are discussed within Chapter IV, Setting, Impacts and Mitigation Measures.

One significant adverse cumulative impact is identified in Chapter IV:

a. Air Quality. Construction and operation of the project would exacerbate nonattainment of air quality standards for PM10 and ozone within the air basin and contribute to cumulative air quality impacts.

No other significant adverse cumulative impacts are identified for the project.

¹ *CEQA Guidelines*, 2003, Section 15355.

B. GROWTH-INDUCING IMPACTS

A project is considered growth-inducing if it would directly or indirectly foster economic or population growth or the construction of additional housing². Examples of projects likely to have significant growth-inducing impacts include extensions or expansions of infrastructure systems beyond what is needed to serve project-specific demand, and development of new residential subdivisions or industrial parks in areas that are currently only sparsely developed or are undeveloped.

The proposed project would increase the number of housing units within the City of Chico, thereby increasing the population of the City. However, the project is an in-fill development in an area planned for residential growth in the City's General Plan to meet the housing needs for the City. Because the site is an in-fill project, substantially surrounded by existing development, public service and utility infrastructure is available adjacent to the project site. Therefore, the project is not considered growth-inducing.

C. SIGNIFICANT UNAVOIDABLE IMPACTS

The project would result in the following significant adverse air quality impacts:

- Demolition and construction period activities would generate significant dust, exhaust, and organic emissions.
- Development of the proposed project would result in increased regional emissions of criteria air pollutants exceeding BCAQMD Thresholds for two ozone precursors, NO_x and ROG.
- Construction and operation of the project would exacerbate nonattainment of air quality standards for PM₁₀ and ozone within the air basin and contribute to cumulative air quality impacts.

D. SIGNIFICANT IRREVERSIBLE CHANGES

An EIR must identify any significant irreversible environmental changes that could result from implementation of a proposed project. These may include current or future uses of non-renewable resources, and secondary or growth-inducing impacts that commit future generations to similar uses. CEQA dictates that irretrievable commitments of resources should be evaluated to assure that such current consumption is justified.³ The *CEQA Guidelines* describe three distinct categories of significant irreversible changes: 1) changes in land use which would commit future generations; 2) irreversible changes from environmental actions; and 3) consumption of non-renewable resources.

1. Changes in Land Use Which Would Commit Future Generations

The proposed project would construct up to 679 single-family and multi-family homes and up to 25,000 square feet of commercial space on currently undeveloped land. Developing the project would commit future generations to providing public services and resources to serve the development

² *CEQA Guidelines*, 2003, Section 15126.2(d).

³ *CEQA Guidelines*, 2003. § 15126.2(c).

proposed by the project. Because the proposed project is within the planned urban area of the City of Chico the project would not commit future generations to a significant change in planned land use of the site.

2. Irreversible Changes from Environmental Accidents

Implementation of the proposed project would result in the development homes and a small commercial center. No significant irreversible environmental damage, such as an accidental spill or explosion of hazardous materials, is anticipated due to implementation of the proposed project. Compliance with federal, State and local regulations would reduce the possibility that hazardous substances within the project site would cause significant environmental damage to a less-than-significant level.

3. Consumption of Nonrenewable Resources

Consumption of nonrenewable resources includes conversion of agricultural lands, loss of access to mining reserves, and use of non-renewable energy sources. The project site is not under a Williamson Act Contract, and the State of California Department of Conservation's Farmland Mapping and Monitoring Program (FMMP) does not consider the project site prime farmland, farmland of statewide importance, or unique farmland. The project site does not contain known mineral resources and does not serve as a mining reserve.

Construction of the proposed project would require the use of energy, including energy produced from non-renewable resources. Energy consumption would also occur during the operational period of the proposed project, but compliance with current building codes would ensure that the proposed construction is energy efficient.

E. EFFECTS FOUND NOT TO BE SIGNIFICANT

Based on visits to the project site, and a review of the Chico General Plan and General Plan EIR and other available documentation, it was determined that the proposed project would not result in significant impacts related to the following topics:

1. Agricultural Resources

No agricultural uses or farmland are present within or adjacent to the project site, and the site is not designated as prime farm land, as a result, the site has never been cultivated and is not considered a significant agricultural resource. The site is designated for residential development in the City General Plan for which an EIR was certified in 1994.

2. Geology and Soils

There are no faults in the vicinity of the project site, and the soils of the site are not subject to liquefaction. While the site will be subject to strong seismic shaking during earthquakes on nearby faults, construction would meet building code requirements for the region and would reduce the risk from seismic events to a less than significant level.

3. Mineral Resources

There are no known mineral resources on the project site.

4. Population and Housing

The project would add to the City's housing stock and increase the City's population. Because development of the site is contemplated in the City's General Plan, the project would not result in any significant population or housing impacts.

5. Recreation

The project site would preserve 56 acres of open space on-site and would extend the Sycamore Creek bicycle path along its perimeter. The project would also contribute development fees for the development and maintenance of additional recreational space within the City. No significant recreational impacts would result from the project.

VII. REPORT PREPARATION

A. REPORT PREPARERS

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C. REFERENCES

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D. CONTACTS

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Butte County Public Works
Steven Rodowick, Recycling Coordinator
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California Regional Water Quality Control Board, Central Valley Region, Scott A. Zaitz, R.E.H.S.,
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California Water Service Company, Pete Bonacich, Business Manager

Chico Fire Department, Steve Brown, Fire Chief

Chico Police Department, Laura Smith, Records Clerk

Chico Unified School District, Michael Weissenborn, Manager, Facilities Planning

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Pacific Gas and Electric
Frank Holtz, Electrical Engineer
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State of California, Governor's Office of Planning and Research, State Clearinghouse, Philip
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FINAL
ENVIRONMENTAL IMPACT REPORT
**MOUNTAIN VISTA/SYCAMORE GLEN
SUBDIVISION**

(S 00-11 AND S 01-12)

VOLUME III: RESPONSE TO COMMENTS DOCUMENT

STATE CLEARINGHOUSE NO. 2003042068

Submitted to:

Patrick Murphy, Senior Planner
Bob Summerville, AICP, Associate Planner
Community Development Department
City of Chico
411 Main Street
Chico, California 95927

Prepared by:

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LSA Project No. CHC330

LSA

December 2005

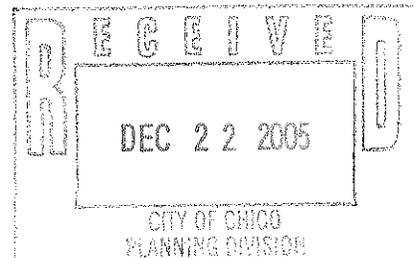


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DOCUMENT ORGANIZATION

This Response to Comments Document and Final EIR consists of the following chapters:

- *Chapter I: Introduction.* This chapter discusses the purpose and organization of this RTC Document and the Final EIR and summarizes the environmental review process for the project.
- *Chapter II: List of Commenting Agencies, Organizations and Individuals.* This chapter contains a list of agencies, organizations, and persons who submitted written comments during the public review period as well as those who spoke at the Planning Commission public hearing on the Draft EIR.
- *Chapter III: Comments and Responses.* This chapter contains reproductions of all comment letters received on the Draft EIR as well as a summary of the comments made at the Planning Commission public hearing. A written response for each comment received during the public review period is provided. Each response is keyed to the preceding comment.
- *Chapter IV: Draft EIR Revisions.* Corrections to the Draft EIR necessary in light of the comments received and responses provided, or necessary to amplify or clarify material in the Draft EIR, are contained in this chapter. Text in underline represents language that has been added to the EIR; text with ~~strikeout~~ has been deleted from the EIR.

I. INTRODUCTION

A. PURPOSE OF THE RESPONSE TO COMMENTS DOCUMENT

This document has been prepared to respond to comments received on the Draft Environmental Impact Report (Draft EIR) prepared for the Mountain Vista / Sycamore Glen Subdivisions (SCH# 2003042068) and, as necessary, to augment the information contained within the Draft EIR. The Draft EIR identifies the likely environmental consequences associated with the implementation of the proposed project, and recommends mitigation measures to reduce potentially significant impacts. This Response to Comment (RTC) Document provides responses to comments on the Draft EIR and makes revisions to the Draft EIR, as necessary, in response to these comments or to amplify and clarify material in the Draft EIR. This RTC Document, together with the Draft EIR (Volumes I and II), constitutes the Final EIR for the proposed project.

B. ENVIRONMENTAL REVIEW PROCESS

According to CEQA, lead agencies are required to consult with public agencies having jurisdiction over a proposed project and to provide the general public with an opportunity to comment on the Draft EIR. The following is a brief summary of the environmental review process.

On April 8, 2003 the City published a Notice of Preparation (NOP) that included a list of potential environmental effects that could result from the proposed project. The NOP was distributed to local, regional, and State agencies.

Additionally, a public scoping session was held on May 8, 2003. The written comments received in response to the NOP and comments presented at the public scoping meeting were taken into account during the preparation of the Draft EIR. The NOP, written comments received on the NOP, and summary of verbal comments received at the scoping meeting are included in the Draft EIR, Volume II, Appendix A.

The Draft EIR for the Mountain Vista / Sycamore Glen Subdivisions project was made available for public review from December 15, 2004 to February 7, 2005. While the CEQA requires a minimum 45-day review period, the review period was extended to 54 days in this case because it occurred during the Christmas and New Year holiday period.

The Notice of Availability (NOA) of the Draft EIR was advertised in the Enterprise-Record newspaper, and copies of the NOA were mailed to surrounding property owners and occupants within a 900-foot radius of the project site. Copies of the Draft EIR were also distributed to State, local, and regional agencies.

Copies of all written comments received regarding the Draft EIR during the comment period are contained in Chapter III of this document.

II. LIST OF COMMENTING AGENCIES, ORGANIZATIONS AND INDIVIDUALS

The chapter presents a list of letters received during the public review period and describes the organization of the letters and comments that are included in Chapter III, Comments and Responses, of this document.

A. ORGANIZATION OF COMMENT LETTERS AND RESPONSES

Chapter III includes a reproduction of each letter received on the Draft EIR. The written comments are grouped by the affiliation of the commentor, as follows: State, local and regional agencies and utilities (A); organizations (B); and individuals (C). A summary of comments made at the February 3, 2005 Planning Commission hearing is also included following the written comment letter responses, followed by written responses to the verbal comments (D).

The comment letters are numbered consecutively following the A, B, C, and D designations. The letters are annotated in the margin according to the following code:

| | |
|---|------|
| State, Regional and Local Agencies and Utilities: | A1-# |
| Organizations: | B1-# |
| Individuals: | C1-# |
| Summary of Comments from February 3, 2005 Meeting | D1-# |

The letters are numbered and comments within that letter are numbered consecutively after the hyphen.

B. LIST OF AGENCIES, ORGANIZATIONS, AND INDIVIDUALS COMMENTING ON THE DRAFT EIR

The following comment letters were submitted to the City during the public review period.

| State, Regional and Local Agencies and Utilities | | Letter Date |
|--|---|------------------|
| A1 | State Department of Transportation- District 3 | February 7, 2005 |
| A2 | State Department of Transportation- Division of Aeronautics | January 19, 2005 |
| A3 | State Department of Health Services | February 7, 2005 |
| A4 | Butte County Association of Governments | January 12, 2005 |
| A5 | Butte County Air Quality Management District | January 24, 2005 |
| A6 | Butte County Department of Public Works | January 4, 2005 |
| A7 | Pacific Gas and Electric Company | January 23, 2004 |
| A8 | State Clearinghouse | February 8, 2005 |

Organizations

B1 Butte Environmental Council February 7, 2005

Individuals

C1 John Merz February 7, 2005

February 3, 2005 Planning Commission Hearing

A summary of comments from the public and the Planning Commission, is included following the written comments and responses listed above. Responses are provided to the comments presented at the meeting, consistent with the method of responding to written comments.

D1 Public Hearing Comments February 3, 2005

III. COMMENTS AND RESPONSES

Written responses to each written comment received on the Draft EIR are provided in this chapter. All letters received during the public review period on the Draft EIR are provided in their entirety. Each written comment is immediately followed by responses keyed to the written comments. The letters are grouped by affiliation of the commenting entity as follows: State, regional, and local agencies and utilities (A); organizations (B); and individuals (C). Verbal comments received during the Planning Commission public hearing on February 3, 2005 are summarized following the written comments and responses. Written responses to the summary of public testimony are also provided (D).

A. STATE, REGIONAL AND LOCAL AGENCIES AND UTILITIES

DEPARTMENT OF TRANSPORTATION
DISTRICT 3
703 B STREET
P. O. BOX 911
MARYSVILLE, CA 95901-0911
PHONE (530) 741-4025
FAX (530) 741-5346
TTY (530) 741-4509



*Flex your power!
Be energy efficient!*

February 7, 2005

04BUT0138
03-BUT-099, P.M. 36.305
Mountain Vista and Sycamore Glen
DEIR, SCH # 2003042068

Mr. Bob Summerville, Associate Planner
City of Chico
Community Development Department
Planning Division
411 Main Street
Chico, CA 95927

Dear Mr. Summerville:

Thank you for the opportunity to review and provide comments on the draft environmental impact report (DEIR) for the proposed tentative subdivision map, general plan amendment, and zone change applications (project) to permit development of 409 single-family residential lots, 270 multi-family residential dwelling units, and 25,000 square feet of commercial development on property located east of State Route (SR) 99 along Eaton Road in Chico. Our comments on the DEIR are as follows:

Summary of Comments:

- While we did not formally respond to the original Notice of Preparation as to the scope of the DEIR, we believe that there is substantial evidence that the project may cause significant project specific and cumulative impacts to the State Highway System (SHS). We request that the DEIR be revised to analyze the impacts to the SHS and identify mitigation measures identified that will reduce the impacts to a *Less Than Significant* level.

Section IV.J. Transportation and Circulation Comments:

- Pages 143 & 144, Section IV. J.I.a. and d.: State highway facilities were not included in the existing roadway network that will provide access to the project. In addition, the nearby state highway interchanges were not included in the intersections that were subject to a detailed Level of Service (LOS) analysis. It seems reasonable that the addition of 679 dwelling units and 25,000 square feet of retail commercial development within two to three miles from two State highways may cause project specific and cumulative traffic impacts to the SR 32 and SR 99 mainlines, the SR 32/Bruce Road intersection, the SR 99/Eaton Road Interchange (IC), the SR 99/East Avenue IC, the SR 99/Cohasset Road IC, the SR 99/East First Avenue IC, the SR 32/SR99 IC, and the SR 99/Skyway IC. Without being included in the analysis, potential impacts to the SHS were not identified and mitigated. It should be acknowledged

"Caltrans improve mobility across California"

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Mr. Bob Summerville
February 7, 2005
Page 2

that access to the project site will also extend from the above listed SHS mainlines, intersections, and interchanges. Please revise or justify why the SHS was not included in the LOS analysis for a project as defined by Section 15206 of the California Code of Regulations (CCR) and Section 21092.4 of the Public Resources Code (PRC) of statewide, regional, or area wide significance.

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cont.

- The project will cause significant traffic impacts at and adjacent to the SR 99/Cohasset Road IC that will need to be analyzed and mitigated. This conclusion is supported by the following evidence:
 - Page 155, Table IV.J-3: The Trip Generation Estimates indicates the project will generate 383 inbound vehicle trips and 230 outbound trips in the PM peak hour. Figure IV.J-5 on page 157 indicates that 25 percent of these trips will utilize Cohasset Road south of East Avenue. This means approximately 154 additional trips will be added to the existing traffic volumes on Cohasset Road south of East Avenue. Approximately 96 trips will be northbound and 58 trips will be southbound.
 - East Avenue is approximately .45 miles from the SR 99/Cohasset IC Overcrossing. The Pillsbury Road/Cohasset Road intersection lies between East Avenue and the interchange. The end of the taper for the northbound SR 99 off ramp is only about 175 feet from the stop bar at the northbound Cohasset approach at Pillsbury Road. This approach regularly backs-up during the PM peak hour. This back up causes queues on the off ramp, which makes merging difficult.
 - It safe to assume that at least 80 of the 96 additional northbound Cohasset trips generated by the project will utilize the northbound approach at Pillsbury Road. And at least 50 trips will be added to the southbound bound approach at Pillsbury.
 - The State conducted PM peak hour traffic counts in 2002 at the Pillsbury/Cohasset Road intersection. In 2002 there were approximately 1534 northbound and 1107 southbound vehicles on Cohasset at Pillsbury Road during the PM peak. Level of Service (LOS) at these approaches was between "D" and "E". Traffic has increased since 2002 and will be higher when the project is constructed. Traffic added by the Sycamore Glen/Mountain Vista Development has the potential to degrade LOS to "E" or worse.
 - This combination of LOS degradation and increased queue lengths will negatively impact the operations of the SR 99/Cohasset IC and create a significant impact.
- The difference between the Existing Conditions, Existing With Eaton Road Extension Conditions, and Project Conditions at the SR 99/Cohasset Road IC should be quantified for each IC ramp intersection and a percentage of responsibility for the reduced LOS and increased delay identified. Thereafter, measures should be identified to mitigate this project specific impact. If a fair-share contribution for the needed improvements is recommended in lieu of constructing specific improvements, then the contribution must be quantified.
- The project also has the potential to cause significant traffic impacts to the SR 99/Eaton Road IC; the DEIR should be revised to include an analysis of this IC and to identify mitigation

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Mr. Bob Summerville
February 7, 2005
Page 3

measures as warranted. The following supports this recommendation:

- Page 18, Section III, B. Project Description, Background: The DEIR assumes construction of the Eaton Road extension with the project to begin in 2005/2006 and be completed by 2010. On page 145, Section IV, J.1.f. under baseline levels of service, the travel demand forecasting model referenced assumes that Eaton Road will be constructed as a four-lane arterial roadway. It is the State's understanding that there is an interim traffic signal project being proposed to address current deficiencies to the Interchange, but that there is not a currently funded project to widen the SR 99/Eaton Road IC over crossing or to extend the widening of Eaton Road to four-lanes west from the project site to the IC. With this in mind, it does not appear appropriate that the DEIR assumes that Eaton Road will be constructed to four-lanes west from the project through the IC and that there will be no impacts to the SR 99/Eaton Road IC as a result of the project.
- Page 144, Section IV, J.1.d.: Without analyzing the SR 99/Eaton Road IC, it is not clear whether the project will have an immediate impact on this IC such that mitigation will be required. Providing traffic data will show whether or not the project will trigger the need for an immediate right turn lane at the northbound SR99/Eaton Road IC off-ramp.
- Page 157, Figure IV.J-5: This figure shows an assumed project trip distribution of 8 percent of vehicles traveling west on Eaton Road past Cohasset Road towards SR 99. It should be disclosed in the DEIR how this volume of traffic will impact the SR 99/Eaton Road IC LOS and delay.
- A traffic analysis of the SR 99/Eaton Road IC should be conducted. As part of the analysis, the anticipated timing of the SR 99/Eaton Road IC overcrossing-widening project should be compared with development of the project.
- The project also has the potential to cause significant traffic impacts to the SR 32/Bruce Road intersection; the DEIR should be revised to include an analysis of this intersection and to identify mitigation measures as warranted. The following supports this recommendation:
 - Page 144, Section J.1. d. and Page 157, Figure IV.J-5: The intersections that were subject to a detailed LOS traffic analysis for the DEIR does not include the SR 32/Bruce Road intersection. The project trip distribution indicates that 20 percent of the traffic will travel east and south on the Eaton Road extension, which will connect with Manzanita Avenue, Bruce Road, and SR 32. With this in mind, it can be readily assumed that some of this traffic will be utilizing SR 32 at Bruce Road to head south to regional retail commercial and business/professional offices opportunities.
 - So that project specific traffic impacts can be identified, the SR 32/Bruce Road intersection should be included in the analysis and mitigation measures identified as warranted.
- Page 162, Cumulative Intersection Levels of Service: The project will contribute to the cumulative impacts to both the SR 32 and SR 99 mainlines, the SR 32/Bruce Road intersection, the SR 99/Eaton Road Interchange (IC), the SR 99/East Avenue IC, the SR

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cont.

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Mr. Bob Summerville
February 7, 2005
Page 4

99/Cohasset Road IC, the SR 99/East First Avenue IC, the SR 32/SR99 IC, and the SR 99/Skyway IC. With the exception of funding of the Project Study Report for the SR 32/Eaton interchange improvements and traffic signals as well as the SR 99/Skyway Interchange design along with ramp reconfiguration and frontage roads construction, improvements to increase capacity are not included in the City of Chico's development impact fee program. Therefore, mitigation for the cumulative traffic impacts that have not been included in the City's development impact fee program should be identified in the DEIR and included in the conclusions under Section VI.A., Cumulative Impacts Assessment on page 183.

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cont.

- A full traffic analysis may not be required for all of the State highway mainlines, interchanges, and intersections listed above. However, a fair share fee statement and data to back up the proportional responsibility of the proposed development to the cumulative impacts should be made a part of the DEIR.
- The State recommends that TIS be revised and recirculated for review.
- The project as identified in Section 15206 of the California Code of Regulations (CCR) and Section 21092.4 of the Public Resources Code (PRC) is of statewide, regional, or areawide significance. Sections 21081.4, 21081.6, and 21081.7 of the PRC mandate that lead agencies provide the California Department of Transportation with information on transportation related mitigation monitoring measures for projects that are of statewide, regional, or area wide significance. The enclosed "Guidelines for Submitting Transportation Information from a Reporting or Monitoring Program to the Department of Transportation" discuss the scope, purpose and legal requirements for mitigation monitoring reporting and submittal, specify the generic content for reports, and explain procedures for the timing, certification and submittal of the required reports. The enclosed Mitigation Monitoring Certification Checklist form must be completed and submitted to our office when the mitigation measures are approved, and again when they are completed.

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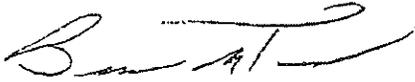
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Please send us a copy of the revised DEIR. If the City chooses not to revise the DEIR, then please send us a copy of the final environmental impact report (CEQA, Section 21092.5(a)) for the ten-day mandated review period prior to certification and any conditions of approval for the project when available. If you have any questions regarding these comments, please contact Rick Helman, Local Development/Inter-Governmental Review Coordinator, at (530) 634-7612.

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Sincerely,



BRUCE DE TERRA, CHIEF
Office of Transportation Planning – North

Attachment:

Cc: Scott Morgan, State Clearinghouse
Jon Clark, BCAG

California Department of Transportation (Department)

**GUIDELINES FOR SUBMITTING TRANSPORTATION
INFORMATION FROM A REPORTING OR MONITORING
PROGRAM TO THE CALIFORNIA DEPARTMENT OF
TRANSPORTATION (DEPARTMENT)**

INTRODUCTION The California Environmental Quality Act (CEQA) as amended on January 1, 2001, by Assembly Bill (AB) 1807, added a new provision to Section 21080.4 of the Public Resources Code (PRC).

The provision requires lead agencies to submit Notices of Preparation (NOPs) to the Governor's Office of Planning and Research when they determine that an environmental impact report will be required to approve a project.

The new law also amended PRC Section 21081.7, which now requires that "transportation information resulting from a reporting or monitoring program adopted by a public agency" be submitted to the Department when a project has impacts that are of statewide, regional, or area-wide significance.

Mitigation reporting or monitoring programs are required under PRC Section 21081.6 when public agencies include environmental impact mitigation as a condition of project approval. Reporting or monitoring takes place after approval to ensure implementation of the project in accordance with mitigation imposed during the CEQA review process.

In addition to the requirements listed above, AB 1807 obligates the Department to provide guidance for public agencies to submit their reporting or monitoring programs. Subject to these requirements, the following guidelines have been adopted by the Department.

**PURPOSE OF
THE
GUIDELINES**

The purpose of these guidelines is to establish clear and consistent statewide procedures for public agencies to submit transportation mitigation reporting or monitoring information to the Department. They are to be used by District Intergovernmental Review (IGR) Program Coordinators for identifying the scope and timing of transportation information needed, and to identify the "single point of contact" for transmittal of reporting or monitoring information from the lead agency to the Department.

PROCEDURES

The following procedures are intended for use by District IGR Program Managers and Coordinators in directing local lead agencies to comply with PRC Section 21081.7.

- A. The District IGR Coordinator will notify the CEQA lead agency in writing about transportation reporting or monitoring submittal requirements in PRC Section 21081.7 during either "early consultation", the Notice of Preparation (NOP) stage, or the Initial Study (IS) phase of the CEQA review process.
- B. Detailed procedures for the CEQA lead agency to submit transportation reporting or monitoring information to the district should be attached to the district's notification letter. The submittal shall contain the following information:
 1. The name, address, and telephone number of the CEQA lead agency contact who is responsible for the mitigation reporting or monitoring program (see PRC Section 21081.6[a][1]).
 2. The location and custodian of the documents or other material, which constitute the record of proceedings upon which the lead agency's decision is based (see PRC Section 21081.6[a][2]).
 3. Assurances from the CEQA lead agency that the Department can obtain copies of the aforementioned documents and materials, if needed, to clarify details or resolve issues related to the mitigation adopted (see PRC Section 21081.7).
 4. Detailed information on impact assessment methodologies, the type of mitigation, specific location, and implementation schedule for each transportation impact mitigation measure included in the reporting or monitoring program (see PRC Section 21081.6[b]). The CEQA lead agency, at its discretion, may submit the complete reporting or monitoring program with the required transportation information highlighted.
 5. A certification section which will be signed and dated by the CEQA lead agency and the Department certifying that the mitigation measures agreed upon and identified in the above checklist have been implemented, and all other reporting requirements have been adhered to, in accordance with PRC Sections 21081.6 and 21081.7.

Letter
AI
Attach.

Mitigation Monitoring Guidelines
February 10, 2003
Page 3

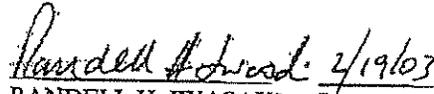
- C. When the project involves encroachment onto a state highway, the certification section will be signed by the District Permit Engineer. The District Permit Engineer will retain one copy of the mitigation reporting or monitoring information for the district permit files, and forward the original document to the District IGR Coordinator. The District IGR Coordinator will forward a copy to the Department's IGR Program Manager.
- D. When the project does not involve encroachment onto a state highway, the certification section will be signed by the District IGR Coordinator. The District IGR Coordinator will retain the original document and forward a copy to the Department's IGR Program Manager.

APPROVED:



BRIAN J. SMITH
Deputy Director
Planning and Modal Programs

Feb 07/03
Date



RANDELL H. IWASAKI
Deputy Director
Maintenance and Operations

2/19/03
Date

Letter
AI
Attach.

CEQA LEAD AGENCY CERTIFICATION CHECKLIST FORM *
FOR SUBMITTAL OF TRANSPORTATION MITIGATION MONITORING REPORTS

Project Name: _____

Lead Agency and State Clearinghouse (SCH) File #s: _____

Findings & Approval Dates & Document Types: _____

Lead Agency Contact (Name, Title, Agency, Address & Phone): _____

Project Proponent (Name, Title, Company, Address & Phone): _____

For each specific Transportation Related Mitigation Measure associated with this Project,
The following information items are included in the attached materials:

| Yes | No | |
|--------------------------|--------------------------|--|
| <input type="checkbox"/> | <input type="checkbox"/> | Location/Custodian Of CEQA Documents, Proceedings, Records |
| <input type="checkbox"/> | <input type="checkbox"/> | Description Of How To Obtain Copies Of Above Documents |
| <input type="checkbox"/> | <input type="checkbox"/> | Mitigation Measure Name & Identifying Number |
| <input type="checkbox"/> | <input type="checkbox"/> | Caltrans Encroachment Permit Number (if one was needed) |
| <input type="checkbox"/> | <input type="checkbox"/> | Copy of Other Agency Permits required for this Measure (if needed) |
| <input type="checkbox"/> | <input type="checkbox"/> | Measure Location Description & Vicinity Map |
| <input type="checkbox"/> | <input type="checkbox"/> | Location of Impacted State Highway Component (County, Route, Postmile) |
| <input type="checkbox"/> | <input type="checkbox"/> | Detailed Description of Measure & its Purpose (attach blueprints if necessary) |
| <input type="checkbox"/> | <input type="checkbox"/> | Implementation Schedule & Progress Reports |
| <input type="checkbox"/> | <input type="checkbox"/> | Completion Criteria (including detailed performance objectives) |
| <input type="checkbox"/> | <input type="checkbox"/> | Completion Evaluation (including field inspection reports) |
| <input type="checkbox"/> | <input type="checkbox"/> | Estimated Monetary Value of Completed Measure & % Local Agency Funded |
| <input type="checkbox"/> | <input type="checkbox"/> | Photograph of Completed Measure Attached |
| <input type="checkbox"/> | <input type="checkbox"/> | Responsible Contractor (Name, Company, Address & Phone) |

We certify that these agreed upon mitigation measures have been implemented, and all other requirements have been adhered to, in accordance with PRC Sections 21081.6 and 21081.7.

Signature & Date: _____

Name: _____

Title: _____

CEQA Lead Agency

California Department of Transportation

*This Certification Checklist form is to be used by public agencies to submit their mitigation reporting or monitoring programs to the California Department of Transportation (Department) when a CEQA project has been found to have transportation or circulation impacts that are of statewide, regional, or area-wide significance. Copies of this form, and the Department Guidelines developed pursuant to PRC Section 21081.7, can be downloaded from the Caltrans website (http://www.dot.ca.gov/hq/tpp/publications_resources.htm). Completed forms with attached materials may be post-mailed, e-mailed, or faxed to the appropriate Deputy District Director for Planning, Attention: Intergovernmental Review (IGR) Coordinator. {Form Version 01082003}

RESPONSE TO COMMENT LETTER A1
State Department of Transportation- District 3
February 7, 2005

- A1-1: The scope of traffic study area was determined by the City based on a review of the proposed project and the existing and proposed circulation system in the vicinity of the project site. Key intersections that it was thought the project could significantly impact were studied. Those intersections include:
- Eaton Road / Cohasset Road
 - Eaton Road / Floral Avenue
 - East Avenue / Floral Avenue
 - East Avenue / Mariposa Avenue
 - East Avenue / Ceanothus Avenue

Based on the trip generation and distribution characteristics of the proposed project, significant direct or cumulative impacts to State Highway System (SHS) were not anticipated to result, and therefore such facilities were not evaluated in the traffic study.

On October 18, 2005, the Chico City Council adopted the 2005-06 Nexus Study Update ("Nexus Study"). The Nexus Study updated development impact fees and their allocation in response to changes in assumptions and a proposed development project list. The Nexus Study includes improvements at shared City and Caltrans intersections. These intersections encompass those along SR99, including the Phase 1 improvements to SR99. Caltrans was directly involved in the identification of intersections included in the Nexus Study, and has publicly supported its adoption by the City Council.

The Nexus Study includes the collection of development impact fees for improvements at the following locations, all of which are included in the Caltrans letter: SR32/Bruce Road intersection, SR99/Eaton Road interchange, SR99/East Avenue interchange, SR99/Cohasset Road interchange, SR99/E. 1st Avenue interchange, SR32/SR 99 interchange, and SR99/Skyway interchange. Thus, the City has adopted a Caltrans-approved funding mechanism for these improvements.

The Mountain Vista/Sycamore Glen projects are subject to payment of development impact fees under the City's recently adopted ordinance. This money will be available to the City to implement the projects that were identified in the development of the ordinance, including the intersection and interchange improvements noted above.

The City has collaborated, and will continue to collaborate, with Caltrans in prioritizing, designing and approving those projects listed in the City's Capital Improvement Program (CIP) subject to Caltrans jurisdiction. As noted above, the intersection/interchange improvements are scheduled for construction in the next five years.

Under CEQA, the payment of fees under an ordinance adopted for the purpose of addressing cumulative effects is considered adequate mitigation. CEQA Guidelines section 15130 provides:

"(a)(3) An EIR may determine that a project's contribution to a significant cumulative impact will be rendered less than cumulatively considerable and thus is not significant. A project's contribution is less than cumulatively considerable if the project is required to implement or fund its fair share of a mitigation measure or measures designed to alleviate the cumulative impact. The lead agency shall identify facts and analysis supporting its conclusion that the contribution will be rendered less than cumulatively considerable."

In keeping with this CEQA Guideline, the Courts have held that payment of a fee under an adopted traffic impact fee program is a sufficient basis for concluding a project's contribution to traffic impacts will not be cumulatively considerable. (See *Save Our Peninsula Comm. v. Monterey County Board of Supervisors* (2001) 87 Cal.App.4th 99, 140.) As one Court explained in a recent CEQA decision:

"When future traffic congestion will result from the cumulative impact of several projects, cumulative traffic mitigation measures for a single project (that is one of the several projects) may be deemed sufficient if those measures are based on a reasonable plan of actual mitigation that the relevant agency commits itself to implementing. [Citation.] . . . [¶] A single project's contribution to a cumulative traffic impact is deemed less than significant if the project is required to implement or fund its 'fair share' of a mitigation measure designed to alleviate the cumulative impact. [Citation.] Fee-based mitigation programs for cumulative traffic impacts – based on fair share infrastructure contributions by individual projects – have been found to be adequate mitigation measures under CEQA. [Citation.] To be adequate, these mitigation fees . . . must be part of a reasonable plan of actual mitigation that the relevant agency commits itself to implementing."

(*Anderson First Coalition v. City of Anderson* (2005) 130 Cal. App. 4th 1173, 1187-1188.)

In the *Anderson First Coalition* case, the Court held the payment of the applicant's "fair share" towards improvements to an interchange was inadequate because, at the time the city approved the project, the city had not updated its traffic fee program to include the interchange improvements.

In this case, the City has updated its traffic fee program, and the updated program includes the improvements to the various intersections and interchanges noted above. Moreover, the fee program has been developed in close consultation with Caltrans, and the City and Caltrans have committed to a specific schedule to construct the improvements to these facilities. For this reason, the record supports the conclusion that, by virtue of this fair-share payment, the project's contribution to traffic conditions at the intersections and interchanges outlined in Caltrans' February 7, 2005 letter will not be cumulatively considerable.

- A1-2: Comment noted. As described in Response to Comment A1-1 above, impacts to these facilities have been addressed in a separate study conducted by the City and fees will be collected to mitigate impacts to the SHS.
- A1-3: Comment noted. As described in Response to Comment A1-1 above, impacts to these facilities have been addressed in a separate study conducted by the City and fees will be collected to mitigate impacts to the SHS.

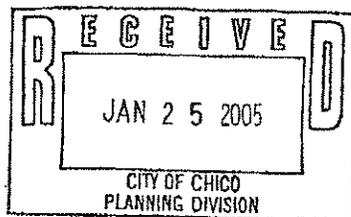
- A1-4: Comment noted. As described in Response to Comment A1-1 above, impacts to these facilities have been addressed in a separate study conducted by the City and fees will be collected to mitigate impacts to the SHS. As part of the nexus and fee study, the project's fair share contribution is identified and will be implemented prior to building permits being issued by the City.
- A1-5: Comment noted. As described in Response to Comment A1-1 above, impacts to these facilities have been addressed in a separate study conducted by the City and fees will be collected to mitigate impacts to the SHS. As part of the nexus and fee study, the project's fair share contribution is identified and will be implemented prior to building permits being issued by the City.
- The roadway description for Eaton Road describes the ultimate roadway cross-section for the proposed widening, which will occur between Floral and East/Manzanita. A typical cross-section of Eaton Road is included in page 131 of the Draft EIR.
- A1-6: Comment noted. As described in Response to Comment A1-1 above, impacts to these facilities have been addressed in a separate study conducted by the City and fees will be collected to mitigate impacts to the SHS. As part of the nexus and fee study, the project's fair share contribution is identified and implemented prior to building permits being issued by the City. It should be noted that the Bruce Road/Manzanita Avenue widening project is also being funded on a fair share basis via the nexus program.
- A1-7: Comment noted. As described in Response to Comment A1-1 above, impacts to these facilities have been addressed in a separate study conducted by the City and fees will be collected to mitigate impacts to the SHS. As part of the nexus and fee study, the project's fair share contribution is identified and implemented prior to building permits being issued by the City.
- A1-8: Comment noted. This information has been presented in the study prepared by the City.
- A1-9: The City has addressed comments identified by Caltrans in the supplemental study that identifies improvements on the SHS, identifies a nexus between needed improvements and expected development, and collection of fees to offset impacts to the SHS. The City has coordinated with Caltrans staff on the supplemental study and has identified the project's fair-share contribution for these improvements.
- A1-10: The traffic study for the proposed project did not identify any significant impacts to the SHS. As such, no mitigation measures are required that would require monitoring by Caltrans. However, as stated in the above responses, and is mentioned on page 162 of the Draft EIR, the project will be required to make a fair share contribution to the City's development impact fee program in order to offset its cumulative impacts and pay for regional transportation improvements, including those to the SHS. The City will be responsible for monitoring the payment of impact fees by this project and others within the City.

A1-11: The City will forward a copy of the Response to Comments document to Caltrans (and all commenting agencies) 10 days prior to certification of the Final EIR, as required by CEQA.

DEPARTMENT OF TRANSPORTATION
DIVISION OF AERONAUTICS – M.S.#40
1120 N STREET
P. O. BOX 942873
SACRAMENTO, CA 94273-0001
PHONE (916) 654-4959
FAX (916) 653-9531
TTY (916) 651-6827



*Flex your power!
Be energy efficient!*



January 19, 2005

Mr. Bob Summerville
City of Chico
P.O. Box 3420
Chico, CA 95927

Dear Mr. Summerville:

Re: City of Chico's Draft Environmental Impact Report (DEIR). Mountain Vista and Sycamore
Glen Subdivisions; SCH# 2003042068

The California Department of Transportation (Caltrans), Division of Aeronautics, reviewed the above-referenced document with respect to airport-related noise and safety impacts and regional aviation land use planning issues pursuant to the California Environmental Quality Act (CEQA). The Division of Aeronautics has technical expertise in the areas of airport operations safety and airport land use compatibility. We are a funding agency for airport projects and we have permit authority for public and special use airports and heliports. We offer the following comments for your consideration.

1. The proposal consists of two vesting tentative subdivision maps and related permits and approvals for the Mountain Vista and Sycamore Glen Subdivisions. Combined, the subdivisions would create up to 409 single-family homes and 271 multi-family homes. The proposal also includes up to 50,000 square feet of neighborhood commercial floor space and approximately 56 acres of "permanent open space" at the "north side" of the two subdivisions, adjacent to Sycamore Creek. 1
2. Page 125 of the DEIR (referencing the Division of Aeronautics, May 3, 2003 Notice of Preparation comment letter), states that the "proposed project is located approximately 7,250 feet southeast of the approach/departure flight path (along the extended centerline for the runway) and the Fire Attack Aircraft Departure Route." This is incorrect. In our May 5, 2003 comment letter, we stated that the project site is "located approximately 7,250 feet southeast of end of the primary runway (13L/31R) at Chico Municipal Airport." We also stated that this location "places the project site between the approach/departure flight path (along the extended centerline for the runway) and the Fire Attack Aircraft Departure Route." More specifically, the Fire Attack Aircraft Departure Route directs aircraft approximately 1,800 feet north of the project site and the straight-out (beneath the extended runway centerline) approach/departure flight path is located approximately 1,800 feet west of the project site. 2
3. In our May 5, 2003 comment letter, we also stated that on a "Peak Fire Attack Day" the project site is located within the 60 dB Community Noise Equivalent Level (CNEL) and the 55 dB CNEL airport noise contours. With the surrounding land a mix of undeveloped and residential, the project site is considered to be in a quiet suburban area. 55 dB CNEL is generally recommended as the maximum acceptable noise exposure level for new residential and other noise-sensitive land use development in such an environment. These noise contours are averages. Homeowners in these subdivisions will be subject to "single event" noise impacts associated with individual aircraft overflights as well. According to the Butte County Airport Land Use Compatibility Plan (ALUCP), single-family residential is considered "normally unacceptable" within the 55 and 60 dB CNEL airport noise contours. Multi-family is considered "marginally compatible" within the 55 dB CNEL and "normally unacceptable" within the 60 dB CNEL. 3

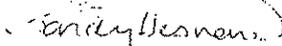
Mr. Bob Summerville
January 19, 2005
Page 2

4. As discussed in the DEIR, a portion of the project site (including 56 acres designated for permanent open space and two residential lots) is within Safety Zone B2 as designated in the ALUCP. The remainder of the project site is within Safety Zone C. We support the "permanent open space", however, the ALCUP also requires a "decd notice" as a condition of development in both safety zones. 4
5. Section 11010 of the Business and Professions Code and Sections 1102.6, 1103.4, and 1353 of the Civil Code (<http://www.leginfo.ca.gov/calaw.html>) address buyer notification requirements for lands around airports. Any person who intends to offer land for sale or lease within an *airport influence area* is required to disclose that fact to the person buying the property. 5
6. The Final EIR should include decd and buyer notification in addition to noise attenuation measures as required mitigation measures. 6
7. The protection of airports from incompatible land use encroachment is vital to California's economic future. The need for compatible and safe land uses near airports in California is both a local and a state issue. Along with protecting individuals who reside or work near an airport, the Division of Aeronautics views each of the public use airports in California as part of the statewide transportation system, which is vital to the state's continued prosperity. Airport land use commissions and airport land use compatibility plans, however, are key to protecting an airport and the people residing and working in the vicinity of an airport. 7
8. In addition to submitting the proposal must be submitted to the Butte County Airport Land Use Commission (ALUC) for a consistency determination, the proposal should also be coordinated with airport staff to ensure the proposal will be compatible with future as well as existing airport operations. 8

These comments reflect the areas of concern to the Caltrans Division of Aeronautics with respect to airport-related noise and safety impacts and regional airport land use planning issues. We advise you to contact our district office concerning surface transportation issues.

Thank you for the opportunity to review and comment on this proposal. If you have any questions, please call me at (916) 654-5314.

Sincerely,



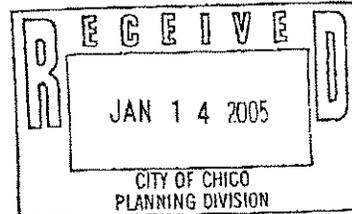
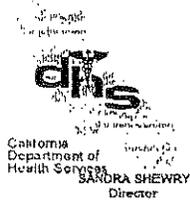
SANDY HESNARD
Aviation Environmental Planner

c: State Clearinghouse, Butte County ALUC, Chico Municipal Airport

RESPONSE TO COMMENT LETTER A2
State Department of Transportation- Division of Aeronautics
January 19, 2005

- A2-1: Except for the description of neighborhood commercial uses, the comment correctly describes the project. The neighborhood commercial uses includes up to 25,000 square feet of floor space. Reference to 50,000 square feet of space as noted in the comment is incorrect.
- A2-2: The clarifications to the Draft EIR text are noted and text revisions indicated in Chapter IV. The clarifications do not significantly change the findings of the Draft EIR.
- A2-3: The clarifications to the Draft EIR text are noted and text revisions indicated in Chapter IV. The clarifications do not significantly change the findings of the Draft EIR.
- A2-4: The City will require as a condition of approval that a disclosure of the property's location within an airport influence area be provided to all potential home buyers of properties on the project site. In addition, a deed notice will be a condition of approval for properties within Safety Zone B2 and Safety Zone C. It should also be noted that the project will require review by the Airport Land Use Commission (ALUC) as noted on pages 95 and 134 of the Draft EIR.
- A2-5: Refer to Response to Comment A2-4.
- A2-6: Deed and buyer notifications are not required to mitigate significant environmental impacts. However, the notifications will be required as conditions of approval, as stated in Response to Comment A2-4, above.
- A2-7: Comment noted. No response is warranted.
- A2-8: The project will be submitted to BCALUC for a consistency determination, as stated in Draft EIR page 134.

State of California—Health and Human Services Agency
Department of Health Services



ARNOLD SCHWARZENEGGER
Governor

January 7, 2005

Bob Summerville
City of Chico Planning Division
411 Main Street
Chico, CA 95928

Dear Mr. Summerville:

DRAFT ENVIRONMENTAL IMPACT REPORT – MOUNTAIN
VISTA/SYCAMORE GLEN SUBDIVISIONS, STATE CLEARINGHOUSE NO.
2003042068

Our office received the Draft Environmental Impact Report (DEIR) for the Mountain Vista/Sycamore Glen Subdivisions for review. We appreciate the opportunity to comment. The Department of Health Services, Division of Drinking Water and environmental Management (DHS) is responsible for water supply permits administered under the Safe Drinking Water Act.

It is not clearly stated in the DEIR whether or not new wells will be required to service the project. Page 168 of the DEIR indicates that California Water Service Company (CWSC) "drills wells to supply water as demand increases and foresees no problems in supplying water to the project." If new water wells are required by CWSC to serve the project, an application for a new or amended the water system permit must be submitted to the CDHS Redding District Office. Please contact Richard Hinrichs, District Engineer, of the Redding Field Office at (530) 224-4800 if you have any questions regarding water supply permits, permit amendments, or permit amendments.

In addition, the development of new municipal water wells, or other water supply infrastructure may be subject to separate environmental review pursuant to the requirements of CEQA. DHS will be the CEQA lead agency for any future water supply projects proposed by CWSC, if the City of Chico does not issue a discretionary permit for these projects.

If you have any questions regarding this matter, please call me at (916) 650-6874, or via email at rfranken@dhs.ca.gov.

Letter
A3
cont.

Mr. Bob Summerville
Page 2
January 7, 2005

Sincerely,



Rolf Frankenbach
Environmental Review Unit
SDWSRF Program

cc Office of Planning and Research
District Office
Office file

RESPONSE TO COMMENT LETTER A3
State Department of Health Services
February 7, 2005

A3-1: No new wells are expected to be required as a direct result of the proposed project.

A3-2: Refer to Response to Comment A3-1, above.



BUTTE COUNTY ASSOCIATION OF GOVERNMENTS

965 Fir St., Chico, CA 95928-6301 • (530) 879-2468 • FAX: (530) 879-2444 • www.bcag.org

January 12, 2005

Mr. Patrick Murphy
City of Chico Planning Office
P.O. Box 3420
Chico, CA 95927

**RE: DRAFT ENVIRONMENTAL IMPACT REPORT FOR MOUNTAIN VISTA
AND SYCAMORE GLEN SUBDIVISIONS**

Dear Mr. Murphy,

Thank you for the opportunity to review and provide comments on the above referenced draft environmental impact report (DEIR).

Our comments are as follows:

In Chapter IV, Section J "Transportation and Circulation", the East Ave/Cohasset Rd intersection is not analyzed. We suggest analyzing this intersection in addition to the five currently analyzed.

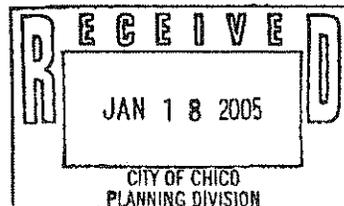
As you are aware, the East Ave/Cohasset Rd intersection represents the crossing of two regionally significant roadways and is one of the most congested intersections in the region. Because of its proximity to the development site, as well as the indications in Figure IV. J-5 (Page 157) that 40% of the project trip distribution will interact with the intersection, it seems logical to analyze this intersection to ensure that significant degradations in traffic conditions do not occur.

If this intersection was not included in this analysis due to the planned (but not programmed) improvements to this intersection through Congestion Mitigation and Air Quality (CMAQ) funding, then this should be stated in this section.

If you have any questions regarding these comments, please contact me at 530-879-2468.

Sincerely,

Chris Devine
Senior Planner



RESPONSE TO COMMENT LETTER A4
Butte County Association of Governments
January 12, 2005

- A4-1: The East Avenue/Cohasset Road intersection was not included in the EIR's traffic analysis because there are planned improvements that were identified in the General Plan and were included in the Development Impact Fees Analysis and Recommendations final report (1997). In September 2005, the City completed construction of the East Avenue/Cohasset Road widening project which added right turn lanes at all corners of the existing intersection. With these improvements, this intersection will operate at acceptable levels of service in the future, with or without the project. Since the residential development proposed for the two subdivisions are consistent with both the General Plan and assumptions from the Development Fees report, the identified improvements take into account traffic generated by the proposed project; therefore, the intersection would operate at an acceptable level for cumulative conditions with the proposed project. A new analysis of this intersection was not required for the purposes of this EIR. It should also be noted that the project applicant shall be required to pay a fair share fee which will fund traffic improvements such as those at this intersection.

Letter
A5

2525 Dominic Drive, Suite J
Chico, CA 95928
(530) 891-2882
(530) 891-2878 Fax



W. James Wagener
Air Pollution Control Officer
Robert McLaughlin
Asst. Air Pollution Control Officer

January 24, 2005

Patrick Murphy
City of Chico Planning Division
P.O. Box 3420
Chico, CA 95927-3420

Re: Draft Environmental Impact Report (DEIR) for the Proposed Mountain Vista & Sycamore Glen Subdivisions

Dear Mr. Murphy:

The District has reviewed the DEIR for the above-proposed project. The District submits the following comments.

1. The proposed air quality impacts exceed the District emission thresholds. Additional mitigation measures should be considered such as including retail service adjacent to the subdivision, provide on-site bus turnouts and shelters, provide neighborhood parks or recreational options within the development.

Thank you for the opportunity to comment on the proposed project. If you have any questions, please contact the District at 891-2882.

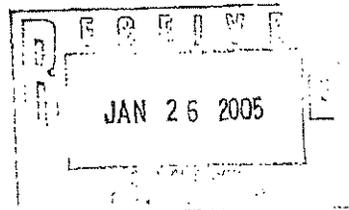
Sincerely,

A handwritten signature in cursive script that reads "Gail Williams".

Gail Williams
Air Quality Planner

File No 3455

\\baqnt1\butte_aqmd\apps_files\air\chico\deir\mountain vista & sycamore glen.doc



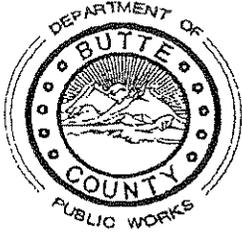
RESPONSE TO COMMENT LETTER A5
Butte County Air Quality Management District
January 24, 2005

A5-1: A commercial site is included as part of the project, at the northeast corner of Floral Avenue and Eaton Road, to serve the surrounding residential community and reduce the length of trips to purchase basic retail staples within the proposed project. Within the proposed project site, multi-family residential uses are planned to the north, east, and south of the commercial site to encourage pedestrian access to the site. Existing multi-family residential uses currently exist on the west side of Floral Avenue. Also, Mitigation Measure TRANS-1 requires that two transit stops be provided along Eaton Road within the project site. The project also includes a Class I bike trail that will connect the existing residential area to the west of the project site with Hancock park in the Foothill Park Subdivision to the east. All of these design features would serve to reduce the project's air quality impacts.

The project provides a bike path along Sycamore Creek to link with existing bicycle paths to east and west. Also, the street layout in the project provides pedestrian and bicycle connections from the project site to the bike path at various locations.

The project will further reduce air quality impacts by promoting alternative modes of transportation and are consistent with the BCAQMD's statement that the BCAQMD "encourages all future developments incorporate transit-oriented and pedestrian friendly practices". Measures to facilitate walking, bicycling, and transit use have already been incorporated into the project by providing for bike lanes/paths and sidewalks, the provision of bus stops adjacent to the development, and the addition of neighborhood-serving commercial uses which are intended to "serve the daily needs of the project residents and reduce the number of vehicular trips generated by these residents." Nevertheless, even after implementation of these mitigation measures by the Project, the air quality impacts remain potentially "significant" as a regulatory issue, due to the regional air basin-wide non-attainment conditions that exist within Butte County and the surrounding jurisdictions. It is not practical or feasible for the Project alone to substantially reduce regional air pollution; the Project is capable only of managing and limiting its own contributions to regional air pollution. So long as the broader air quality basin is in a technical state of non-attainment with regulatory goals, it will not be possible for Project air quality impacts to be technically "insignificant", and so the forgoing air quality impacts are considered "unavoidable", even though they can be mitigated or reduced to some degree.

Letter
A6



Department of Public Works County of Butte

J. Michael Crump, Director

LAND DEVELOPMENT DIVISION
7 County Center Drive
Oroville, CA 95965
(530) 538-7266
(FAX) 538-7171

January 4, 2005

Bob Summerville, Associate Planner
City of Chico
Planning Division
P.O. Box 3420
Chico, CA 95927-3420

**Re: Mountain Vista Vesting Tentative Subdivision Map (S 00-11)
Subdivision Account No.: 863-000/71127-4710
Sycamore Glen Vesting Tentative Subdivision Map (S 01-02)
Subdivision Account No.: 863-000/70817-4710**

Dear Mr. Summerville:

Reference is made to your request for comments dated December 15, 2004, on the above noted development.

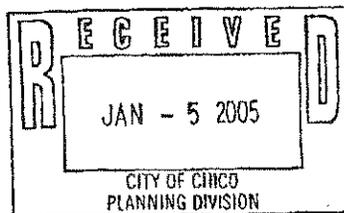
- 1. Development of this subdivision will increase flows into the Sycamore Creek watershed. The storm drain system should be designed to not exacerbate existing flooding problems on this system. | 1
- 2. Install full urban improvements including curb, gutter and sidewalk. | 2
- 3. Provide a permanent solution for drainage designed to not allow peak flows from the site to exceed current undeveloped levels. | 3

If you have any questions concerning this matter, please contact this office at (530) 538-7266, Monday through Friday, 8:00 a.m. to 4:00 p.m.

Sincerely,

Stuart Edell
Manager, Land Development Division

SE/kp



RESPONSE TO COMMENT LETTER A6
Butte County Department of Public Works
January 4, 2005

- A6-1: The City's Storm Drainage Master Plan (2000) concluded that there would not be a significant impact to Sycamore Creek from increased run-off generated by the project. The project's storm water drainage system is designed to be consistent with the City's storm drainage policies, and would therefore not result in significant drainage impacts. The City will require that the Project Engineer for the subdivision investigate the relationship between the subdivision runoff and the Sycamore Creek hydrograph to determine if onsite detention is necessary. If it is determined that on-site detention is necessary, then it will be designed in accordance with adopted City standards, including those identified in the SDMP, Chico Municipal Code (CMC) Title 15, and other pertinent sections of the CMC.
- A6-2: Street improvements, including curbs, gutters, and sidewalks, will be installed consistent with City standards.
- A6-3: Refer to Response to Comment A6-1. The proposed basins are planned for storm water treatment, not detention. Detention of storm waters is not required for Sycamore Creek, per the findings of the City's Storm Drainage Master Plan.

Letter
A7



**Pacific Gas and
Electric Company**

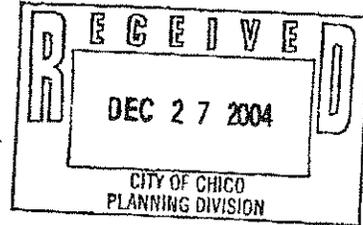
460 Rio Lindo Avenue
Chico, CA 95926
530/894-4423
FAX 530/894-4414

Don Chambers
Chico Land Rights Office

December 23, 2004

City of Chico
Community Development Department
P.O. Box 3420
Chico, Ca 95927-3420

Attention: Bob Summerville



RE: (DEIR), Mountain Vista & Sycamore Glen Subdivisions

Dear Mr. Summerville:

Pacific Gas and Electric Company (PG&E) has reviewed the subject DEIR and has the following comments.

1. Page 168, **I.c. Gas and Electricity**. The last paragraph should be corrected as follows:
 ".....Nine (not Ten) distribution lines (4 overhead, 5 underground).....PG&E has no current (insert) plans to expand this substation." PG&E has plans to install a 6-inch gas distribution main in the proposed Eaton Road right of way.
2. Page 169, **2.b.(3) Gas and Electricity**. Delete the last part of the second sentence so that it reads..."PG&E does not foresee any difficulties in providing electricity or gas to the proposed project."
3. Page 170, **2.d Cumulative Impacts**. The last sentence is misleading. From the electric side, this project adds a substantial demand to the overall electric distribution system that serves the Chico Urban Area and does have an impact. Although an adjacent substation exists to serve this project, there is a cumulative impact on the entire distribution system. Growth within the Chico Urban Area will require new electric facilities which may include new substations and or enlarging existing substations. On the gas side, PG&E recently installed a 6-inch gas main in Bruce Road and Manzanita Avenue, and it is likely that we will need to install a 6 or 8-inch distribution gas main through the Bruce Road/Highway 32 intersection to serve the additional load.

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Should you have any specific questions with regards to our electric system, please contact Frank Holtz at 894-4726, or Zach Raby regarding specific gas questions at 894-4786.

On a separate note, but relating to this projects street improvements, has anyone verified our substation property lines? The reason I mention this, is, our substation fences are not always constructed on the actual property lines of our properties.

4

Feel free to contact me at 894-4423, should you have any questions.

Sincerely,

Donald W. Chambers
Land Agent
(file: MtnVw&SycmrGln.doc)

RESPONSE TO COMMENT LETTER A7

Pacific Gas and Electric Company

January 23, 2004

- A7-1: The requested text clarification is noted in Chapter IV. The change does not change the conclusions of the Draft EIR analysis.
- A7-2: The requested text clarification is noted in Chapter IV. The change does not change the conclusions of the Draft EIR analysis.
- A7-3: The comment regarding cumulative growth in the Chico region is noted. The City acknowledges that ongoing growth of the area requires corresponding upgrades to PG&E's infrastructure in order to maintain acceptable service levels. The cumulative analysis conclusion on Draft EIR page 170 is still correct that this project does not result in a significant cumulative contribution to the demand for gas and electrical service.
- A7-4: The property lines of the substation have been verified by the applicant, and are correctly plotted on the subdivision maps and other figures in the Draft EIR. The relationship of the existing fences to the property lines will be verified prior to initiation of construction work.

Letter
A8



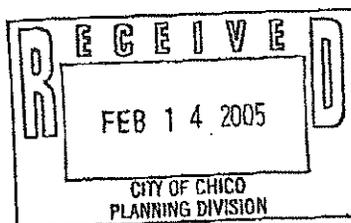
Arnold
Schwarzenegger
Governor

STATE OF CALIFORNIA
Governor's Office of Planning and Research
State Clearinghouse and Planning Unit



Jan Boel
Acting Director

February 8, 2005



Bob Summerville
City of Chico
411 Main Street
Chico, CA 95928

Subject: Mountain Vista and Sycamore Glen Subdivisions (S00-11 & S01-02)
SCH#: 2003042068

Dear Bob Summerville:

The State Clearinghouse submitted the above named Draft EIR to selected state agencies for review. On the enclosed Document Details Report please note that the Clearinghouse has listed the state agencies that reviewed your document. The review period closed on February 7, 2005, and the comments from the responding agency (ies) is (are) enclosed. If this comment package is not in order, please notify the State Clearinghouse immediately. Please refer to the project's ten-digit State Clearinghouse number in future correspondence so that we may respond promptly.

Please note that Section 21104(c) of the California Public Resources Code states that:

"A responsible or other public agency shall only make substantive comments regarding those activities involved in a project which are within an area of expertise of the agency or which are required to be carried out or approved by the agency. Those comments shall be supported by specific documentation."

These comments are forwarded for use in preparing your final environmental document. Should you need more information or clarification of the enclosed comments, we recommend that you contact the commenting agency directly.

This letter acknowledges that you have complied with the State Clearinghouse review requirements for draft environmental documents, pursuant to the California Environmental Quality Act. Please contact the State Clearinghouse at (916) 445-0613 if you have any questions regarding the environmental review process.

Sincerely,

Terry Roberts
Director, State Clearinghouse

Enclosures
cc: Resources Agency

Document Details Report
State Clearinghouse Data Base

SCH# 2003042068
Project Title Mountain Vista and Sycamore Glen Subdivisions (S00-11 & S01-02)
Lead Agency Chico, City of

Type EIR Draft EIR
Description Subdivision to create 409 lots for single-family residential uses - develop 270 multi-family residential units. Develop 25,000 square feet commercial building space.

Lead Agency Contact

Name Bob Summerville
Agency City of Chico
Phone 530-895-4788
email
Address 411 Main Street
City Chico
State CA **Zip** 95928
Fax

Project Location

County Butte
City Chico
Region
Cross Streets Floral, Ceano Thus Avenues and Eaton Road
Parcel No. 048-020-067, 069, 070, 071 and 072
Township 22N **Range** 1E **Section** 11&12 **Base** MDB&M

Proximity to:

Highways 99
Airports Chico Municipal
Railways
Waterways Sycamore Creek
Schools McManus Elementary
Land Use Vacant / PMU Planned Mixed-Use - R1 Low Density Residential

Project Issues Aesthetic/Visual; Air Quality; Archaeologic-Historic; Drainage/Absorption; Flood Plain/Flooding; Noise; Public Services; Toxic/Hazardous; Traffic/Circulation; Water Quality; Wetland/Riparian; Wildlife; Growth Inducing

Reviewing Agencies Resources Agency; Department of Conservation; Department of Fish and Game, Region 2; Office of Historic Preservation; Department of Parks and Recreation; Department of Water Resources; Office of Emergency Services; Native American Heritage Commission; California Highway Patrol; Caltrans, District 3; Caltrans, Division of Aeronautics; Department of Health Services; Regional Water Quality Control Bd., Region 5 (Redding); Department of Toxic Substances Control

Date Received 12/14/2004 **Start of Review** 12/14/2004 **End of Review** 02/07/2005

Note: Blanks in data fields result from insufficient information provided by lead agency.

RESPONSE TO COMMENT LETTER A8

State Clearinghouse

February 8, 2005

- A8-1: The letter indicates that the Draft EIR was circulated to State agencies by the State Clearinghouse. Copies of comment letters from State agencies are printed as letters A1, A2, and A3. No response to the State Clearinghouse letter is warranted.

B. ORGANIZATIONS

Letter
BI



Butte
Environmental
Council



Office
116 W. Second Street, Suite 3
Chico, CA 95928
530/891-6424
530/891-6426 Fax
www.becnet.org

Activities and Events
Environmental Education
Recycling Referrals
Environmental Advocacy
Endangered Species Faire
Bidwell Park Cleanups
Chico Area Creek Cleanups
Wetlands Preservation

Board of Directors
Peter Hollingsworth
Kathryn Hood
Sally Miller
Tim Strashane
Derek Vail

Executive Director
Barbara Vlamas

Staff
Kylene Hees

February 7, 2005

Bob Summerville
City of Chico
P.O. Box 3420
Chico, CA 95927

Re: *Draft Environmental Impact Report Mountain Vista/Sycamore Glen Subdivisions*

Dear Mr. Summerville:

Butte Environmental Council, a public benefit corporation representing 850 members, is submitting the following comments and questions for the *Draft Environmental Impact Report Mountain Vista/Sycamore Glen Subdivisions*.

Aesthetics

Page 42 – “The General Plan does not designate scenic vistas in the project area; therefore, the project will not create any adverse effects on any designated scenic vistas.” The Chico General Plan (CGP) may not have designated them, but there are obvious, dramatic views from this region of Chico. Simply because an impact was not addressed in the CGP, the impact remains and must be mitigated. If the proposed project is selected, it raises the impact to a significant level, so the City must require a thorough viewshed analysis prior to approving site design. If the City approves the Biological Resources alternative, a significant portion of the viewshed will be protected and should not require extensive viewshed analysis.

This property is zoned with a Resource Management Area (RMA) overlay. The RMA zoning envisioned not only higher standards for protecting natural resources, but also considered the values found in the community’s connection to preserved natural lands through appropriate passive recreation and accessible scenic landscapes. Preserving the views for the community at large is desirable and they will also cause the project housing and that of adjacent properties to increase in value over time.

Lighting in this project must not be similar to surrounding development. The proximity to the northeast Chico preserves should require much less intrusive lighting and glare. Though this requirement should also have been a condition of the Drake developments, it should not prevent the City from planning for this impact more appropriately on this site. Consideration similar to that used for Canyon Oaks development should be required.

Air Quality

1) This section provided some helpful background information and history. One significant omission is that there is only one multi-pollutant monitor in Chico now. When two were used, Chico’s air quality was demonstrably more serious. The monitor at Second and Salem streets frequently had exceeded standards for carbon monoxide.

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ok

2) Page 58 - Who will monitor the construction emissions? Has there been a change in regulations since the construction at the Nob Hill project that will allow the Butte County Air Quality Management District to enforce air quality standards?

5

Biological Resources

1) Has the applicant applied for a 404 permit from the Army Corps of Engineers? Has formal biological consultation been initiated? Without formal feedback from the jurisdictional agencies, it is premature for the applicant to pursue CEQA approvals. This backward method of planning is unfortunate for all involved as it may present a false picture to the Commission, Council and the community regarding what may actually be approved by the resource agencies.

6

2) Is there a hydrologic study of the watershed that supports the proposed preserve?
Without a topographic map, it is unclear. BEC suggests a much larger preserve that will protect the viability of the preserve. Preserves that are isolated from the upper watershed lose biological integrity over time, particularly when they are also impacted by close proximity to urban land use. They are subject to indirect impacts from the adjacent development, isolation from other vernal pool systems, and highly unlikely to support listed species in perpetuity.

7

2) The proposed project suggests on-site creation for partial mitigation for the wetland impacts. The scientific community and most agencies are rejecting such mitigation, recognizing that there are no long term monitoring data that indicate that re-created vernal pools provide long term habitat for the impacted species. Additionally, it is highly speculative that these re-created systems provide sufficient ecosystem function, value and plasticity to buffer them against catastrophic events such as floods and droughts, introduction of new pathogens, stochastic genetic drift, etc. Restoration of degraded pools near the project and out of kind creation of other wetland habitat is preferred to creation on-site or of any kind.

8

yes

4) Page 67 - The DEIR discusses the off-road vehicle destruction that has occurred on the project site. Decision makers should know that this active trespassing and damage has happened with the full knowledge of the current landowners. The City attempted to rectify this with offers to assist with funding a fence, but the offer was repeatedly declined.

9

false

5) The loss of wetlands in this proposal is significant even with mitigation and adds to the significant cumulative losses in the Chico Urban Area and Butte County. This is also true for the species that inhabit the wetlands and grasslands and those that count on native grasslands and waters for foraging and breeding. The City acknowledges that each individual project rises to a level of significance in the Chico General Plan EIR.

Biological Resources Impacts (Table 2-1)

000000 4.005

Flora and fauna associated with seasonal wetlands are frequently restricted to these ecosystems, and sensitive species are known to occur in seasonal wetlands in the Planning Area. Even with implementation of proposed policies OS-G-5 through OS-G-7, OS-G-9, and OS-I-26 through OS-I-30, loss or degradation of seasonal wetlands, including vernal pools, could occur and would result in a potentially significant impact to flora and fauna of seasonal wetlands.

00000000 00000000

In addition to implementation of General Plan policies, the City of Chico will continue to evaluate individual project impacts to determine if flora and fauna associated with seasonal wetlands can be

10

avoided, or mitigated to a less-than-significant level. If avoidance of flora and fauna associated with seasonal wetlands is possible, then less-than-significant impacts would result. When avoidance is not possible mitigation including offsite mitigation could also reduce this impact to less-than-significant. However, in some instances, impacts to seasonal wetlands may not be avoided or reduced to a less-than-significant level and would, therefore, remain potentially significant and unavoidable.

10
cont.

How will the preserve acreage be managed, both on-site and off-site (OS-I-16, OS-I-20, OS-I-28)? Will there be an endowment to fund management and monitoring activities (OS-I-17)? How will the public have an opportunity to comment on this necessary component of the mitigation?

Alternatives

The Biological Resources alternative is by far the environmentally superior alternative with fewer traffic, air quality, viewshed, wetland, and special status species impacts than the proposed project. The Biological Resources alternative also provides an acceptable number of residential and commercial units.

11

Hazards

1) Pages 92 – 95. The Commission may wish to consider a setback requirement from the PG&E station for any housing units.

12

While the City and County have clearly approved housing against ALUC plans and recommendations, BEC recommends that the City alter this practice to more adequately protect the airport for safety, transportation, and economic purposes and future residents from noise and the potential for accidents.

13

Hydrology

1) Page 97. A map should be provided as requested above to demonstrate the slopes and elevation.

14

2) Page 99 – It is interesting that Chico's Storm Drainage Master Plan (2000) does not identify the need for detention along Sycamore Creek. During the 1997 floods, water was within one foot of the freeboard in many segments of this creek. There is clearly an existing structural shortfall in the system that must be addressed with each additional project, including this one. This is significant impact with clear contributions to cumulative impacts.

15

Cumulative Impacts

Where is the list of current and future projects? Under CEQA, this is a project that has the potential to "significantly effect" the environment (21068) through traffic, air quality, degradation of foraging habitat, impacts to wetlands and special status species, water quality, alternative transportation routes, and recreation. The DEIR fails CEQA's cumulative impact requirements by neglecting to provide a list of closely related past, present, and reasonably foreseeable future projects, or a summary of projections contained in an adopted planning document which is designed to evaluate regional or area-wide conditions (CEQA Guidelines Section 15130). Relying on the 1994 Chico General Plan addresses only some of the present and future projects as the City of Chico analyzes additional growth areas such as the northwest specific plan area. The DEIR also fails to fully analyze the cumulative impacts to special status species and wetlands. As noted above, this is a significant impact as noted in the Chico General Plan EIR and it was not addressed since a Habitat and Conservation Plan was not adopted as partial

16

mitigation for these impacts.

Document Presentation

- 1) Figures III-6 and III-5 should be reversed in the document for a more clear geographic presentation of the project.

17

Thank you for the opportunity to comment.

Sincerely,



Barbara Vlamis, Executive Director

RESPONSE TO COMMENT LETTER B1

Butte Environmental Council

February 7, 2005

- B1-1: The Draft EIR evaluates the project's aesthetic impacts using the Criteria of Significance listed on Draft EIR pages 40-42. The City's General Plan is relevant to the impact discussion and has been used as a reference for evaluation of the project's impacts because it is an adopted reference for resources considered significant by the City. The Draft EIR includes an analysis of the representative changes in views that would occur with implementation of the project, and these changes were determined to not substantially degrade the existing visual character or quality of the site and its surroundings.
- B1-2: The project would preserve the northern portion of the site as an open space preserve visible from the proposed homes, streets adjacent to the open space, and bike trail connecting to the Sycamore Creek bike trail to the established trail alignments east and west of the site.
- B1-3: As stated on Draft EIR page 45-46, specific lighting has not been proposed at this time. However, lighting similar to the surrounding development, in accordance with the City's adopted subdivision design standards, would not result in any significant environmental effects. There are no significant sources of lighting or glare within the proposed residential uses that could cause and adverse effect. Lighting at the commercial site would also be required to comply with Municipal Code Chapter 19.60 to minimize direct glare and reflections.

Current research (Longcore, T. and C. Rich. 2004. Ecological light pollution. The Ecological Society of America, *Frontiers in Ecology and the Environment*. May 2004. Issue No. 4, Vol. 2. pp 191-198) indicates that light and glare or "ecological light pollution" (defined any artificial lighting that alters the natural light regime in a terrestrial or aquatic ecosystem) can affect nocturnal wildlife occurring in areas adjacent to the artificial light source. Effects can include disorientation or misorientation, or attraction or repulsion to the artificial light source, which in turn can result in changes in behavior. Light and glare, in the form of street lights or residential lighting, from the proposed project could potentially affect wildlife in the proposed open space preserve, as described above. Due to the proximity of adjacent developments to the east, south, and west which currently project light and glare on the project site (e.g., street lights along Floral Avenue), the potential effects of light and glare from the proposed project will be incrementally combined into the overall light and glare setting. In addition, none of the special status species occurring or potentially occurring on the project site are nocturnal and, as a result, will not be adversely affected by light and glare from the proposed project. Consequently, although light and glare from the proposed project could affect nocturnal wildlife in the open space preserve, no special status species will be affected. As a result, light and glare impacts from the proposed project to wildlife in the open space preserve area is considered less than significant. No mitigation is required to address the effects of lighting on biological resources.

- B1-4: The air quality section of the Draft EIR lists the monitored air quality data for the most recent three years (2000-2002) that were available at the time of preparation. The Salem

Street monitoring station in the City of Chico stopped monitoring carbon monoxide (CO) levels in 1998. The last exceedance of the eight-hour CO standard occurred in 1991. In 1997, the last year with complete monitoring data for the Salem Street station, the peak eight-hour CO level was 5.1 parts per million (ppm). This level is much lower than the federal and State eight-hour CO standard of 9 ppm. In addition, the proposed project site is located in an attainment area for federal and State CO standards. Therefore, it is not anticipated that there would be any exceedances of the CO standard in the project area.

As stated in Draft EIR page 51, both ozone and PM₁₀ are considered regional pollutants, which causes the air basin to be in non-attainment status. Emissions generated by construction and operation of the project would contribute to cumulative air quality impacts to the region, which are associated with effects on human health. Also refer to Response to Comment D1-17, which discusses the potential health effects associated with exposure to major criteria air pollutants.

- B1-5: The construction manager, the Public Works Construction Inspector, and BCAQMD staff will monitor compliance with Mitigation Measures AIR-1 and AIR-2.
- B1-6: The applicant submitted an application for a Department of the Army Permit under Section 404 of the Clean Water Act to the Corps on December 7, 2004. On April 19, 2005, the Corps initiated Section 7 consultation with the U.S. Fish and Wildlife Service (USFWS). On May 10, 2005, the USFWS requested additional information needed in conjunction with formal consultation. On April 28, 2005, the Corps notified the applicant that it concurs with the jurisdictional delineation presented on the revised wetland delineation map, dated April 19, 2005, which identifies 12.70 acres of waters of the United States, including wetlands, within the project site. The Corps issued a public notice for a Department of the Army Permit on June 20, 2005 describing the proposed project and requesting written comments from the public regarding the proposed project. The comment period on the permit process closed on July 22, 2005, although time extensions were granted. The applicant and his biological resources consultant have conducted some prior consultation with the resource agencies regarding the project design. The measures proposed to mitigate biological impacts include both on-site creation and off-site preservation and enhancement that will be designed to address the expected concerns of the resource agencies. If the project requires significant revisions as a result of comments from the resource agencies, it may require additional review by the City, including additional environmental analysis.
- B1-7: Preparation of a hydrologic study is not necessary for the CEQA analysis. Mitigation measure HYDRO-1 outlines the requirements necessary for preparing a storm drainage plan, consistent adherence to the City's Storm Drainage Master Plan. A formal wetland delineation of the site was prepared and verified by the Corps in 1992. The delineation was revised and was re-verified by the Corps on April 19, 2005. Topographic maps are included in Figure I.C-4 and III-5 and III-6. The site generally drains from north to the south and southwest, and the project has been designed to ensure that the proposed development area would not affect the hydrology of the preserve area. The area proposed for development is in the lower portion of the site's watershed. The project site has already been impacted by trespassing by vehicles and pedestrians. Implementation of the project would result in the fencing and restoration of the habitat in the area to be preserved.

- B1-8: As stated in Mitigation Measure BIO-1, the applicant intends to create new vernal pools and restore the degraded vernal pool habitat in the preserve area to the extent deemed feasible by the Corps. The underlying requirement for the mitigation measure is that “appropriate mitigation ratios shall be established to ensure no net loss of wetland acreage or value.” Should the Corps determine that off-site preservation is preferable to on-site creation, the amount of off-site mitigation may have to increase. In either scenario, the impacts to vernal pool and swale resources will be mitigated to less than significant levels based on adopted standards and protocol of the responsible agencies.
- B1-9: The impacts from off-road vehicles are an existing condition. The comment does not relate to the adequacy of the Draft EIR.
- B1-10: Page 80 of the Draft EIR acknowledges that the project would contribute to cumulative impacts to biological resources, but that with the implementation of the mitigation measures, the project’s contribution to cumulative impacts would not be considered significant. As stated in Mitigation Measure BIO-1, the HMMP will identify management, monitoring, and maintenance responsibilities for the open space preserve. The HMMP will also address contingency measures for funding monitoring and maintenance. A 30-day public review period is part of the 404 permit process.
- B1-11: The Draft EIR concluded that the Biological Resources Alternative was the Environmentally Superior Alternative. If is the commentor’s opinion that the amount of residential and commercial uses is considered an acceptable (and presumably economically feasible) intensity of development.
- B1-12: The commentor has not provided justification for recommending setbacks for residential uses. Draft EIR pages 92 to 95 contain a discussion of studies of the potential health effects from exposure to electric and magnetic fields (EMFs) that could be generated by the PG&E substation. As stated on Draft EIR page 94, no specific health effects of EMFs have been conclusively demonstrated, and there are no health-based standards for EMF exposure; therefore, there is no basis to require a setback from the substation.
- B1-13: Comment noted. The comment does not address the adequacy of the Draft EIR.
- B1-14: Refer to Response to Comment B1-7, above.
- B1-15: The City will require that the Project Engineer for the subdivision investigate the relationship between the subdivision runoff and the Sycamore Creek hydrograph to determine if onsite detention is necessary. If it is determined that on-site detention is necessary, then it will be designed in accordance with adopted City standards, including those identified in the SDMP, Chico Municipal Code (CMC) Title 15, and other pertinent sections of the CMC. Also refer to Response to Comment A6-1 which is repeated “The City’s Storm Drainage Master Plan (2000) concluded that there would not be a significant impact to Sycamore Creek from increased run-off generated by the project. The project’s storm water drainage system is designed to be consistent with the City’s storm drainage policies, and would therefore not result in significant drainage impacts. The City will require that the Project Engineer for the subdivision investigate the relationship between the subdivision runoff and the Sycamore Creek hydrograph to determine if onsite detention is necessary. If it is determined that on-site detention is

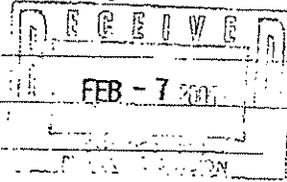
necessary, then it will be designed in accordance with adopted City standards, including those identified in the SDMP, Chico Municipal Code (CMC) Title 15, and other pertinent sections of the CMC.”

- B1-16: As stated on Draft EIR page 183, the City’s Residential and Commercial Development Activity Reports, updated on June 9, 2004, contains a list of approved or contemplated projects that was consulted with regard to the project’s contribution to cumulative impacts of development projects. *CEQA Guidelines* Section 15130 allow the use of either 1) a list of past, present and probable future projects or, 2) a summary of projections contained in an adopted General Plan. Because the list approach doesn’t address potential build-out that could occur under the adopted General Plan, the cumulative analysis also took into account the implementation of the General Plan. The project’s traffic analysis, for example, uses a quantitative projection of General Plan build-out to assess the project’s cumulative traffic impacts. As stated in Response to Comment B1-10, the project would mitigate the project’s cumulative impacts to biological resources to a less-than-significant level.
- B1-17: Comment noted. A graphic has been prepared that combines the two subdivisions and provides a better presentation of the joint project evaluated by the EIR. In addition, minor changes to the site plan have occurred due to comments made by the City Planning Commission (refer to D. February 3, 2005 Planning Commission Hearing, attached).

C. INDIVIDUALS

February 7, 2005

CITY OF CHICO
P.O. BOX 3420
CHICO, CA 95927



TO WHOM IT MAY CONCERN,

I HAVE TAKEN AN ABBREVIATED LOOK AT THE DRAFT ENVIRONMENTAL IMPACT REPORT (DEIR) FOR THE PROPOSED MOUNTAIN VISTA/SYCAMORE GLEN SUB-DIVISIONS AND WOULD LIKE TO MAKE THE FOLLOWING COMMENTS:

1. ON PAGE 77, REFERENCE IS MADE TO OFF-SITE MITIGATION AT A HAMILTON TRANCH IN TEHAMA COUNTY. PLEASE PROVIDE A MAP, DETAILS OF THE CONSERVATION EASEMENT, THE NATURE OF THE MITIGATION TO BE DONE AT THIS LOCATION, THE FINANCIAL ARRANGEMENT THAT WILL INSURE SUCCESSFUL MITIGATION IN PERPETUITY AND WHO WILL BE RESPONSIBLE FOR MONITORING, ETC.

2. WILL THE STORMWATER DETENTION FACILITY BE LINKED/INTEGRATED WITH THE ADJOINING FOOTHILL PARK EAST FACILITY? IF SO, HOW?

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3 WHAT MECHANISM WILL BE PUT IN PLACE TO GUARANTEE THAT ALL LANDS PRESERVED, NO MATTER THE ALTERNATIVE CHOSEN, WILL BE SUBJECT TO A MANAGEMENT PLAN THAT IS ~~OPEN~~ OPEN TO PUBLIC REVIEW AND IMPLEMENTED CONCURRENT WITH THE DEVELOPMENT OF THE PROPOSED SUBDIVISIONS?

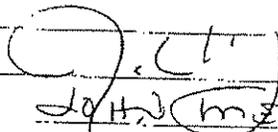
3

PLEASE KEEP ME INFORMED OF ANY AND ALL ACTIONS CONCERNING THIS PROJECT. IN PARTICULAR, I WOULD APPRECIATE A COPY OF THE STAFF REPORT AS SOON AS IT IS READY.

4

THANK YOU.

SINCERELY,



JOHN MENZ

P.O. BOX 4759

CITY CO, CA 95927

345-4050

RESPONSE TO LETTER C1

John Merz

February 7, 2005

C1-1: A map of Hamilton Ranch is included in Appendix A-1 of the Draft EIR as part of the Notice of Preparation. The details of the off-site mitigation will be documented through the Corps of Engineers (Corps) HMMP process, as required by Mitigation Measure BIO-1. The information requested by the commentor is not available at this time and is not required for the purposes of the CEQA analysis. However, the City has requested that the applicant provide the status of the draft management plans for the on-site preserve as well as the off-site preserve at Hamilton Ranch.

The applicant submitted an application for a Department of the Army Permit under Section 404 of the Clean Water Act to the Corps on December 7, 2004. On April 19, 2005, the Corps initiated Section 7 consultation with the U.S. Fish and Wildlife Service (USFWS). On May 10, 2005, the USFWS requested additional information needed in conjunction with formal consultation. On April 28, 2005, the Corps notified the applicant that it concurs with the jurisdictional delineation presented on the revised wetland delineation map, dated April 19, 2005, which identifies 12.70 acres of waters of the United States, including wetlands, within the project site. The Corps issued a public notice on the permit on June 20, 2005 describing the proposed project and requesting written comments from the public regarding the proposed project. The comment period closed on July 22, 2005, although time extensions were granted.

C1-2: The proposed storm water facilities at the northern edge of the project site are designed for storm water treatment, not detention. The facilities will operate independent of the nearby facility in Foothill Park East. Also refer to Responses to Comments B1-7 and B1-15.

C1-3: Subsequent to completion of the CEQA process and obtaining local entitlements, the applicant will be required to obtain a Section 404 permit from the Corps. The HMMP will specify the mechanism to preserve and maintain the open space preserve. The Corps makes the Section 404 permit (which includes the HMMP required by Mitigation Measure BIO-1) available for review during a 30-day public comment period.

C1-4: The commentor will be added to the project mailing list and notified of future hearings regarding the project.

D. FEBRUARY 3, 2005 PLANNING COMMISSION HEARING

**FEBRUARY 3, 2005 PLANNING COMMISSION HEARING ON
DRAFT ENVIRONMENTAL IMPACT REPORT**

PLANNING COMMISSION QUESTIONS & COMMENTS

EIRs always seem to identify significant unavoidable air quality impacts: require adoption of a Statement of Overriding Considerations when the EIR is certified. Several years ago BCAQMD made list of standard mitigation measures that would allow projects to avoid impacts. Can those be applied to this project to avoid the significant air quality impacts? | **1**

Regarding Mitigation Measure AIR-2 (DEIR p.9), what is the feasibility of orienting buildings for solar access? | **2**

To what extent is the project designed to be a walkable subdivision, so that people don't have to get in their cars to go to the grocery store? To what extent does this subdivision reduce the number of times that people have to get in their cars to go to the commercial center? Does the design incorporate features to reduce the amount of car trips? | **3**

Is project required to obtain permits from the Army Corps of Engineers (Corps) with regard to the wetlands on the site? | **4**

The proposed treatment basins are adjacent to the creek and haven't been designed yet. How do we know that there will not be a significant impact on the creek? Could the basins be usable for recreation? | **5**

How will open space be protected from impacts from off-road vehicles? | **6**

Are the drainage facilities sited to avoid impacts to vernal pools? | **7**

Has an attempt been made to design the subdivision's streets and paths to parallel the natural swales in the area of the site proposed for development? | **8**

Does Mariposa Avenue go right through middle of the open space area and the large vernal pool? | **9**

With regard to fencing & posting for the open space preserve- would people have any access? | **10**

PUBLIC COMMENTS

Jim Brobeck, Butte Environmental Council

Has the project obtained a 404 Permit from the Corps? Has formal consultation with the US Fish and Wildlife Service (USFWS) occurred? These actions need to take place prior to the CEQA analysis. | **11**

Has a formal hydrological study been conducted? | **12**

Indirect impacts from surrounding development on the open space preserve should be considered.

13

yes Studies have shown that created vernal pools and wetlands don't function well. Restoration of degraded pools is preferred to creation of new pools.

14

The Biological Resources Alternative evaluated in the EIR is superior to the proposed project.

15

ADDITIONAL PLANNING COMMISSION COMMENTS FOLLOWING PUBLIC TESTIMONY

How does project proceed related to the approvals required from the Corps and USFWS?

16

The EIR should include an analysis of impacts on human health resulting from the significant air quality impacts.

17

How does surface water flow on the site? Is there a danger from water running off from the development that would impact the vernal pools to be preserved in the open space area?

18

The alternatives analysis should look at preserving the swale system in the planned development area; look at development on both sides of swales, use them as amenities

19

EIR should look at improving vehicular and pedestrian circulation throughout the site, improve connections through the development area. This is very unfriendly pedestrian design; there are so many dead ends in the subdivision- it could be made more pedestrian friendly.

20

What are impacts of light and glare from streetlights and other illumination from the project on the open space preserve? Lighting should be designed to minimize glare and spillage on the open space area. In particular, the EIR should address the effect of lighting on wildlife foraging in the open space area.

21

How is fencing planned for the project? It should be designed so that it does not impact wildlife movement, but keeps out vehicles.

22

Is the two-acre commercial site big enough to get enough to be viable and serve the residential community?

23

RESPONSE TO PUBLIC HEARING COMMENTS February 3, 2005

- D1-1: The Draft EIR identifies significant air quality impacts resulting from construction of the project and operation of the planned uses on the site. The project would also contribute to cumulative air quality impacts because the Basin is in non-attainment status for PM₁₀ and ozone. Mitigation Measures AIR-1 contains the feasible BCAQMD requirements and would reduce the project's construction impacts, but after mitigation the project would still exceed the BCAQMD's thresholds for NO_x and PM₁₀. For operational emissions, the project would exceed the thresholds for ROG and NO_x. Mitigation Measure AIR-2 requires measures to reduce operational emissions, but impacts would still remain significant for certain air quality constituents. Also refer to Response to Comment D1-17, which discusses the potential health effects associated with exposure to major criteria air pollutants.
- D1-2: Mitigation Measure AIR-2 includes the guideline "To the extent feasible, orient buildings and include landscaping (e.g. shade trees) to maximize natural cooling, and utilize centralized space and water heating and/or use of solar water heating." The subdivisions are plotted to address a variety of design constraints. The project does not include any home designs at this time. The future homes that would be built on the site can be designed to maximize cooling, utilize centralized space and water heating and/or solar water heating. The lots can also accommodate shade trees for cooling.
- D1-3: The single-family lots, generally located north of Eaton Road, are in a layout typical of single family residential neighborhoods. The project includes a small commercial site at the northeast corner of Eaton Road and Floral Avenue to handle some of the commercial needs of the project. The original design of the project did not have multi-family housing around the commercial center, and that was added at the request of staff. An internal street connection to the commercial center was also added so that some residents will have the option of using local streets to reach the commercial site. In addition, the project includes a bike trail located along the northern edge of the development area, and adjacent to the open space preserve, that will connect with the adjacent bike trails to the east and west of the project site. These features should serve to eliminate some vehicle trips that would otherwise be generated by the project. However, it would be difficult to quantify how many trips would be eliminated by these design modifications. It should be noted that due to the number of commercial establishments on East Avenue, the small commercial site is not intended to compete with larger retail competitors.
- D1-4: Yes, the applicant will have to obtain permits from the Army Corps of Engineers (Corps). Mitigation Measure BIO-1 requires the applicant to prepare a Habitat Management and Monitoring Proposal (HMMP). The HMMP and other applicable permits must be approved by the Corps, U.S. Fish and Wildlife Service (USFWS) and Regional Water Quality Control Board (RWQCB) prior to initiation of work on the project site.
- D1-5: The City's Storm Drainage Master Plan (2000) concluded that there would not be a significant impact to Sycamore Creek from increased run-off generated by the project site. The treatment basins are located within the preserve area and are designed to be planted with native species. Based on the criteria presented in Mitigation Measure BIO-1, it has been concluded that the impacts can be mitigated to less than significant

levels. The basins are intended to be as natural as possible and are not appropriate for recreation. The Class I bike path and streets will connect to the adjacent subdivision to the east, which contains Hancock Park.

- D1-6: The open space preserve would be fenced to prevent unauthorized vehicle access. The fencing plan has not yet been designed but will be designed to facilitate views and wildlife movement. A solid fence will not be constructed.
- D1-7: The storm water treatment basins are plotted at the north end of the property, adjacent to the Sycamore Creek drainage. The basins are located in an area where there are few vernal pools and swales that would be impacted by their construction.
- D1-8: The vernal pools and swales in the southern portion of the site would be impacted by project development. Drainage from the development would be directed to standard in-street storm drains. The project has not been designed to preserve vernal pools and swales in the development portion of the site. Nonetheless, per mitigation measure BIO1, the impacts on vernal pool and swale resources will be reduced to less than significant levels (refer to Response to Comment B1-10).
- D1-9: The portion of Mariposa Avenue shown on Figures III-5 and III-6 in the central portion of the open space area is an existing approved street right-of-way that is proposed to be abandoned.
- D1-10: A fencing plan has not yet been designed for the open space preserve. The preserve is designed for the primary purpose of protecting the biological resources present, so access by persons would be restricted. The HMMP to be approved by the Corps would have requirements regarding fencing and conditions about access to the preserve. The bike trail planned along the southern perimeter of the preserve would allow people to view the preserve.
- D1-11: The comments from Mr. Brobeck reflect the comments made in the Butte Environmental Council letter (Letter B1). Please refer to the responses to Letter B1 for responses to all of the comments from the Butte Environmental Council. Refer to Response to Comment B1-6 regarding this particular comment.
- D1-12: Refer to Response to Comment B1-7.
- D1-13: Refer to Response to Comment B1-7 and B1-10.
- D1-14: Refer to Response to Comment B1-8.
- D1-15: Refer to Response to Comment B1-11.
- D1-16: The applicant has submitted an application for an Individual Permit under Section 404 of the Clean Water Act to the Corps. Part of that application process involves the preparation of an HMMP. Section 7 consultation with the USFWS has been initiated, and public notice of the permit request will be issued in the near future. Also refer to Response to Comment C1-1.

D1-17: The Draft EIR identifies that the proposed project would result in significant unavoidable adverse air quality impacts and would exceed the Butte County Air Quality Management District (BCAQMD) thresholds for two ozone precursors, NO_x and ROG. The project would also exacerbate nonattainment of air quality standards for PM₁₀ and ozone within the air basin and contribute to cumulative air quality impacts. Air quality standards are in place because studies have shown a link between poor air quality and human health effects. Table III-1 provides a

summary of the health effects associated with major criteria air pollutants. In addition to the criteria pollutants, another group of substances, called Toxic Air Contaminants (TACs), are known to be highly injurious, even in small quantities. TACs are airborne substances that are capable of causing short-term (acute) and/or long-term (chronic or carcinogenic) adverse human health effects (i.e., injury or illness). There are hundreds of substances that can be toxic when inhaled, but air quality standards have not been set for most of them.

Air quality management districts such as BCAQMD work to improve the air quality within the basins in their jurisdiction.

Because of the conservative nature of the significance thresholds and the basin-wide context of an individual project's emissions, there is no direct correlation of a single project to localized health effects. One individual project having emissions exceeding a threshold does not necessarily result in adverse health effects for residents in the project vicinity. This is especially true when the criteria pollutants exceeding thresholds are those with regional effects, such as ozone precursors like NO_x and ROG. Chapter IV of this Responses to Comments document incorporates some revisions to the text of Draft EIR Section IV.B, Air Quality, expanding upon the discussion of the potential health effects of the project's significant air quality impacts. Also, refer to Response to Comment A5-1 which describes project features that will result in reduced vehicular trips.

Table III-1: Health Effects Summary of the Major Criteria Air Pollutants

| Air Pollutants | Adverse Effects |
|------------------------|--|
| Ozone | Eye irritation. Respiratory function impairment. |
| Carbon Monoxide | Impairment of oxygen transport in the blood stream, increase of carboxyhemoglobin. Aggravation of cardiovascular disease. Impairment of central nervous system function. Fatigue, headache, confusion, dizziness. Can be fatal in the case of very high concentrations in enclosed places. |
| Sulfur Dioxide | Aggravation of chronic obstructive lung disease. Increased risk of acute and chronic respiratory illness. |
| Nitrogen Dioxide | Risk of acute and chronic respiratory disease. |
| Suspended Particulates | Increased risk of chronic respiratory disease with long exposure. Altered lung function in children. With SO ₂ , may produce acute illness. Particulate matter 10 microns or less in size (PM ₁₀) may lodge in and/or irritate the lungs. |

Source: California Air Resources Board, 1999.

D1-18: Because surface drainage on the site flows from north to south and into the swale system that will be impacted by the development, vernal pools in the open space area would not be affected by run-off from the development area.

D1-19: The Biological Resources Alternative (Draft EIR Figure V-2) is an alternative evaluated in the Draft EIR that was designed to avoid impacts to the majority of the vernal pools

and the swale system on the site. The alternative would limit most of the housing to the areas adjacent to Eaton Road and the northwestern portion of the site along Floral Avenue. This was considered the Environmentally Superior Alternative.

- D1-20: This is a design-specific comment which does not comment on the Draft EIR. Design-related concerns will be addressed by staff and the Planning Commission during discussions about the project merits. However, the applicant has prepared a revised plan which addresses issues involving pedestrian circulation and connectivity and will be submitted to the PC for their review (see attached graphic). The revised plan does improve circulation and connectivity through the project and, should the revised plan be approved, new impacts are not expected from those previously identified in the Draft EIR.
- D1-21: Refer to Response to Comment B1-3.
- D1-22: Refer to Response to Comment D1-10. Fencing adjacent to the preserve would be designed to minimize the impacts of people and vehicles on the preserve. Although not specifically intended to accommodate wildlife, preserve fencing would not impede wildlife movement because it would separate the developed portion of the site from the preserves. It would not segregate open space preserve areas that could foster wildlife movement.
- D1-23: This is a design-specific comment which does not comment on the Draft EIR. Design-related concerns will be addressed by staff and the Planning Commission during discussions about the project merits.

IV. DRAFT EIR REVISIONS

This chapter presents specific revisions to the text of the Draft EIR that are being made in response to comments, or to amplify and clarify material in the Draft EIR. Where revisions to the main text are called for, the page and paragraph are set forth, followed by the appropriate revision. Added text is indicated with underlined text. Deletions to text in the Draft EIR are shown with ~~strikeout~~. Page numbers correspond to the page numbers of the Draft EIR. None of the changes or clarifications present in this chapter significantly alters the conclusions or findings of the Draft EIR.

Page 1, second paragraph, is revised as follows:

B. PROPOSED PROJECT

The proposed project consists of two vesting tentative subdivision maps and related permits and approvals necessary for the implementation of the proposed subdivisions. Combined, the subdivisions would allow for the development of up to 679 residential units (409 single-family homes and 270 multi-family units) and up to approximately 25,000 square feet of leaseable commercial area. The project includes a request for a zone change and General Plan amendment to permit multi-family uses in an area currently designated for low density use. No specific commercial uses are proposed at this time. However, under allowable uses in CMC Title 19 (Zoning Ordinance), future commercial uses in the CN District may include the following “permitted” uses: residential uses on second floor and above, drug stores (4,000 square feet or less), grocery stores, retail stores, restaurants, banks and financial services (2,500 square feet or less), and business and professional offices. Uses subject to an “approved use permit” include: churches, indoor amusement centers, public and private schools, residential uses on the ground floor, alcoholic beverage establishments, drug stores (greater than 4,000 square feet), grocery stores, retail stores, restaurants, banks and financial services (greater than 4,000 square feet), gas stations, and personal “mini” storage facilities. The project also includes preservation, restoration and enhancement of approximately 56 acres of permanent open space at the north side of the site to reduce impacts to wetlands and to create a greenway along Sycamore Creek. (Approximately 4 acres of the preserve area would be used for stormwater ~~detention and treatment.~~) Consistent with Municipal Code Section 19.52.060, the open space preserve shall be rezoned OS1, Primary Open Space with a Resource Management (-RM) Overlay. A bike path would be located adjacent to the open space area, at the perimeter of the residential lots. The project also includes the abandonment of unbuilt portions of the previously dedicated rights-of-way for Mariposa Avenue and Lassen Avenue at the northwest and central portions of the site. The project would also abandon multiple irrevocable offers of street/easement dedications interior to the Mountain Vista subdivision. The project is described in greater detail in Chapter III, Project Description.

Pages 8 and 56, Mitigation Measure AIR-1, is revised as follows:

Mitigation Measure AIR-1: The following mitigation measures will be included in all future construction plans and documents for the subject parcels to reduce construction-related air quality impacts, as required by General Plan policy and the Butte County Air Quality Management District:

- Water all active construction areas at least twice daily. The frequency should be based on the type of operation, soil conditions, and wind exposure.
- If necessary, apply chemical soil stabilizers to inactive construction areas (disturbed areas that are unused for at least four consecutive days) to control dust emissions. Dust emissions should be controlled at the site for both active and inactive construction areas throughout the entire construction period (including holidays).
- Limit vehicle speeds to 15 mph on unpaved roads.
- Suspend land clearing, grading, earth moving, or excavation activities when wind speeds exceed 20 mph unless project areas are regularly watered down to control dust.

- If

Page 66, (2) **Threatened or Endangered Species.** Add the following text:

Giant Garter Snake. The giant garter snake (GGS) is federally-threatened species and State listed as threatened. GGS inhabits wetlands, irrigation and drainage canals, rice fields, marshes, sloughs, ponds, low-gradient streams, and adjacent uplands in the Central Valley (U.S. Fish and Wildlife Service 1999). The four essential habitat components for the giant garter snake include:

- adequate water during its active season (early spring through mid-fall);
- emergent, herbaceous wetland vegetation for foraging habitat and escape cover;
- upland habitat with grassy banks and openings in aquatic vegetation for basking; and
- upland habitat above the high-water line with burrows for overwintering (U.S. Fish and Wildlife Service 1999).

Giant garter snake does not inhabit large rivers or wetlands with sand, gravel, or rock substrates (U.S. Fish and Wildlife Service 1999).

Until recently, GGS has not been documented within the Chico area, and therefore, was not addressed in the biological analyses. However, several GGS occurrences have now been documented in the region where appropriate habitat conditions are present, although no occurrences have been noted within the project vicinity. Sycamore Creek is an ephemeral creek and does not provide habitat for GGS. As a result of the lack of habitat, GGS is not expected to occur within the project area, and will not be impacted by project improvements.

Pages 10 and 76-77, Mitigation Measure BIO-1, is revised as follows:

Mitigation Measure BIO-1:

This mitigation measure shall be accomplished at both on- and off-site locations. In concept, the plan will consist of three parts:

1. On-Site Creation. New vernal pools and swales shall be created within the 56-acre preserve area in the north portion of the project site. As functionally feasible due to existing topography, locations of existing pools, etc., the maximum acreage of vernal pools and swales will be created in an effort to attain the 1:1 creation ratio or as required by the Corps and USFWS permits.
2. On-Site Preservation and Enhancement. A total of 4.7 acres of vernal pools and swales shall be preserved within the 56-acre preserve area which shall be deeded as public open space. In addition, pools and swales disturbed from OHV or other uses shall be enhanced and restored as necessary. Restoration and enhancement will likely include minor grading and contouring of the pool/swale, or adjacent upland areas, in order to restore re-create the natural topography and hydrology. Restored wetland acreage shall be credited towards any creation/preservation acreage to attain the 1:1 creation ratio or as required by the Corps and USFWS permits.

3. *Off-Site Mitigation.* A total of 5.52 acres of vernal pools and swales shall be preserved at an off-site mitigation area to compensate for the balance of the project's impacts to vernal pools and swales at the typical 2:1 ratio or as required by the Corps and USFWS. The applicant has purchased a conservation easement at Hamilton Ranch, a property in Tehama County, for the purpose of providing the required off-site mitigation.

Pages 11 and 79, Mitigation Measure BIO-3, is revised as follows:

Mitigation Measure BIO-3: Prior to issuance of a grading permit or other project-related disturbance of the site, the applicant shall provide evidence that adequate mitigation has been provided for the loss of 110.26 acres of nonnative grassland that is suitable foraging habitat for Swainson's hawk. At a 0.5:1 ratio, mitigation for the loss of 110.26 acres of foraging habitat is 55.13 acres. Because 52.23 acres of habitat will be provided in the on-site preserve area, an additional 2.9 acres of nonnative grassland or other suitable foraging habitat shall be preserved at an off-site location. The applicant has purchased a conservation easement at Hamilton Ranch, a property in Tehama County, for the purpose of providing the required 2.9 acres of off-site mitigation.

Pages 12 and 79, Impact BIO-4, is revised as follows:

Impact BIO-4: Implementation of the proposed project ~~could~~ would impact potential nesting habitat for Swainson's hawk or other raptors. (S)

Page 19, paragraph 1, is revised as follows:

The Sycamore Glen subdivision totals approximately 88 acres on a parcel immediately east of and contiguous with the Mountain Vista subdivision. It is also bounded on the north by Sycamore Creek, on the east by Ceanothus Avenue and the new Foothill Park East development. The PG&E Sycamore Creek substation is located at the ~~southwest~~ east corner of the site, and an existing PG&E easement with overhead power lines is located along the southern boundary of the property. The property is all within Assessor's Parcel Number 016-200-067.

Page 19, Table III-1, row six, is revised as follows:

Open Space & ~~Stormwater~~ Stormwater Treatment

Page 19, paragraph 4, is revised as follows:

b. Proposed General Plan Amendment and Zone Change. The General Plan designation for 6.8 acres of the southern portion of the site would change from Low Density Residential (2.01 to 6 units per acre) to Medium-High Density Residential (MHDR) (14.01 to 22 ~~4.01 to 14~~ units per acre). The project . . .

Page 49, fifth paragraph, is revised as follows:

Winter conditions are characterized by occasional rainstorms interspersed with stagnant and sometimes foggy weather. Winter daytime temperatures average in the low 50s (10-12°C) and nighttime temperatures average in the upper 30s (2-4°C). During winter, north winds become more frequent, but winds from the south predominate. Rainfall occurs mainly from late October to early May, averaging 24 to 26 inches (60.96 to 66.04 cm) ~~17.2 inches (43.7 cm)~~ per year, but varies significantly each year.

Page 50, fourth and fifth full paragraphs, have been revised as follows:

In April 2003, the EPA was cleared by the White House Office of Management & Budget (OMB) to implement the eight-hour ground-level ozone standard. The EPA issued the proposed rule implementing the eight-hour ozone standard in April 2003 and issued the final eight-hour ozone nonattainment designations/boundaries on April 15, 2004. States will be provided three years, to April 2007, to develop eight-hour ozone State Implementation Plans (SIPs), following the final designations. States will need to demonstrate conformity by April 15, 2005, in eight-hour ozone nonattainment areas, given the one-year grace period following the final designations. Various areas in the State of California have different attainment dates based on their corresponding classification.

The eight-hour ozone implementation rule revokes the one-hour standard in April 2005. This will change the attainment status in some areas; however, it does not change any commitment each area made for attaining the one-hour ozone standard.

The EPA proposed a PM_{2.5} implementation rule in September 2003 and made final designations December 2004. The PM_{2.5} standard complements existing national and State AAQS that target the full range of inhalable PM₁₀. The ARB and local air districts are developing Air Quality Attainment Plans (AQAPs) for incorporation into SIPs to reduce unhealthful levels of PM_{2.5} in areas violating the new federal standards, and plans to issue the final rule implementing the eight-hour ozone standard in December 2003. The EPA is required by court order to complete final eight-hour ozone nonattainment status by April 15, 2004.

The EPA plans to propose a PM_{2.5} implementation rule in September 2003 and issues the final PM_{2.5} implementation rule in September 2004. The EPA is then expected to make final designations on December 15, 2004.

Despite great progress in air quality improvement, approximately 146 million people nationwide lived in counties with pollution levels above the NAAQS in 2002. Out of the 230 nonattainment areas identified during the 1990 Clean Air Act Amendment designation process, 124 areas remain as nonattainment today. In these nonattainment areas, however, the severity of air pollution episodes has decreased. Air quality in the Sacramento Valley Air Basin in the past twenty years has improved steadily and dramatically, even with the tremendous increase in population and vehicles and other sources.

The EPA adopted concentration standards for criteria pollutants that provide adequate margin of safety. These concentration standards were used to determine the attainment status for air

basins. Emission thresholds established by the air district are used to manage total regional emissions within an air basin based on the air basin attainment status for criteria pollutants. These emission thresholds were established for individual projects that would contribute to regional emissions and pollutant concentrations that may affect or delay the projected attainment target year for certain criteria pollutants.

Because of the conservative nature of the thresholds and the basin-wide context of an individual project's emissions, there is no direct correlation of a single project to localized health effects. One individual project having emissions exceeding a threshold does not necessarily result in adverse health effects for residents in the project vicinity. This is especially true when the criteria pollutants exceeding thresholds are those with regional effects, such as ozone precursors like NOx and ROG.

Based on the above discussion, the potential for an individual project to significantly deteriorate regional air quality or contribute to significant health risk is small, even if the emission thresholds are exceeded by the project. Because of the overall improvement trend on air quality in the air basin, it is unlikely the regional air quality or health risk would worsen from the current condition due to emissions from an individual project.

Page 52, second full paragraph, is revised as follows:

The Basin is in attainment or unclassified for ~~has attained~~ all federal standards with the exception of ozone. ~~The Basin is currently in a preliminary nonattainment area for the federal PM_{2.5} standard.~~ Under the California Clean Air Act, Butte County is a nonattainment area for ozone and PM₁₀. The county is either attainment or unclassified for other pollutants. The California Clean Air Act requires local air pollution control districts to prepare air quality attainment plans if any of the criteria pollutants does not attain the California standard. These plans must provide for district-wide emission reductions of five percent per year averaged over consecutive three-year periods or if not, provide for adoption of "all feasible measures on an expeditious schedule".

Page 68, sixth paragraph, is revised as follows:

b. Less-than-Significant Impacts. While the project would result in the fill of a total of 6.06 acres of wetlands on the project site, 4.7 acres (47.9 percent) of wetlands (existing vernal pools and swales) on the project site would be preserved and/or enhanced. These pools would be preserved in the northern one-third of the site (52.23 acres) as open space. (The open space preserve would total 56 acres, but approximately 4 acres would be impacted by the construction of stormwater ~~detention and~~ treatment basins. As such,

Page 98, tenth paragraph, is revised as follows:

(1) Alterations ~~Alternations~~ **to the Existing Drainage Pattern.** Implementation of the proposed project would result in development of the southern portion of the site with residential and commercial uses, while 56 acres in the northerly portion of the site south of Sycamore Creek would be preserved as open space.

Page 125, second paragraph and footnote, are revised as follows:

(5) Aircraft Operations. Aircraft overflights also contribute to the ambient noise levels in the project area. The proposed project is located approximately 7,250 feet southeast of the end of the primary runway (13L/31R) at Chico Municipal Airport. This location places the project site between the approach/departure flight path (along the extended centerline for the runway) and the Fire Attack Aircraft Departure Route. The Fire Attack Aircraft Departure Route directs aircraft approximately 1,800 feet north of the project site and the straight-out (beneath the extended runway centerline) approach/departure flight path is located approximately 1,800 feet west of the project site. The Chico General Plan identifies the west-central portion of the project site as being between the 55 and 60 dB CNEL airport noise contours (outside the 60dB CNEL contour). The eastern portion of the site (generally east of Mariposa Avenue) is outside of the 55 dB CNEL noise contour. However, on a “Peak Fire Attack Day” a greater portion of the project site is located within the 55 dB CNEL airport noise contours, and a small portion of the site in the southwest corner is located within the 60 dB CNEL zone.² Based on the recent noise monitoring at the site, single aircraft flyovers generate noise levels of up to 62 dBA L_{max} .

² Department of Transportation, Division of Aeronautics, Notice of Preparation comment letter, May 5~~3~~, 2003.

Page 134, third paragraph, is revised as follows:

In the Butte County Airport Land Use Compatibility Plan (ALUCP), single-family residential is considered “normally unacceptable” between the 55 and 60 dB CNEL airport noise contours. Multi-family residential uses are considered “marginally compatible acceptable” within the 55 dB CNEL contour and “normally unacceptable” within the 60 dB CNEL contour.² Because the site falls within the ALUCP, the Airport Land Use Commission will also review the project for consistency. The ALUCP’s Exhibit 4F, which depicts the future noise contours, is shown in Figure IV.H-2.

Page 168, third paragraph, is revised as follows:

An existing PG&E electrical substation is located on the southeast corner of Eaton Road and Mariposa. PG&E transmission lines carry high voltage electricity to the substation at 115 kV. Nine Ten-distribution lines carry electricity from 12 kV circuits, located within a 40-foot wide easement along the south property line. Four of these circuits are overhead and six circuits are underground. PG&E has no current plans to expand this substation. PG&E has plans to install a 6-inch gas distribution main in the proposed Eaton Road right-of-way.

Page 169, seventh paragraph, is revised as follows:

(3) Gas and Electricity. The project’s 680 residential units and 25,000 square feet of commercial uses would increase demand for electricity and gas. PG&E does not foresee

any difficulties in providing electricity or gas to the proposed project ~~and does not expect the need for a new electrical substation.~~⁴ Load analysis would be performed upon formal application by the project developers.⁵

Page 174, Table V-1, line six, is revised as follows:

Open Space & Stormwater ~~Stormwater~~ Treatment

Page 177, Table V-2, line six, is revised as follows:

Open Space & Stormwater ~~Stormwater~~ Treatment

V. PUBLIC NOTICE FOR A DEPARTMENT OF ARMY PERMIT

June 20, 2005

Subject: Public Notice for a Department of the Army Permit

The U.S. Army Corps of Engineers Sacramento District has posted Public Notice 200400544 to <http://www.spk.usace.army.mil/regulatory.html>

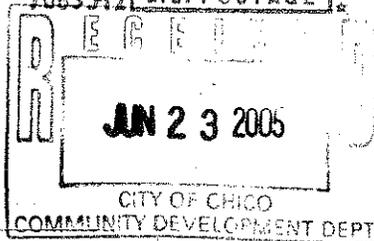
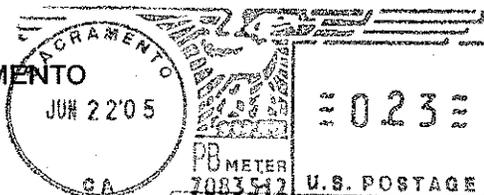
Mr. Pete Giampaoli of Epick/AP Associates has applied for a permit to place dredged or fill material and/or work in approximately 6.28-acres of waters of the United States to construct the Sycamore Glen Mountain Vista project, which is a residential subdivision that will consist of single and multiple family residents along with a commercial use area and a large open space preserve. There are 12.70-acres of waters of the United States located within the project site. This project is located in Butte County, California, Section 11 And 12, Township 22 North, Range 1 East.

Written comments and/or a request for a paper copy of the notice may be submitted to Laura Whitney at the letterhead address, 916-557 7455, Laura.A.Whitney@usace.army.mil.

Comments must be received by Friday, July 22, 2005.

DEPARTMENT OF THE ARMY
US ARMY ENGINEER DISTRICT SACRAMENTO
CORPS OF ENGINEERS
REGULATORY BRANCH
1325 J STREET
SACRAMENTO CA 95814-2922

OFFICIAL BUSINESS



PUBLIC NOTICE

CITY OF CHICO
 PO BOX 3420
 CHICO CA 95927-3420

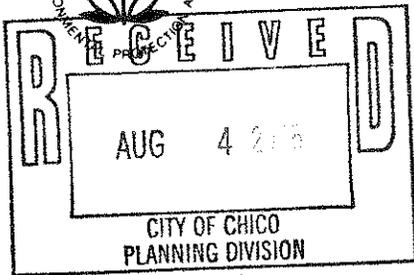
DATE _____ CH _____ ACM _____ CA _____
 ACDD _____ HO _____ PLD _____
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 M-M _____ PM-W _____ AA-K _____
 DPW _____ ADPW-E _____ OTHER _____
 BINDER _____ TF _____



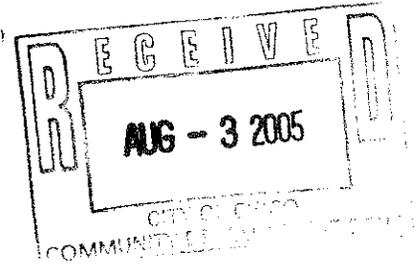
UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION IX

75 Hawthorne Street
San Francisco, CA 94105-3901



JUL 29 2005



Colonel Ronald N. Light
District Engineer
U.S. Army Corps of Engineers
Sacramento District
1325 J Street, 14th floor
Sacramento, California 95814-2922

DATE _____ CM _____ ACM _____ CA _____
ACDD HO _____ BO _____ PLD
PP _____ SP-H _____ SP-M _____ SP-S _____
PM-M _____ PM-W _____ AA-K _____
DPW _____ ADPW-E _____ OTHER CDD / Bob Summerville
FILE _____ BINDER _____ TF _____

Subject: Public Notice (PN) 200400544 for the proposed Sycamore Glen Mountain Vista subdivision, Chico, Butte County, California

Dear Colonel Light:

Thank you for the opportunity to review Public Notice (PN) 200400544 dated 20 June 2005 regarding the proposed Sycamore Glen/Mountain Vista subdivision (the project) in Chico, CA, and for the extension of time your staff has granted us to submit our comments. The project as proposed would result in the permanent loss of 6.28 acres of waters of the United States (waters) in or adjacent to Sycamore Creek, including vernal pools. The following comments have been prepared under the authority of, and in accordance with, the provisions of the Federal Guidelines (40 CFR 230) promulgated under section 404(b)(1) of the Clean Water Act (CWA). As outlined in these comments, the proposed project does not comply with EPA's 404(b)(1) Guidelines (Guidelines) and we recommend permit denial.

Project Description

According to the PN, the project is proposed on a 168-acre site characterized by a mosaic of 12.7 acres of vernal pools and swales. Sycamore Creek flows along the project's northern boundary, and the site is dominated by a very large, centrally-located "playa" vernal pool, characterized by its own soil type. No fewer than eight federally-listed threatened or endangered species are likely to be impacted by the project, including the endangered vernal pool tadpole shrimp, endangered Butte County meadowfoam, and two listed species of Orcutt grass.

Compliance with the Clean Water Act §404(b)(1) Guidelines

The Guidelines describe a series of independent tests against which a proposed discharge must be evaluated (40 CFR 230.10 (a)-(d)). As currently proposed, we cannot determine whether the applicant's preferred alternative represents the LEDPA (40 CFR 230.10(a)), or complies with any of the other restrictions on discharges.

Analysis of Alternatives -- 40 CFR 230.10(a)

The regulations state that no discharge of dredged or fill material shall be permitted if there is a practicable alternative to the proposed discharge which would have less adverse impact on the aquatic ecosystem, so long as the alternative does not have other significant adverse environmental consequences (40 CFR 230.10(a)). It is incumbent upon the permit applicant to clearly demonstrate that the proposed project represents the least environmentally damaging practicable alternative (LEDPA) that achieves the basic project purpose, plus the costs, technical, and logistical feasibility factors associated with that basic purpose. The Guidelines further state projects that are not "water-dependent" (*e.g.*, residential subdivisions) which propose to fill special aquatic sites (*e.g.*, vernal pool wetlands), practicable alternatives are presumed to exist, unless the applicant can clearly demonstrate otherwise.

The Corps has identified the overall project purpose for Sycamore Glen/Mountain Vista as "single-family and multi-family housing." This project purpose defines the framework under which a range of practicable alternatives must be evaluated. Unfortunately, the Alternatives Analysis (AA) provided to EPA by the applicant bases its practicability assessments upon an inappropriately narrow project purpose and overly restrictive screening criteria. The applicant has not successfully rebutted the regulatory presumption that a residential development can be practicably developed on uplands within a reasonable market area near Chico, CA.

The AA correctly identifies the regulatory criteria for practicability as "...costs, existing technology, and logistics in light of overall project purposes" (AA p. 1). However, it is not clear whether the applicant understands that alternatives are not automatically rendered impracticable simply because they are more logistically difficult, or more expensive, than the preferred alternative. For example, the AA's primary screening criteria includes location within Chico and an acreage of a "suitable" amount, but provides no justification for these criteria beyond being "important to the project" (AA p. 13). The AA makes no substantive argument that a project in a nearby municipality, in unincorporated areas, or with a footprint less than 121 acres is impracticable. We believe that (1) the site selected needn't be within the city of Chico limits to practicably serve the Chico area; (2) that smaller, less damaging projects may be practicable; and (3) that available parcels are likely to be more abundant than indicated in the AA once screening criteria are appropriately applied.

"Secondary" screening criteria listed in the AA include conformance with local government planning goals (including "in-fill" development policies) and ready accessibility to established municipal infrastructure. As a consequence, many parcels were rejected out of hand from further consideration because they did not have certain City land use designations. When harmonized with the requirements of state and federal regulations, including the 404(b)(1) Guidelines, local planning policies and General Plans can be a valuable tool in guiding environmentally-sensitive land use. However, local zoning and policies are frequently modified, may conflict with federal environmental or public health concerns, and cannot subordinate the substantive requirements of the Clean Water Act. "Conformance with local land use planning and policies" (AA p. 14),

while desirable in certain circumstances, is not an appropriate screening criterion under the Guidelines.

As to the specific planning policy related to “in-fill” development, we agree that it is preferable to concentrate development where it already exists. However, incorporation of this screening criterion as an outgrowth of reliance on the City’s General Plan is not appropriate under the Guidelines. To truly focus development on in-fill and dovetail this local goal with federal regulations, we recommend that the possibility of redevelopment of vacant or previously developed parcels closer to the urban core be fully explored before sites containing intact aquatic resources are considered. If redevelopment ultimately proves impracticable, we recommend sites which do not contain waters, or where avoidance of waters is practicable, be evaluated across a wider geographic area. We encourage the applicant to explore “smart growth” principles in reconsidering project designs. EPA’s “smart growth” policy, which can be found at our website¹, provides a wealth of information and links to recent advances and resources in this field.

In sum, practicable, off-site alternatives meeting the overall project purpose (single-family and multi-family housing) were not adequately vetted and brought forward for analysis in the applicant’s AA. With regard to the alternative sites that are identified in the AA, it has not been satisfactorily demonstrated that they are impracticable, or more environmentally damaging to the aquatic ecosystem.

Finally, the applicant has not successfully demonstrated that further on-site avoidance is impracticable. According to the PN and the AA, project designs include the destruction of half of the aquatic resources on site, and adverse modification of much of the functions of the waters that remain. However, on-site “Alternative 2 - Biological Resources Alternative,” appears to be practicable, and substantially less damaging than the current proposal. The AA makes no independently-verifiable argument that higher densities, fewer lots and/or reconfiguration of the project footprint is impracticable based on specific costs, technical or logistical reasons.

Water Quality – 40 CFR 230.10(b)

The proposed project presents a variety of unquantified threats to the water quality of Sycamore Creek, its associated wetland ecosystems, and ultimately, the Sacramento River. Specifically, the aquatic ecosystem will be impaired by altered hydrological processes, the increase in the velocity and volume of stormwater flows from an increase in impermeable surfaces, and the discharge of pollutants into receiving waters.

Endangered Species – 40 CFR 230.10(b)

As the PN and correspondence from the U.S. Fish and Wildlife Service (FWS) state, the proposed action may affect several federally-listed endangered or threatened species and/or their

¹ <http://www.epa.gov/smartgrowth>

critical habitat. On 10 May 2004 the FWS wrote to the Corps regarding the Corps' request for consultation under Section 7 of the Endangered Species Act (ESA). This letter indicated that substantial additional information would be required for the FWS to render a Biological Opinion, including protocol-level surveys from two seasons within a five-year period for Butte County meadowfoam. Given the number of species potentially affected at this site, and numerous concerns raised by FWS over the lack of information regarding potential impacts to listed species, the decision to apply for a 404 permit appears to have been premature. Pursuant to the regulations, no 404 permit may be issued until ESA consultation is concluded with the recommendation of reasonable and prudent measures to protect listed species.

Significant Degradation – 40 CFR 230.10(c)

As proposed, the Sycamore Glen Mountain Vista project would both cause (by destroying or adversely altering half of the onsite waters) and contribute to (by increasing regional cumulative losses) significant degradation of waters of the U.S. These projects would result in the loss of increasingly rare wetlands and endangered species habitat and are likely to significantly degrade the key environmental elements considered by the Guidelines (*e.g.*, life stages of aquatic species and other wildlife; the stability of aquatic ecosystems including loss of habitat, nutrient assimilation, and water purification functions; and recreational, aesthetic, and economic values).

Mitigation – 40 CFR 230.10(d)

Mitigation of project impacts begins with the avoidance and minimization of direct, secondary and cumulative impacts to the aquatic ecosystem, followed by compensatory measures if a "net loss" of aquatic functions and/or acreage is unavoidable. As discussed above, the proposed project has not demonstrated that impacts to waters have been avoided to the maximum extent practicable. Although it is premature to consider compensatory mitigation before compliance with 40 CFR 230.10(a) is established regarding an alternatives analysis, EPA offers the following comments with regard to the applicant's proposed mitigation strategy, as discussed briefly in the PN and subsequently through personal communications between agency staff.

In addition to the destruction of half the acreage of waters on the site, the project contemplates significant alteration of hydrologic processes within the vernal pool micro-watershed adjacent to Sycamore Creek via stormwater management structures and fills truncating wetland connectivity. For compensation, the PN refers to an unspecified acreage of proposed on-site restoration and preservation of wetlands. In the event development of this site occurs, we recommend the following minimum standards for mitigation ratios: for direct impacts, 1:1 creation-to-loss *and* 2:1 preservation-to-loss; for indirect impacts, 1:1 creation-to-loss *and* 1:1 preservation-to-loss. In addition, any mitigation lands must be protected in perpetuity through robust legal mechanisms, monitoring plans, and appropriate financial endowments to support these efforts.

The applicant has also proposed unspecified mitigation activities at a location known as Hamilton Ranch, well off-site in Tehama county. FWS has expressed concern regarding this site's suitability for mitigation under ESA, and the site has not been evaluated for the presence and functional status of waters by the Corps. Any off-site and/or out-of-kind proposals are not

likely to be adequate to ensure that the proposed losses of acreage and function are adequately recovered, and the lack of specificity with regard to the applicant's overall mitigation plan is troubling.

Recently, the Mitigation Action Plan and the associated Regulatory Guidance letter (RGL 02-2) encouraged integrating compensatory mitigation into a watershed context. We believe the applicant could not only avoid more aquatic resources and minimize onsite impacts, but that they have likely not exhausted mitigation options within the Sycamore Creek watershed, or Butte County.

Recommendation

We respectfully recommend the Corps deny a §404 permit until the applicant has resolved the above regulatory compliance concerns. Under "Findings of Compliance and Non-Compliance" at 40 CFR 230.12(a)(3)(iii-iv) of the Guidelines, a finding of non-compliance (permit denial) is required if there is insufficient information to determine if the project complies, including clear demonstration that the project, as proposed, is the LEDPA. Based on the information in the PN and the AA, the applicant has not satisfactorily demonstrated that their project complies with any of the restrictions on discharges outlined by the Guidelines.

Thank you for considering our concerns and recommendations. If you wish to discuss this matter, please contact Jason Brush of my staff at (415) 972-3483.

Sincerely,



Tim Vendlinski, Supervisor
Wetlands Regulatory Office

cc:

U.S. Fish and Wildlife Service, Sacramento, Attn: Rick Kuyper
National Marine Fisheries Service, Sacramento
Central Valley RWQCB, Sacramento
California Department of Fish and Game, Sacramento
City of Chico
Butte County Planning Department



United States Department of the Interior

FISH AND WILDLIFE SERVICE

Sacramento Fish and Wildlife Office
2800 Cottage Way, Room W-2605
Sacramento, California 95825-1846



In reply refer to:
1-1-05-I-1090

MAY 10 2005

Mr. Thomas J. Cavanaugh
Chief, Sacramento Valley Office
U.S. Army Corps of Engineers
1325 J Street
Sacramento, California 95814-2922

Subject: Request for Additional Information for the Proposed Sycamore Glen Mountain Vista Subdivisions Project (Corps File Number 200400544), Butte County, California

Dear Mr. Cavanaugh:

This letter is in response to your April 19, 2005, letter requesting formal consultation, pursuant to section 7(a) of the Endangered Species Act of 1973, as amended (Act), on the proposed Sycamore Glen Mountain Vista Subdivisions project (proposed project) in Butte County, California. The U.S. Fish and Wildlife Service (Service) received your request on April 22, 2005. At issue are the potential effects of the proposed project on the threatened vernal pool fairy shrimp (*Branchinecta lynchi*), the endangered vernal pool tadpole shrimp (*Lepidurus packardii*), Conservancy fairy shrimp (*Branchinecta conservatio*) (vernal pool crustaceans), the endangered Butte County meadowfoam (*Limnanthes floccose* ssp. *californica*), the endangered Greene's tuctoria (*Tuctoria greenei*), the endangered hairy Orcutt grass (*Orcuttia pilosa*), the threatened slender Orcutt grass (*O. tenuis*), and the threatened Hoover's spurge (*Chamaesyce hooveri*).

The Service has reviewed the following documents: (1) the March 15, 2005, *Sycamore Glen/Mountain Vista Subdivisions Section 7 Biological Assessment* (Biological Assessment); (2) your April 19, 2005, letter requesting formal consultation; and (3) other information available to the Service. The Service has not received all of the information necessary to initiate formal consultation on the proposed project as outlined in the regulations governing interagency consultations (50 CFR §402.14). The supporting documentation for the proposed project does not contain a level of detail sufficient to prepare a biological opinion. To complete the initiation package, we will require the following:

TAKE PRIDE
IN AMERICA 

1. The Biological Assessment indicated that Foothill Associates performed surveys for the endangered Butte County meadowfoam in 1997. The Biological Assessment also states that a reconnaissance-level survey for Butte County meadowfoam was performed in 2003, but that this survey was not an exhaustive survey, and was only performed to determine if conditions onsite were similar to those observed in 1997. Occurrences of Butte County meadowfoam are dynamic in nature, and may be observed in some years and not others. Because of this specie's dynamic nature, the Service typically requires that two protocol-level surveys be performed within the past five years to determine presence or absence of this species. The surveys performed in 1997 were performed eight years ago, and the 2003 surveys do not appear to have been performed at protocol-levels for this species. Therefore, the Service does not accept Foothill Associates determination of absence and we request two protocol-level surveys to determine presence/absence for this species.

Other federally-listed plants that may occur within the proposed project area include the endangered Greene's tuctoria, the endangered hairy Orcutt grass, the threatened slender Orcutt grass, and the threatened Hoover's spurge. Protocol-level surveys are required to make a presence/absence determination for these special-status plant species. If protocol-level surveys have been conducted, please provide specific dates of when they were performed, the names and qualifications of the surveyors, what reference occurrences or populations were used, and what areas were specifically surveyed for each species.

2. The Service is unable to quantify in acres the amount of indirect effects to the federally-listed vernal pool crustacean habitat. The Service has determined that all vernal pool habitat within 250 feet of the proposed construction will likely incur indirect effects due to increases in human intrusion, increases in invasive and non-native plant species, and possible changes in hydrologic regimes. The Service requests that the project applicant provide a wetland delineation map of the proposed project area showing the acreages of each wetland feature, as well as topographic features with a scale of 1"=200' showing all vernal pools and swales (ephemeral drainages) and other wetlands within and adjacent to the project site within 250 feet.
3. The Biological Assessment states that direct and indirect effects resulting from the proposed Eaton Road extension, which is adjacent to the proposed project, will be compensated for by the City of Chico. The Service has determined that if a project directly or indirectly affects habitat for a federally-listed species, then the same project will need to adequately compensate for these effects, regardless of projects that are anticipated to be built in the future. Please include a discussion of compensation and conservation measures that will offset direct and indirect effects to habitat for federally-listed species within 250 feet of the proposed project area, including the Eaton Road extension area.
4. The project applicant has proposed a 56-acre vernal pool preserve onsite to compensate for the loss of federally-listed vernal pool crustacean habitat. Before issuance of a biological opinion for the proposed project, this onsite preserve would require a Service-

approved conservation easement to designate the area as a vernal pool preserve and for it to be managed in perpetuity for the protection of federally-listed vernal pool species. The easement would need to be held by a third party approved by the Service.

Additionally, the proposed preserve would require a Service-approved management and monitoring plan and a Service-approved endowment fund to fully fund the maintenance, management, and monitoring of the onsite preserve. The Service may determine that vernal pools within 250 feet of the proposed construction activities will not be acceptable for use as compensation for adverse effects to vernal pool species. Therefore, the Service requests the project applicant provide additional information regarding how they propose to fulfill these requirements for the proposed preserve.

5. The project applicant has also proposed to preserve vernal pool habitat at the 400-acre Hamilton Ranch site, located approximately 18 miles northwest of the proposed project site. At this time, the Service does not have adequate information regarding this site to determine the site's suitability to compensate for the proposed project's adverse effects to federally-listed species. In order to make this determination, we request a complete qualitative and quantitative description of the vernal pool habitat found onsite; a description of known occurrences of federally-listed species found onsite; a description of current and reasonably foreseeable future land uses within the Hamilton Ranch site; and on adjacent properties, and an endowment fund, management and monitoring plan, and conservation easement, as described above for the proposed 56-acre onsite preserve. The Service may determine that it would be more biologically appropriate for the project applicant to purchase vernal pool preservation acres at a Service-approved vernal pool conservation bank.
6. The project applicant has proposed to use a portion of the proposed 56-acre preserve to create federally-listed vernal pool crustacean habitat. The Service does not have adequate information regarding the site's potential for successful creation of vernal pool habitat. Please provide information regarding the exact locations of the proposed created pools, construction methods, as well as a description of the maintenance, monitoring, and success criteria for the created vernal pools. In addition, please provide detailed soils information, including the presence and integrity of aquatard and depth to aquatard. The Service may determine that it would be more biologically appropriate for the project applicant to purchase vernal pool creation acres at a Service-approved vernal pool conservation bank.
7. The proposed project site is within the known range of Conservancy fairy shrimp, and the site may contain suitable habitat for this species. The Biological Assessment does not address this species. Please provide additional information regarding potential Conservancy fairy shrimp habitat found within the project site. Due to the rare nature of Conservancy fairy shrimp, it is not acceptable to presume presence for this species. If the Service determines that suitable habitat is present within the proposed project site, then protocol-level surveys will need to be performed for this species.

Mr. Thomas Cavanaugh

4

Until we receive all of the information needed, the Service will not begin the formal consultation process for the proposed Sycamore Glen Mountain Vista Subdivisions project. If you have any questions or concerns, please contact Rick Kuyper or the Acting Sacramento Valley Branch Chief at (916) 414-6645.

Sincerely,

A handwritten signature in black ink that reads "Peter A. Cross". The signature is written in a cursive style with a large initial "P" and a long, sweeping underline.

Peter A. Cross
Chief, Endangered Species Division

cc:

Jason Brush, U.S. Environmental Protection Agency, San Francisco, California
Jenny Marr, California Department of Fish Game, Chico, California
Tony Baptiste, City of Chico Community Development Department, Chico, California

RESOLUTION NO. 99-07

RESOLUTION OF THE CITY OF CHICO CITY COUNCIL
CERTIFYING THE ADEQUACY OF THE FINAL ENVIRONMENTAL IMPACT REPORT,
MAKING FINDINGS REGARDING ENVIRONMENTAL EFFECTS, ADOPTING A
STATEMENT OF OVERRIDING CONSIDERATIONS, AND ADOPTING A MITIGATION
AND MONITORING PLAN FOR THE
MOUNTAIN VISTA/SYCAMORE GLEN SUBDIVISIONS AND
GENERAL PLAN AMENDMENT/REZONE 04-08
(State Clearinghouse Number 2003042068)

WHEREAS, applications have been submitted to the City for a General Plan amendment, rezone, and two adjacent vesting tentative subdivision maps, located on 178 acres generally bounded by Floral Avenue on the west, Sycamore Creek on the north, Ceanothus Avenue on the east, and on the south by an existing Pacific Gas and Electric (PG&E) easement with electrical lines, APNs 016-200-067, -069, -070, -071, and -072 ("the Project"); and

WHEREAS, an environmental impact report (EIR) has been prepared for the Project pursuant to the California Environmental Quality Act (CEQA); and

WHEREAS, a Notice of Completion/Notice of Availability for the draft environmental impact report (DEIR) was published in a newspaper of general circulation within the City; and

WHEREAS, the review and comment period on the DEIR began December 15, 2004 and ended February 7, 2005; and

WHEREAS, a final environmental impact report (FEIR) was prepared in accordance with CEQA to respond to all comments submitted during the DEIR review period, and to fully address all potential effects of implementation of the Project; and

WHEREAS, the FEIR, which includes responses to comments received on the DEIR, was forwarded to all interested and commenting parties no less than 10 days prior to the date established for the City Council meeting to consider and certify the FEIR; and

WHEREAS, a Revised Final Environmental Impact Report (RFEIR) Memorandum was prepared to describe changes to the project which do not result in any new environmental impacts, and the RFEIR Memorandum, together with the DEIR and the FEIR constitute the EIR for the proposed project; and

DATE AGENDA 7/11/07 COUNCIL
ADD. INFO CM ACM CA
GSD CSD ISD CLK PLD ✓
ENG HRM FIN D COP FC
FILE OTHER SUBMIT

1 WHEREAS, the RFEIR included a Revised Mitigation Monitoring and Reporting
2 Program that eliminated the requirement for sound walls along the Project's Floral Avenue and
3 Eaton Road frontages and reduced the number of storm water drainage basins and related
4 culverts, thereby reducing potential impacts to biological and cultural resources; and

5 WHEREAS, the RFEIR was forwarded to all interested and commenting parties no less
6 than 10 days prior to the date established for the Planning Commission meeting to consider and
7 recommend that the City Council certify the EIR; and

8 WHEREAS, notice of the City Council meeting at which the EIR would be considered
9 was also forwarded to all interested and commenting parties; and

10 WHEREAS, the City Council considered the EIR on July 17, 2007; and

11 WHEREAS, the City Council has independently reviewed, analyzed and considered the
12 EIR, all written comments and testimony received from affected agencies and members of the
13 public; and

14 WHEREAS, the City Council, exercising its independent judgment on the EIR, is now
15 prepared to consider the adequacy of that document, all in a manner provided for by CEQA.

16 NOW, THEREFORE, BE IT RESOLVED BY THE CITY COUNCIL OF THE CITY OF
17 CHICO:

18 Section 1: Definitions. For the purpose of this resolution, the following definitions
19 shall apply:

20 A. "Administrative Record" means the following documents and records:

- 21 1. The EIR, as defined herein;
- 22 2. The City of Chico General Plan and all amendments;
- 23 3. All materials listed as references in the EIR;
- 24 4. All non-draft and non-confidential reports and memoranda prepared by City
25 staff and consultants regarding the project; and
- 26 5. All correspondence, documentary evidence and other materials regarding the
27 project submitted to the City.

28 B. "CEQA" means the California Environmental Quality Act (California Public

1 Resources Code section 21000 et seq.)

2 C. "City" means the City of Chico.

3 D. "EIR" means the Draft Environmental Impact Report for the Mountain
4 Vista/Sycamore Glen Subdivisions and General Plan Amendment/Rezone 04-08 Project,
5 Chico, California (November 2004), the Final Environmental Impact Report (December
6 2005), the Revised Final Environmental Impact Report Memorandum (May, 2007), and
7 all appendices and attachments to the draft and final environmental impact reports.

8 E. "Mitigation Monitoring Program" means the revised mitigation monitoring program,
9 (Exhibit I, date stamped June 7, 2007).

10 F. "Project" means the subdivision of a vacant, 178-acre site comprised of two adjacent
11 vesting tentative subdivision maps for the development of up to 679 residential units (409
12 single-family homes and 270 multi-family units), up to 25,000 square feet of
13 neighborhood commercial building area, and the dedication of approximately 56 acres of
14 permanent open space to the City of Chico for the preservation, restoration, and
15 enhancement of wetland resources along the south side of Sycamore Creek. "Project"
16 also includes a General Plan Amendment to change the land use designations of the site
17 from 111.53 acres of Low Density Residential, 45.33 acres of Medium-High Density
18 Residential, and 12.73 acres of Park to 67 acres of Low Density Residential, 27 acres of
19 Medium Density Residential, 15 acres of Medium-High Density Residential, 2.6 acres of
20 Mixed-Use Neighborhood Core, 3 acres of Park, and 55 acres of Open Space for
21 Environmental Conservation and Safety, and the rezoning of the site from 83.15 acres of
22 PMU Planned Mixed Use and 86.45 acres of R1 Low Density Residential to 67 acres of
23 R1 Low Density Residential, 25 acres of R2 Medium Density Residential, 2 acres of R2-
24 PD Medium Density Residential-Planned Development overlay, 15 acres of R3-PD
25 Medium-High Density Residential-PD Planned Development overlay, 2.6 acres of CN-
26 PD Neighborhood Commercial-Planned Development overlay, 55 acres of OS1 Primary
27 Open Space, and 3 acres of OS2 Secondary Open Space.

28 G. "BCAQMD" means Butte County Air Quality Management District.

1 H. "CDFG" means the California Department of Fish and Game.

2 I. "USFWS" means the United States Fish and Wildlife Service.

3 Section 2: Certification of the EIR. Having independently considered the EIR, the
4 City Council hereby certifies that the EIR has been prepared, circulated for agency and public
5 review, and completed in compliance with the requirements of CEQA and fully and adequately
6 discloses and addresses all environmental issues known to be associated with the project.

7 Section 3: General Findings. The City Council makes the following general findings
8 based upon the evidence in the EIR, or elsewhere in the record of these proceedings:

9 A. The City of Chico is the lead agency for the Project. In considering the EIR, the City
10 has discharged its responsibility as the lead agency in conformance with CEQA and
11 the CEQA Guidelines.

12 B. The Project alternatives do not meet the key Project objectives and are rejected for the
13 reasons set forth in the EIR and this Resolution.

14 C. The EIR identifies potentially significant environmental effects that may be caused by
15 the Project and sets forth mitigation measures that can avoid or substantially lessen all
16 of those impacts to a level of less than significant, except that the cumulative air
17 emissions from the Project and other reasonably foreseeable projects would contribute
18 to non-attainment of air quality standards in the Chico area and this impact would
19 remain significant and unavoidable.

20 D. The Mitigation Monitoring Program prepared for the Project meets the requirements
21 and intent of California Public Resources Code section 21081.6 for mitigation
22 monitoring.

23 E. The one environmental impact which is identified in the EIR as significant and
24 unavoidable is the proper subject of a statement of overriding considerations, as set
25 forth in Section 6 of this resolution.

26 F. The City is the custodian of all materials that constitute the Administrative Record for
27 the Project and these proceedings.

28 Section 4. Special Findings Regarding Project Alternatives. The Alternatives section of

1 the EIR evaluated three scenarios: 1) the CEQA-Required No Project/No Build Alternative, 2)
2 the No Project/General Plan Alternative, and 3) the Biological Resources Alternative. Each of
3 these were analyzed to compare the environmental effects of the specific alternative with those of
4 the Project and the extent to which each alternative would meet the objectives of the Project.
5 Based on this analysis, the EIR found that of the three alternatives analyzed above, only the No
6 Project/No Build alternative would avoid the significant air quality impacts of the project. This
7 is because no air quality impacts from construction or long-term operational air quality impacts
8 would result. However this alternative would not meet any of the project objectives. Both the
9 No Project/General Plan alternative, and the Biological Resources alternative would meet the
10 project objectives. Of these two alternatives that would result in development of the site, the
11 Biological Resources alternative would be considered the environmentally superior alternative,
12 because it would have fewer impacts than the proposed project, primarily due to the fewer
13 number of units that would be built. In addition, it would result in fewer impacts to biological
14 resources.

15 A. The No Project/No Build Alternative. The No Project/No Build alternative assumes
16 that the project would not be built and the property would remain in its existing state.
17 Under this alternative, the wetlands/vernal pool habitat would remain on-site;
18 however, it is expected that the site would continue to be degraded by off-road vehicle
19 use, and the planned Eaton Road Extension project would eventually be constructed,
20 extending the roadway through the southern portion of the site.

21 Only the No Project/No Build alternative would avoid the significant air quality
22 impacts of the project. This is because no air quality impacts from construction or
23 long-term operational air quality impacts would result. However this alternative
24 would not meet any of the project objectives and would not implement the City
25 General Plan and Housing Element which call for the development of the site for
26 residential and commercial purposes. For these reasons, the No Project/No Build
27 Alternative is rejected.

28 B. No Project/General Plan Alternative. This alternative assumes that the project would

1 be developed consistent with the existing General Plan designations, so there would
2 be no General Plan Amendment to allow multi-family development on the Sycamore
3 Glen site and no multi-family south of the Eaton Road extension. As such, the
4 eastern portion of the site would be developed with 234 single-family homes, within
5 the same development area as the proposed project. The Mountain Vista site would
6 be developed consistent with 396 multi-family residential units (density of 18 du/ac)
7 and 168 single-family homes (density of 6 du/ac). Similar to the proposed project, a
8 2-acre neighborhood commercial site would be included at the northeast corner of
9 Floral Avenue and Eaton Road. Two areas of open space would be preserved within
10 the Mountain Vista site along Sycamore Creek, and in the central portion of the site,
11 dividing the single-family and multi-family areas. Active recreational uses may be
12 permitted on the area designated Park on the Mountain Vista site along the south side
13 of Sycamore Creek. Table V-1 includes a land use summary of the alternative. In
14 total, this alternative would have 798 dwelling units. Approximately the same
15 amount of open space would be preserved as the proposed project. In addition, it is
16 assumed that this alternative would also result in some off-site preservation of habitat
17 to mitigate for impacts to resources on-site.

18 Like the proposed project, this alternative would result in development of the site
19 and impacts would be similar to the proposed project in the areas of Aesthetics,
20 Cultural Resources, Hazards and Hazardous Materials, and Hydrology.

21 In the area of Air Quality, because this alternative would result in development of
22 the site, construction impacts would be similar to the proposed project. However,
23 operational emissions from vehicle traffic and other sources would be greater than the
24 proposed project (due to the greater number of units), and would therefore not avoid
25 the project's significant air quality impacts.

26 In the area of Biological Resources, while this alternative would preserve a similar
27 amount of open space as the proposed project, it would break up the open space
28 preserve within the Mountain Vista subdivision, reducing the connectivity of the

1 habitat, and making it less valuable for biological resources. In addition, active
2 recreational uses may be permitted, or permitted subject to the issuance of a use
3 permit, in the area designated Park along the south side of Sycamore Creek,
4 potentially impacting riparian habitat value. Therefore, this alternative would have
5 greater impacts to biological resources. However, like the project, it is assumed that
6 such impacts could be mitigated to less-than-significant levels through on-site and
7 off-site mitigation.

8 In the area of Land Use, this alternative would avoid the need for a General Plan
9 Amendment, but it would concentrate all of the project's multi-family housing in the
10 Mountain Vista portion of the site, around the proposed neighborhood commercial
11 site. Due to the mix of open space and housing within the proposed Mountain Vista
12 subdivision, this alternative may not meet the General Plan's Continuity and
13 Connection policies as well as the proposed project. This alternative would provide a
14 greater number of multi-family units, which may be seen as more consistent with the
15 General Plan for the Mountain Vista portion. Because this alternative is consistent
16 with the General Plan land use designations, and it would provide more multi-family
17 housing, it would have fewer land use impacts than the proposed project.

18 In the areas of Noise, Public Services, Transportation and Circulation, and
19 Utilities, because this alternative would result in 119 more dwelling units than the
20 proposed project, this alternative would have greater impacts than the proposed
21 project. Since this alternative results in an overall greater number of impacts than the
22 proposed project, the No Project/General Plan Alternative is rejected.

23 C. Biological Resources Alternative. This alternative assumes that the majority of the
24 site would be preserved as open space to minimize impacts to the wetlands and other
25 sensitive biological resources on the project site. The development area has been
26 delineated to minimize impacts to the majority of the vernal pool and swale system,
27 especially in those areas where special status species have been identified. To offset
28 the cost of preserving and restoring habitat on three-quarters of the site, and to pro-

1 vide needed housing in the City, while still trying to fulfill the property owners'
2 objectives for the project, 506 units of high density multi-family housing would be
3 built along the Eaton Road corridor, and a neighborhood commercial site would be
4 built at the corner of Eaton Road and Floral Avenue. In addition, 50 single-family
5 homes would be built at the northwest corner of the site. Due to the amount of on-site
6 preservation and restoration, it is assumed that off-site mitigation would not be
7 required for this alternative.

8 In the area of Aesthetics, because this alternative would preserve large amounts of
9 the site and permit substantial view corridors of the open space preserve from both
10 Eaton Road and Floral Avenue, aesthetic impacts would be considered less than the
11 proposed project.

12 In the area of Air Quality, while this alternative would reduce the amount of area
13 to be disturbed by development, construction emissions are still expected to be
14 significant. Also, operational emissions from vehicles and other sources are not
15 expected to be significantly reduced. Therefore, air quality impacts would still
16 probably be significant.

17 In the area of Biological Resources, this alternative would avoid impacts to most
18 of the vernal pools on the project site, and many of the pools and swales identified as
19 providing habitat for special status species would be preserved. Much of the site
20 would be left open to provide nesting and foraging habitat for raptors and other
21 wildlife. Therefore, this alternative is considered to have fewer biological impacts
22 than the proposed project.

23 In the area of Cultural Resources, this alternative would avoid the potential for
24 impacts to archaeological resources in the preserve area, but could still potentially
25 impact archaeological resources in the proposed development area. Therefore,
26 impacts would be less than the proposed project.

27 In the area of Hazards and Hazardous Materials, because this alternative would
28 result in development of the site, this alternative would have similar impacts as the

1 proposed project.

2 In the area of Hydrology, because this alternative would minimize impacts to
3 vernal pools and swales, and would concentrate much of the development along
4 Eaton Road, impacts would be less than the proposed project.

5 In the areas of Noise, Public Services, Transportation and Circulation, and
6 Utilities, because this alternative would result in 123 fewer dwelling units than the
7 proposed project, impacts would be less than the proposed project.

8 In the area of Land Use, because the site is one of the largest undeveloped areas
9 within the northeast area of the City, and it is surrounded by existing development,
10 preservation of the majority of the site as open space, and development of only 50
11 single-family units (in addition to 506 multi-family units), it may not be the highest
12 and best use of the site, and may not fully implement the City's Housing Element as
13 the City's General Plan Housing Element assumed development of 50 percent of the
14 site with a higher number of single-family residences and fewer multi-family
15 residential units. The Biological Resources Alternative would not provide a wide
16 variety of housing types compared to the Project. In addition, development at high
17 density multi-family units at the maximum of 22 dwelling units per acre may present
18 a conflict with lower density development in the vicinity. As such, this alternative
19 may have greater land use impacts than the proposed project. For this reason, the
20 Biological Resources Alternative is rejected.

21 D. Environmentally Superior Alternative. Of the three alternatives analyzed above, only
22 the No Project/No Build Alternative would avoid the significant air quality impacts of
23 the project. This is because no air quality impacts from construction or long-term
24 operational air quality impacts would result. However this alternative would not meet
25 any of the project objectives. Both the No Project/General Plan Alternative, and the
26 Biological Resources Alternative would meet some of the project objectives. Of
27 these two alternatives that would result in development of the site, the Biological
28 Resources Alternative would be considered the environmentally superior alternative,

1 because it would have fewer impacts than the proposed project, primarily due to the
2 fewer number of units that would be built. In addition, it would result in fewer
3 impacts to biological resources. However, because the Biological Resources
4 Alternative would create substantially more rental units than units than home units for
5 purchase, and less housing units overall, the project would not be economically
6 feasible for the applicant to develop since the absorption rate on rental revenue would
7 not adequately finance subsequent construction phases, including infrastructure.
8 Since the proposed rental housing is located on the periphery of the urban area, rather
9 than closer to existing urban centers, the likelihood of a faster absorption rate is
10 further diminished. In addition, since the overall number of housing units is reduced,
11 the applicant would incur an overall financial loss to otherwise meet current and
12 future project expenditures. Since the Biological Resources Alternative would create
13 substantially more multi-family housing units than existing single-family units, it
14 would create an imbalance and potential land use conflict with existing lower density
15 development in the vicinity. Because of the large number of multi-family housing
16 units that exists immediately west of the site, the Biological Resources Alternative
17 would be inconsistent with a guiding principle of the General Plan Land Use Element
18 ensuring that no one area is unduly burdened by higher-density residences. In
19 addition, the Biological Resources Alternative would not fully implement the City's
20 General Plan Housing Element with respect to the total number of housing units,
21 variety of housing unit types, and promotion of home ownership. For these reasons,
22 the Environmentally Superior Alternative is rejected as infeasible.

23 **Section 5. Findings Regarding Environmental Impacts.** The potential environmental
24 impacts resulting from the Project and identified in this section are fully mitigated or mitigated to
25 a level of less than significant, except for cumulative emissions which will contribute to non-
26 attainment of air quality standards and which will remain significant and unavoidable.

27 A. Impact AIR-1: The EIR, at Impact AIR-1, finds that air quality impacts from
28 demolition and construction period activities could generate significant dust, exhaust, and

1 organic emissions and therefore may be significant. The EIR concludes that implementation of
2 Mitigation Measures AIR-1 would help minimize these impacts, but due to the exceedance of
3 BCAQMD thresholds, would not reduce it to a less-than-significant level and the impact would
4 remain significant and unavoidable.

5 Findings: The incorporation of Mitigation Measures AIR-1 into the Project would help
6 minimize this impact, but due to exceedance of BCAQMD thresholds would not reduce it to a
7 less-than-significant level and the impact would remain significant and unavoidable. This
8 mitigation measure will require that the following measures be included in all future construction
9 plans and documents for the subject parcels to reduce construction-related air quality impacts, as
10 required by General Plan policy and the Butte County Air Quality Management District: water all
11 active construction areas at least twice daily; if necessary, apply chemical soil stabilizers to
12 inactive construction areas (disturbed areas that are unused for at least four consecutive days) to
13 control dust emissions; limit vehicle speeds to 15 mph on unpaved roads; suspend land clearing,
14 grading, earth moving, or excavation activities when wind speeds exceed 20 mph; if applicable,
15 apply non-toxic binders (e.g. latex acrylic copolymer) to exposed areas after cut and fill operation
16 and hydroseed the area; cover inactive storage piles; consult with the Butte County Air Quality
17 Management District about the application of a paved (or dust palliative treated) apron onto the
18 project site; sweep or wash paved streets adjacent to the site where visible silt or mud deposits
19 have accumulated due to construction activities; post a publically visible sign at the construction
20 site with the name and telephone number of the person to contact regarding dust complaints;
21 prior to final occupancy, the applicant shall demonstrate that all ground surfaces are treated
22 sufficiently to minimize fugitive dust emissions.

23 B. Impact AIR-2: The EIR, at Impact AIR-2, finds that development of the proposed
24 project will result in increased regional emissions of criteria air pollutants exceeding BCAQMD
25 Thresholds. The EIR concludes that implementation of Mitigation Measure AIR-2 would help
26 minimize this impact, but due to exceedance of BCAQMD thresholds for ROG and NOx, would
27 not reduce it to a less-than-significant level and the impact would remain significant and
28 unavoidable.

1 Findings: The incorporation of Mitigation Measure AIR-2 into the Project would help
2 minimize this impact, but due to exceedance of BCAQMD thresholds for ROG and NOx, would
3 not reduce it to a less-than-significant level and the impact would remain significant and
4 unavoidable. This mitigation measure will require that the following measures be incorporated
5 into the design of all future development projects on the subject parcels: transit stops shall be
6 provided along Eaton Road, in consultation with the Butte County Association of Governments
7 (BCAG) (per Mitigation Measure TRANS-1); utilize energy-efficient lighting and process
8 systems; utilize energy-efficient and automated controls for air conditioning; utilize EPA Phase II
9 certified wood burning devices; to the extent feasible, orient buildings and include landscaping
10 (e.g. shade trees) to maximize natural cooling, and utilize centralized space and water heating
11 and/or use of solar water heating.

12 C. Impact BIO-1: The EIR, at Impact BIO-1, finds that implementation of the proposed
13 project would impact vernal pools and similar habitats that support vernal pool fairy shrimp and
14 vernal pool tadpole shrimp and that this would be a significant impact. The EIR concludes that
15 this impact can be reduced to a less than significant level through the implementation of
16 Mitigation Measure BIO-1.

17 Findings: The incorporation of Mitigation Measure BIO-1 into the Project will reduce this
18 impact to a less than significant level by requiring that prior to issuance of a grading permit or
19 other project-related disturbance of the site, the applicant prepare a Habitat Mitigation and
20 Monitoring Proposal (HMMP) consistent with the final Corps Sacramento District HMMP
21 Guidelines for impacts to vernal pools and swales. The HMMP and other applicable permits
22 shall be approved by the Corps, USFWS, and the RWQCB prior to initiation of any work on the
23 site. The HMMP will address, at minimum, proposed mitigation sites, implementation plan,
24 maintenance, monitoring plan, completion of mitigation, and contingency measures. This
25 mitigation shall be accomplished at both on- and off-site locations, and in concept, the plan will
26 consist of the following three parts: on-site creation, on-site preservation and enhancement, off-
27 site mitigation.

28 D. Impact BIO-2: The EIR, at Impact BIO-2, finds that implementation of the proposed

1 project would impact one elderberry plant containing five stems of sufficient size (i.e., greater
2 than one inch diameter at ground level) to provide suitable habitat for valley elderberry longhorn
3 beetle (VELB) and that this would be a significant impact. The EIR concludes that this impact
4 can be reduced to a less than significant level through the implementation of Mitigation Measure
5 BIO-2.

6 Findings: The incorporation of Mitigation Measure BIO-2 into the Project will mitigate
7 this impact to a less than significant level by requiring mitigation for impacts to VELB will be in
8 accordance with the 1999 USFWS Conservation Guidelines for the Valley Elderberry Longhorn
9 Beetle, by requiring the stormwater treatment basin planned for Lot B be designed to avoid
10 impacts to the elderberry plant, if possible. If avoidance is not possible, or if the plant is
11 impacted during construction activities, the elderberry plant shall be transplanted to an
12 appropriate location within the preserve area on-site in accordance with the 1999 USFWS
13 Conservation Guidelines for the Valley Elderberry Longhorn Beetle. In addition, each elderberry
14 stem that is impacted shall be replaced with seedlings in autumn at a 1:1 ratio for each elderberry
15 stem impacted. After implementation, the elderberry planting area must remain as VELB habitat
16 in perpetuity and it is the applicant's responsibility to provide funding and appoint the party in
17 charge of long-term management of the conservation area.

18 E. Impact BIO-3: The EIR, at Impact BIO-3, finds that implementation of the proposed
19 project would impact 110.26 acres of nonnative grassland that is suitable foraging habitat for
20 Swainson's Hawk and that this could be considered a significant impact. The EIR concludes that
21 this impact can be reduced to a less than significant level through the implementation of
22 Mitigation Measure BIO-3.

23 Findings: The incorporation of Mitigation Measure BIO-3 into the Project will mitigate
24 this impact to a less than significant level by requiring prior to issuance of a grading permit or
25 other project-related disturbance of the site, the applicant shall provide evidence that adequate
26 mitigation has been provided for the loss of 110.26 acres of nonnative grassland that is suitable
27 foraging habitat for Swainson's hawk. Because 52.23 acres of habitat will be provided in the on-
28 site preserve area, an additional 2.9 acres of nonnative grassland or other suitable foraging habitat

1 shall be preserved at an off-site location. The applicant has purchased a conservation easement
2 at Hamilton Ranch, a property in Tehama County, for the purpose of providing the required off-
3 site mitigation.

4 F. Impact BIO-4: The EIR, at Impact BIO-4, finds that implementation of the proposed
5 project could impact potential nesting habitat for Swainson's hawk or other raptors and that this
6 is considered a significant impact. The EIR concludes that this impact can be reduced to a less
7 than significant level through the implementation of Mitigation Measure BIO-4.

8 Findings: The incorporation of Mitigation Measure BIO-4 into the Project will reduce
9 this impact to a less than significant level by requiring all suitable nest trees along Sycamore
10 Creek within 0.25-mile of the limits of work to be surveyed by a qualified biologist prior to
11 initiating construction-related activities during nesting season (March 1 - September 15). If an
12 active Swainson's hawk nest is discovered, a 0.25-mile buffer shall be established on the project
13 site around the nest tree. If an active nest of another raptor species is discovered, a 500-foot
14 buffer shall be established and shall be maintained in place until the end of the breeding season
15 or until the young have fledged, as determined by a qualified biologist.

16 G. Impact BIO-5: The EIR, at Impact BIO-5, finds that the project will result in the fill of
17 a total of 6.06 acres of wetlands, including 4.54 acres of vernal pools and 1.52 acres of vernal
18 swales and that this would be a significant impact. The EIR concludes that this impact can be
19 reduced to a less than significant level through the implementation of Mitigation Measure BIO-5,
20 which is the same as BIO-1.

21 Findings: The incorporation of Mitigation Measure BIO-5 into the Project will mitigate
22 this impact to a less than significant level by requiring the same mitigation as required under
23 Mitigation Measure BIO-1 which will require the applicant to prepare a HMMP consistent with
24 the final Corps Sacramento District HMMP for impacts to vernal pools and swales.

25 K. Impact CULT-1: The EIR, at Impact CULT-1, finds that ground-disturbing activities
26 associated with site preparation, grading, and other construction activities could adversely impact
27 archaeological resources and finds that this is a significant impact.

28 Findings: The incorporation of Mitigation Measure CULT-1 into the Project will reduce

1 this impact to a less than significant level by the requiring a qualified archaeologist to monitor all
2 ground disturbing activities within the two areas identified as potentially containing
3 archaeological resources. Archaeological monitors shall be empowered to halt construction
4 activities at the location of the discovery of possible archaeological material and to protect the
5 resource while the finds are being evaluated..

6 L. Impact CULT-2: The EIR, at Impact CULT-2, finds that ground-disturbing activities
7 associated with site preparation, grading, excavation or utility trenching could disturb human
8 remains, including those interred outside of formal cemeteries and finds that this is a significant
9 impact.

10 Findings: The incorporation of Mitigation Measure CULT-2 into the Project will reduce
11 this impact to a less than significant level by requiring that if human remains are encountered
12 during construction activities, work within 50 feet of the discovery shall be redirected and the
13 county coroner notified immediately. At the same time, an archaeologist shall be contacted to
14 evaluate the situation. If the human remains are of Native American origin, the coroner shall
15 notify the Native American Heritage Commission within 24 hours of this identification.

16 M. Impact HYDRO-1: The EIR, at Impact HYDRO-1, finds that increased stormwater
17 runoff from the project could impact downstream sources and finds that this is a significant
18 impact.

19 Findings: The incorporation of Mitigation Measure HYDRO-1 into the Project will
20 reduce this impact to a less than significant level by the requirement that prior to approval of
21 grading plans for the proposed project, the applicant shall submit a storm drainage plan to the
22 Department of Building and Development Services for review and approval in accordance with
23 the standards set forth in the City's adopted Storm Drainage Master Plan (2000). The applicant
24 shall also be responsible for obtaining the necessary regulatory permits from the Corps,
25 RWQCB, and CDFG.

26 N. Impact NOISE-1: The EIR, at Impact NOISE-1, finds that noise levels from
27 construction activities may range up to 85 dBA Lmax at the nearest land uses to the project site
28 for a limited time period and finds that this is a significant impact.

1 Findings: The incorporation of Mitigation Measure NOISE-1 into the Project will reduce
2 this impact to a less than significant level by requiring various measures be implemented during
3 construction of the proposed project including that all construction vehicles or equipment be
4 equipped with properly operating and maintained mufflers, compliance with the City of Chico
5 noise ordinance, and limiting construction activities to between 7:00 a.m. and 9:00 p.m. Monday
6 through Saturday, and 10:00 a.m. and 6:00 p.m. on Sundays or federal holidays. The EIR finds
7 that construction period impacts would be short-term and that the mitigation measures would
8 reduce impacts to less-than-significant levels.

9 O. Impact NOISE-2: The EIR, at Impact NOISE-2, finds that local traffic will generate
10 long-term exterior noise levels exceeding 60 dBA CNEL on the project site and finds that this is
11 a significant impact on proposed balcony-level, sensitive land uses located along Eaton Road.

12 Findings: The incorporation of Mitigation Measure NOISE-2 into the Project will reduce
13 this impact to a less than significant level by requiring sound walls (plexiglas or equivalent
14 material with a minimum height of 6 feet) for any balconies located along Eaton Road.

15 P. Impact NOISE -3: The EIR, at Impact NOISE -3, finds that long-term stationary noise
16 sources on the project site (e.g., air conditioning or other mechanical ventilation equipment,
17 emergency generators, delivery loading docks or areas from the proposed retail and residential
18 uses) could potentially generate noise levels in excess of the thresholds set in the City's
19 Municipal Code and finds that this is a significant impact.

20 Findings: The incorporation of Mitigation Measure NOISE-3 into the Project will reduce
21 this impact to a less than significant level by requiring all on-site stationary noise sources to
22 comply with the standards listed in Section 9.38.030 of the City's Municipal Code, and loading
23 docks or loading areas and noise-generating equipment associated with the retail uses be located
24 as far as practical from all existing and planned residential uses.

25 Q. Impact NOISE-4: The EIR, at Impact NOISE-4, finds that homes within the 55 dB
26 CNEL noise contour would be impacted by noise from aircraft overflights and that this is a
27 significant impact.

28 Findings: The incorporation of Mitigation Measure NOISE-4 into the Project will reduce

1 this impact to a less than significant level by requiring that prior to the issuance of building
2 permits for any residential structures within the 55dB CNEL noise contour, the Building and
3 Development Services Department staff shall verify that homes within this area shall be
4 constructed utilizing noise attenuation features (including noise insulating construction and the
5 installation of air conditioning so that windows can be kept closed) to reduce interior noise levels
6 to less than 45 dB CNEL within all habitable rooms.

7 R. Impact TRANS-1: The EIR, at Impact TRANS-1, finds that implementation of the
8 proposed project may create demand for public transit service above that which is currently
9 planned or provided for by the City of Chico and that this is a significant impact.

10 Findings: The incorporation of Mitigation Measure TRANS-1 into the Project will reduce
11 this impact to a less than significant level by requiring the project applicant to coordinate with
12 BCAG to ensure the provision of adequate transit service and stops to serve the project site.

13 Section 6. Adoption of a Statement of Overriding Considerations. As stated above,
14 the proposed project will result in increased regional emissions of criteria air pollutants
15 exceeding BCAQMD Thresholds. The EIR concludes that implementation of Mitigation
16 Measure AIR-2 would help minimize this impact, but due to exceedance of BCAQMD
17 thresholds for ROG and NOx, and due to the regional air basin-wide non-attainment conditions
18 that exist within Butte County and the surrounding jurisdictions, would not reduce it to a less-
19 than-significant level and the impact would remain significant and unavoidable. The EIR further
20 concludes that it is not practical or feasible for the Project alone to substantially reduce regional
21 air pollution; the Project is capable only of managing and limiting its own contributions to
22 regional air pollution. So long as the broader air quality basin is in a technical state of non-
23 attainment with regulatory goals, it will not be possible for Project air quality impacts to be
24 technically “insignificant”, and so the forgoing air quality impacts are considered “unavoidable”,
25 even though they can be mitigated or reduced to some degree.

26 The City Council hereby finds that even though it is not feasible to fully mitigate this
27 impact, the following specific social, economic, and other considerations justify proceeding with
28 the Project and support the adoption of this statement of overriding considerations and that the

1 implementation of the Project would result in the following public benefits:

- 2 A. At completion, the Project will provide 409 single-family residential lots and 270
3 multi-family residential units and, therefore, will help to promote infill development
4 with a wide variety of housing types and ensure a long-term compact urban form
5 consistent with General Plan policies LU-G-2, LU-G-3, and CD-G-1. Infill
6 development in this manner is encouraged by the General Plan to reduce urban sprawl
7 in the Chico urban area, thereby consolidating urban services, reducing related
8 environmental impacts including impacts to air quality, and directing growth onto
9 developable land with less sensitive environmental resources or other physical
10 constraints.
- 11 B. In addition to housing, the Project will provide up to 25,000 square feet of new
12 neighborhood commercial floor space and, therefore, will promote a balance of
13 employment opportunities with the provision of housing to enable persons to live and
14 work in Chico, consistent with General Plan policy H-G-21.
- 15 C. The project provides a range of lot sizes and a mix of housing types that offers a range
16 of housing options to many economic segments of the community consistent with
17 General Plan policies H-G-5, H-G-6, H-G-20 through H-G-23, H-G-29, H-G-55, and
18 H-G-56.
- 19 D. The Project provides for a mix of residential and neighborhood commercial uses
20 consistent with a portion of the site's designation on the General Plan diagram as a
21 Mixed-Use Neighborhood Core consistent with General Plan policy LU-I-9 and
22 promoting convenient, pedestrian-oriented access to neighborhood-commercial
23 services that serve the daily needs of residences within the neighborhood.
- 24 E. The Project provides for the preservation, restoration, and enhancement of
25 approximately 56 acres of permanent open space at the north side of the site to reduce
26 impacts to wetlands and archaeological resources, as well as off-site mitigation
27 measures to further reduce impacts to wetland resources, and which will augment the
28 Foothill Park Preserve established in conjunction with the Foothill Park East

1 Subdivision, consistent with the first three of nine overall themes of the General Plan,
2 including sustainable development that balances growth and conservation, resource-
3 based planning, and protection of agricultural and natural resources, and consistent
4 with General Plan policies OS-G-5 through OS-G-9, OS-G-14 through OS-G-17, and
5 OS-G-26. In providing permanent open space with maintenance of natural resources,
6 the Project enhances the quality of life for area residents by serving passive
7 recreational needs including the maintenance of natural vistas and viewsheds.

8 F. The Project will increase property tax revenue upon its development by the
9 construction of building improvements and public right-of-way improvements
10 adjacent to the property. During construction, the Project will generate retail sales tax
11 revenues through the sale of construction-related materials and supplies locally and
12 through the sale of indirect goods that support construction related jobs. After
13 completion, the Project will generate sales tax revenues through the direct sales of
14 goods by neighborhood commercial uses.

15 The City Council hereby finds that the benefits of the Project, as discussed above,
16 outweigh the potentially unavoidable significant environmental effects associated with the
17 Project and further finds that these potentially unavoidable adverse impacts are an acceptable
18 consequence of the Project in light of the benefits of the Project.

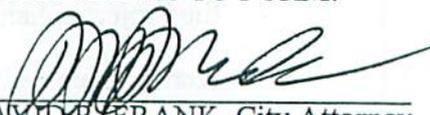
19 Section 7. Adoption of Revised Mitigation and Monitoring Plan The City Council
20 hereby finds that each of the mitigation measures stated in Section 4 above, and more fully
21 described in the EIR and the Revised Mitigation Monitoring Program (attached as Exhibit I with
22 clarifications of Mitigation Measure BIO-1.8.2 and BIO-1.8.3 regarding vernal pool acreages and
23 clarification of Mitigation Measure TRANS-1 regarding coordination of transit stops with
24 BCAG) which was prepared for the Project are imposed as conditions of approval of any
25 subsequent action related to the Project implementation.

26 The foregoing resolution was adopted by the City Council of the City of Chico at its
27 meeting held on May 17th, 2006, by the following vote:

28 ///

1 AYES: Bertagna, Flynn, Gruendl, Nickell, Schwab, Wahl,
Holcombe
2 NOES: None
3 ABSENT: None
4 ABSTAIN: None
5 DISQUALIFIED: None

6 ATTEST:
7 
8 DEBORAH R. PRESSON
City Clerk

APPROVED AS TO FORM:

DAVID R. FRANK, City Attorney

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EXHIBIT I

MITIGATION MONITORING AND REPORTING PROGRAM

This Mitigation Monitoring and Reporting Program (MMRP) lists the impacts and mitigation measures identified in the Mountain Vista / Sycamore Glen Subdivisions EIR. The MMRP lists mitigation measures recommended in the EIR for the proposed project and identifies monitoring responsibility and a schedule for implementation. Monitoring and reporting details are only provided for mitigation measures necessary to avoid or reduce significant impacts of the project.

Table 1 presents the mitigation measures identified for the proposed project. Each mitigation measure is numbered with a symbol indicating the topical section to which it pertains, a hyphen, and the impact number. For example, AIR-1 is the first mitigation measure identified in the Air Quality analysis.

The first and second columns of Table 1 provide the significant impacts and corresponding mitigation measure(s) as identified in Chapter IV of the Draft EIR for the proposed project. The third column, "Monitoring Responsibility," identifies the party(ies) responsible for carrying out the required action(s). The fourth column, "Schedule for Implementing Mitigation Measure," identifies the timeframe for implementing the mitigation measure. The fifth and far-right column will be completed by the City to record the completion date of the mitigation measure

Table 1: Mitigation Monitoring and Reporting Program

| Significant Impacts | Mitigation Measures | Monitoring Responsibility | Schedule for Implementing Mitigation Measure | Completion Date |
|---|---|---|---|-----------------|
| A. AESTHETICS | | | | |
| <i>There are no significant impacts related to aesthetics.</i> | | | | |
| B. AIR QUALITY | | | | |
| <p><u>AIR-1</u>: Demolition and construction period activities could generate significant dust, exhaust, and organic emissions.</p> | <p><u>AIR-1</u>: The following mitigation measures will be included in all future construction plans and documents for the subject parcels to reduce construction-related air quality impacts, as required by General Plan policy and the Butte County Air Quality Management District:</p> <ul style="list-style-type: none"> • Water all active construction areas at least twice daily. The frequency should be based on the type of operation, soil conditions, and wind exposure. • If necessary, apply chemical soil stabilizers to inactive construction areas (disturbed areas that are unused for at least four consecutive days) to control dust emissions. Dust emissions should be controlled at the site for both active and inactive construction areas throughout the entire construction period (including holidays). • Limit vehicle speeds to 15 mph on unpaved roads. • Suspend land clearing, grading, earth moving, or excavation activities when wind speeds exceed 20 mph unless project areas are regularly watered down to control dust. • If applicable, apply non-toxic binders (e.g. latex acrylic copolymer) to exposed areas after cut and fill operation and hydroseed the area. • Cover inactive storage piles. • Project applicant shall consult with the Butte County Air Quality Management District about the application of a paved (or dust palliative treated) apron onto the project site. • Sweep or wash paved streets adjacent to the site where visible silt or mud deposits have accumulated due to construction activities. • Post a publically visible sign at the construction site with the name and telephone number of the person to contact regarding dust complaints. This person shall respond and take corrective action within 24 hours. The telephone number of the BCAQMD shall also be visible to ensure compliance with BCAQMD Rules 200 and 205 (Nuisance and Fugitive Dust Emissions). | <p>Department of Public Works Construction Inspectors</p> | <p>Prior to approval of grading and construction plans.</p> | |

| Significant Impacts | Mitigation Measures | Monitoring Responsibility | Schedule for Implementing Mitigation Measure | Completion Date |
|---|---|---------------------------|---|-----------------|
| AIR-1 <i>continued</i> | <ul style="list-style-type: none"> Prior to final occupancy, the applicant shall demonstrate that all ground surfaces are treated sufficiently to minimize fugitive dust emissions. Fugitive dust emissions are considered dust clouds caused by wind, traffic, or other disturbances to exposed ground surfaces. | | | |
| <p>AIR-2: Development of the proposed project will result in increased regional emissions of criteria air pollutants exceeding BCAQMD Thresholds.</p> | <p>AIR-2: To further reduce air quality impacts, the following supplemental mitigation measures shall be incorporated into the design of all future development projects on the subject parcels:</p> <ul style="list-style-type: none"> Transit stops shall be provided along Eaton Road, in consultation with BCAG (per Mitigation Measure TRANS-1). Utilize energy-efficient lighting and process systems. Utilize energy-efficient and automated controls for air conditioning. Utilize EPA Phase II certified wood burning devices. To the extent feasible, orient buildings and include landscaping (e.g. shade trees) to maximize natural cooling, and utilize centralized space and water heating and/or use of solar water heating. | Planning Director | Prior to approval Eaton Road improvement plans; prior to approval of building plans. | |
| C. BIOLOGICAL RESOURCES | | | | |
| <p>BIO-1: Implementation of the proposed project would impact vernal pools and similar habitats that support vernal pool fairy shrimp and vernal pool tadpole shrimp.</p> | <p>BIO-1: Prior to issuance of a grading permit or other project-related disturbance of the site, the applicant shall prepare a Habitat Mitigation and Monitoring Proposal (HMMP) consistent with the final Corps Sacramento District HMMP Guidelines for impacts to vernal pools and swales. The HMMP and other applicable permits shall be approved by the Corps, USFWS, and the RWQCB, prior to initiation of work on the project site. Implementation shall be consistent with the terms of the HMMP. Appropriate mitigation ratios shall be established to ensure no net loss of wetland acreage or value. The HMMP will address, at minimum, the following:</p> <ol style="list-style-type: none"> Project Description: location and summary of project; jurisdictional areas to be filled; types, functions and values of impacted jurisdictional areas; Goal of Mitigation: type, functions and values of habitats to be created or enhanced; temporal losses; estimated costs; Proposed Mitigation Sites: location, size and ownership of mitigation areas; existing functions, values and jurisdictional waters; present and proposed uses and zoning; | Corps, USFWS, RWQCB | Prior to issuance of a grading permit or other project-related disturbance of the site. | |
| BIO-1 <i>continued</i> | <ol style="list-style-type: none"> Implementation Plan: rationale for expecting success, responsibilities; schedule; site preparation; planting plan, | | | |

| Significant Impacts | Mitigation Measures | Monitoring Responsibility | Schedule for Implementing Mitigation Measure | Completion Date |
|---------------------------------------|---|---------------------------|--|-----------------|
| | <p>irrigation plan; as-built plans;</p> <p>5. Maintenance: activities; schedule; responsible parties;</p> <p>6. Monitoring Plan: success and performance criteria; jurisdictional waters to be created/enhanced; monitoring methods; reports and schedule;</p> <p>7. Completion of Mitigation: agency notification and confirmation; and</p> <p>8. Contingency Measures: initiation, locations and funding.</p> <p>This mitigation shall be accomplished at both on- and off-site locations. In concept, the plan will consist of three parts:</p> <p>1. <i>On-Site Creation.</i> New vernal pools and swales shall be created within the 56-acre preserve area in the north portion of the project site and the 56-acre preserve area shall be deeded as public open space. As functionally feasible due to existing topography, locations of existing pools, etc., the maximum acreage of vernal pools and swales will be created in an effort to attain the 1:1 creation ratio or as required by the Corps and USFWS permits.</p> <p>2. <i>On-Site Preservation and Enhancement.</i> A total of 4.7 acres of vernal pools and swales shall be provided within the 56-acre preserve area. Additionally, the preserve will protect 1.53 acres of intermittent drainage (Sycamore Creek), 1.5 acres of created vernal pool habitat, and two wetland treatment basins that total 1.5 acres. The 56-acre preserve area shall be deeded as public open space. In addition, pools and swales disturbed from OHV or other uses shall be enhanced and restored as necessary. Restoration and enhancement will likely include minor grading and contouring of the pool/swale, or adjacent upland areas, in order to restore the natural topography and hydrology. Restored wetland acreage shall be credited towards any creation/preservation acreage to attain the 1:1 creation ratio or as required by the Corps and USFWS permits.</p> <p>3. <i>Off-Site Mitigation.</i> The project will permanently impact 5.98 acres of listed species habitat (i.e., vernal pools and swales). To mitigate, the applicant will preserve 11.86 acres of listed species habitat (i.e., vernal pools and swales) on the Hamilton Ranch site. A total of 80.2 acres of the 400-acre property will be used for this project that encompasses the 11.86 acres of listed species wetland habitat.</p> | | | |
| BIO-2: Implementation of the proposed | BIO-2: Mitigation for impacts to VELB will be in accordance with | Planning Director, | Prior to approval of | |

| Significant Impacts | Mitigation Measures | Monitoring Responsibility | Schedule for Implementing Mitigation Measure | Completion Date |
|--|--|---------------------------|--|-----------------|
| <p>project would impact one elderberry plant containing five stems of sufficient size (i.e., >1 inch diameter at ground level) to provide suitable habitat for valley elderberry longhorn beetle.</p> | <p>the 1999 USFWS Conservation Guidelines for the Valley Elderberry Longhorn Beetle, as follows:</p> <ul style="list-style-type: none"> • To the maximum extent feasible, the stormwater treatment basin planned for Lot B shall be designed to avoid impacts to the elderberry plant, if possible. If the plant can be avoided, orange snow fence or brightly colored nylon rope shall be placed in a 20-foot radius around the plant to protect it from disturbance. If avoidance is not possible, or if the plant is impacted during construction activities, the elderberry plant shall be transplanted as specified below. • If the elderberry plant cannot be avoided through design of the stormwater treatment basin, the elderberry plant shall be transplanted to an appropriate location within the 52.23-acre preserve area on-site. The specific replanting site shall be in a swale or similar feature that flows into Sycamore Creek, similar to the existing location of the elderberry plant. In addition to transplanting, each elderberry stem that is impacted (either by removal or transplanting) shall be replaced with seedlings or cuttings at a 1:1 ratio. A total of five elderberry cuttings or seedlings shall be planted. • Elderberry replanting areas shall be surrounded by a 100-foot buffer from any disturbance or activity (activities associated with creation or enhancement of vernal pools or swales within the preserve area shall be exempt from this requirement). Firebreaks may not be included in conservation areas or buffer zones. • Associated native plants shall be planted in the elderberry replanting area at a 1:1 ratio for each elderberry stem impacted. A total of five associated native cuttings or seedlings shall be planted. Associated species shall include native species found in similar conditions in the project area. All native plants shall be propagated and grown at a local nursery. • After implementation, the elderberry planting area must remain as VELB habitat in perpetuity. It is the applicant's responsibility to provide funding and appoint the party in charge of long-term management of the conservation area. | <p>USFWS</p> | <p>grading permits; ongoing due to long-term management.</p> | |
| <p>BIO-2 <i>continued</i></p> | <ul style="list-style-type: none"> • Long-term management of the conservation area shall include of control of nonnative species, toxic chemicals, and litter. Management also includes fencing the conservation area and posting signs identifying the site as VELB habitat. • The conservation area shall be monitored for a period of 10 | | | |

| Significant Impacts | Mitigation Measures | Monitoring Responsibility | Schedule for Implementing Mitigation Measure | Completion Date |
|---|---|---------------------------|--|-----------------|
| | <p>consecutive years, or for seven years over a 15-year period. For each year in which a monitoring survey is required, a qualified biologist or restoration specialist shall conduct two surveys and complete a written report. Access to the conservation area shall also be provided to biologists and law enforcement personnel from USFWS and CDFG.</p> <ul style="list-style-type: none"> • Preconstruction surveys shall be conducted to determine if additional growth has altered the stem size assessment (i.e., if the diameter of any stems have increased such that additional mitigation is required). USFWS shall be notified if additional impact to VELB habitat would occur beyond those identified in this assessment. | | | |
| <p><u>BIO-3</u>: Implementation of the proposed project would impact 110.26 acres of nonnative grassland that is suitable foraging habitat for Swainson's Hawk.</p> | <p><u>BIO-3</u>: Prior to issuance of a grading permit or other project-related disturbance of the site, the applicant shall provide evidence that adequate mitigation has been provided for the loss of 110.26 acres of nonnative grassland that is suitable foraging habitat for Swainson's hawk. At a 0.5:1 ratio, mitigation for the loss of 110.26 acres of foraging habitat is 55.13 acres. Because 52.23 acres of habitat will be provided in the 56-acre on-site preserve area (and the 56-acre preserve area shall be deeded as public open space), an additional 2.9 acres of nonnative grassland or other suitable foraging habitat shall be preserved at an off-site location. The applicant has an option to purchase a 400-acre conservation easement at Hamilton Ranch, a property in Tehama County, in which a total of 80 acres will be preserved for off-site mitigation purposes for the purpose of providing the required 2.9 acres of off-site mitigation.</p> | <p>Planning Director</p> | <p>Prior to issuance of a grading permit or other project-related disturbance of the site.</p> | |
| <p><u>BIO-4</u>: Implementation of the proposed project could impact potential nesting habitat for Swainson's hawk or other raptors.</p> | <p><u>BIO-4</u>: If project construction is to begin during the nesting season (March 1 - September 15), all suitable nest trees along Sycamore Creek within 0.25-mile of the limits of work shall be surveyed by a qualified biologist prior to initiating construction-related activities. Surveys will be conducted no more than 14 days prior to the start of work. If an active Swainson's hawk nest is discovered, a 0.25-mile buffer shall be established on the project site around the nest tree and delineated using orange snow fence or brightly colored nylon rope. If an active nest of another raptor species is discovered, a 500-foot buffer shall be established. The buffer shall be maintained in place until the end of the breeding season or until the young have fledged, as determined by a qualified biologist. In some instances, CDFG may approve decreasing the specified</p> | <p>Planning Director</p> | <p>Prior to issuance of a grading permit or other project-related disturbance of the site if project construction is to begin during the nesting season (March 1 - September 15)</p> | |

| Significant Impacts | Mitigation Measures | Monitoring Responsibility | Schedule for Implementing Mitigation Measure | Completion Date |
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| | buffers with implementation of other avoidance and minimization measures (e.g., having a qualified biologist on-site during construction activities during the nesting season to monitor nesting activity). If no nesting is discovered, construction can begin as planned. Construction beginning during the non-nesting season and continuing into the nesting season shall not be subject to these measures. | | | |
| <u>BIO-5:</u> Implementation of the proposed project would impact wetlands. | <u>BIO-5:</u> Same as Mitigation Measure BIO-1. | Corps, USFWS, RWQCB | Prior to issuance of a grading permit or other project-related disturbance of the site. | |
| D. CULTURAL RESOURCES | | | | |
| <p><u>CULT-1:</u> Ground-disturbing activities associated with site preparation, grading, and other construction activities could adversely impact archaeological resources.</p> <p><i>CULT-1 continued</i></p> | <p><u>CULT-1:</u> A qualified archaeologist shall monitor all ground disturbing activities within the two areas identified as potentially containing archaeological resources. These areas include: 1) the recorded site boundaries of P-403 (west of the vernal pool) plus a 25-foot surrounding buffer; and 2) the strip of land from the fenceline that forms the southern project area boundary north 50 feet, and from the existing PG&E substation west to the intersection of Floral Avenue and Lupin Avenue. This area conforms to the reported location of midden documented as part of archaeological site P-403.</p> <p>Archaeological monitors shall be empowered to halt construction activities at the location of the discovery to review possible archaeological material and to protect the resource while the finds are being evaluated. This monitoring shall continue until, in the archaeologist's judgment, cultural resources are not likely to be encountered.</p> <p>If deposits of prehistoric or historical archaeological materials are encountered during project activities, all work within 50 feet of the discovery shall be redirected until the archaeological monitor evaluates the situation and provides recommendations. Project personnel shall not collect or move any archaeological material. Fill soils that may be used for construction purposes shall not contain archaeological materials. If archaeological deposits cannot be avoided, they shall be evaluated for their significance in accordance with the California Register. If the resources are not significant, further protection is not necessary. If the resources are</p> | Planning Director, archaeologist. | During all ground disturbing activities in the two identified areas, continuing until, in the archaeologist's judgment, cultural resources are not likely to be encountered. | |

| Significant Impacts | Mitigation Measures | Monitoring Responsibility | Schedule for Implementing Mitigation Measure | Completion Date |
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| | significant, they will need to be protected from adverse effects or such effects must be mitigated. Upon completion of the archaeological assessment, a report shall be prepared documenting the methods and results, as well as recommendations. The report shall be submitted to the NEIC and to the Planning Division of the City of Chico Community Development Department. | | | |
| <p><u>CULT-2:</u> Ground-disturbing activities associated with site preparation, grading, excavation or utility trenching could disturb human remains, including those interred outside of formal cemeteries.</p> | <p><u>CULT-2:</u> If human remains are encountered during construction activities, work within 50 feet of the discovery shall be redirected and the county coroner notified immediately. At the same time, an archaeologist shall be contacted to evaluate the situation. If the human remains are of Native American origin, the coroner shall notify the Native American Heritage Commission within 24 hours of this identification. The Native American Heritage Commission shall identify a Native American Most Likely Descendent to inspect the site and provide recommendations for the proper treatment of the remains and associated grave goods. A report documenting the methods, findings, and recommendations shall be prepared. The report shall be submitted to the NEIC and the Planning Division of the City of Chico Community Development Department.</p> | <p>Construction Manager; Planning Director</p> | <p>If human remains are encountered.</p> | |
| <p>E. HAZARDS AND HAZARDOUS MATERIALS</p> | | | | |
| <p><i>There are no significant impacts related to hazards and hazardous materials.</i></p> | | | | |
| <p>F. HYDROLOGY</p> | | | | |
| <p><u>HYDRO-1:</u> Increased stormwater runoff from the project could impact downstream sources.</p> | <p><u>HYDRO-1:</u> Prior to approval of grading plans for the proposed project, the applicant shall submit a storm drainage plan to the Department of Public Works for review and approval in accordance with the standards set forth in the City's adopted Storm Drainage Master Plan (2000). The applicant shall also be responsible for obtaining the necessary regulatory permits from the Corps, RWQCB, and CDFG. The storm drainage plan shall be based on criteria including, but not limited to:</p> <ul style="list-style-type: none"> • Incorporation of all relevant BMPs included in the City's Best Practices Manual related to stormwater drainage, including interception of "first-flush" contaminants from the initial 0.5-inch of rainfall for each storm event. • The design and selection of BMPs will be based on site-specific considerations such as geology, topography, and hydrology. • Given the site-specific conditions of the project area and presence of sensitive vernal pools in the area, the drainage plan will generally include limiting soil disturbances near vernal | <p>Public Works Director</p> | <p>Prior to approval of grading plans.</p> | |

| Significant Impacts | Mitigation Measures | Monitoring Responsibility | Schedule for Implementing Mitigation Measure | Completion Date |
|--|---|--|--|-----------------|
| | <p>pools during the winter rainfall season.</p> <p>Relevant BMPs include, but are not limited to, the following:</p> <ul style="list-style-type: none"> • The use of grassed swales as opposed to culverts, for runoff conveyance. Grassed swales reduce runoff velocities, thereby decreasing peak runoff rates. • Preservation of existing vegetation to the extent possible by flagging or fencing to avoid disturbance. • Installation of soil stabilization BMPs, such as mulching, erosion control fabrics, and/or reseeded with grass or other plants. • Reducing vehicle tracking of sediment onto paved surfaces during the winter rainfall period by vehicle washing and street sweeping. • Implementation of hazardous materials management practices to reduce the possibility of chemical spills or releases of contaminants. | | | |
| HYDRO-1 <i>continued</i> | <ul style="list-style-type: none"> • Establishing staging areas for heavy equipment and construction materials so that inadvertent spills of oil, grease, asphalt, other petroleum by-products, or other hazardous materials will not be discharged into sensitive wetland areas. All machinery will be properly maintained and cleaned to prevent spills and leaks. • Regular inspection and maintenance of BMPs to ensure they are in good working order. <p>The storm drainage plan shall be prepared by a registered civil engineer and will be in conformance with City and state agency stormwater guidelines, including procurement of a General Stormwater Permit and/or water quality certification.</p> | | | |
| G. LAND USE | | | | |
| <i>There are no significant impacts related to land use.</i> | | | | |
| H. NOISE | | | | |
| NOISE-1: Noise levels from construction activities may range up to 85 dBA L _{max} at the nearest land uses to the project site for a limited time period. | <p>NOISE-1: The following measures shall be implemented during construction of the proposed project.</p> <ul style="list-style-type: none"> • All construction vehicles or equipment, fixed or mobile, shall be equipped with properly operating and maintained mufflers. • As part of the proposed project, all operations would comply with the noise ordinance standards, and stockpiling and/or | Construction Manager, Planning Director | During Construction. | |

| Significant Impacts | Mitigation Measures | Monitoring Responsibility | Schedule for Implementing Mitigation Measure | Completion Date |
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| | vehicle staging areas would be located as far as practicable from dwellings. <ul style="list-style-type: none"> Construction activities shall be restricted to between 7:00 a.m. and 9:00 p.m. Monday through Saturday, and 10:00 a.m. and 6:00 p.m. on Sundays or federal holidays. | | | |
| NOISE-2: Local traffic will generate long-term noise levels exceeding 60 dBA CNEL on the project site. | NOISE-2: Proposed sensitive land uses will require the following mitigation measures. <ul style="list-style-type: none"> Sound walls (Plexiglas or equivalent material with a minimum height of 6 feet) would be required for any balconies located along Eaton Road. To achieve the indoor fresh-air ventilation requirements specified in Chapter 35 of the Uniform Building Code, all units adjacent to Eaton Road will require mechanical ventilation to ensure that windows can remain closed for a prolonged period of time. | Planning Director | Prior to occupancy of residential uses along Floral Avenue and Eaton Road. | |
| NOISE-3: Long-term stationary noise sources on the project site could potentially generate noise levels in excess of the thresholds set in the City's Municipal Code. | NOISE-3: The following measures are required for the operations of the proposed project: <ul style="list-style-type: none"> All on-site stationary noise sources shall comply with the standards listed in Section 9.38.030 of the City's Municipal Code. Loading docks or loading areas and noise-generating equipment associated with the retail uses will be located as far as practical from all existing and planned residential uses. | Planning Director | During the lifetime of the project. | |
| NOISE-4: Homes within the 55 dB CNEL noise contour would be impacted by noise from aircraft overflights. | NOISE-4: Prior to the issuance of building permits for any residential structures within the 55dB CNEL noise contour, the building division shall verify that homes within this area shall be constructed utilizing noise attenuation features to reduce interior noise levels to less than 45 dB CNEL within all habitable rooms. Attenuation features that may be incorporated to meet this criterion could include, but are not limited to, special noise insulating construction and the installation of air conditioning so that windows can be kept closed. | Building Official. | Prior to issuance of building permits. | |
| I. PUBLIC SERVICES | | | | |
| <i>There are no significant impacts related to public services.</i> | | | | |
| J. TRANSPORTATION AND CIRCULATION | | | | |
| TRANS-1: Implementation of the proposed project may create demand for public transit service above that which is | TRANS-1: The project applicant shall work with BCAG to ensure that sufficient service is provided to the study area, if deemed necessary by BCAG. In addition, the project shall coordinate with | Planning Director, Public Works Director | Prior to approval of Eaton Road | |

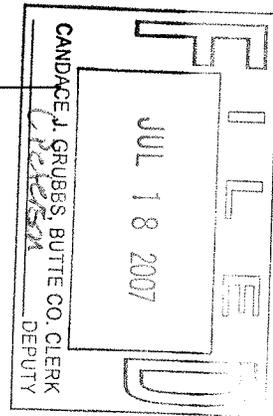
| Significant Impacts | Mitigation Measures | Monitoring Responsibility | Schedule for Implementing Mitigation Measure | Completion Date |
|---|--|---------------------------|--|-----------------|
| currently planned or provided for by the City of Chico. | BCAG to provide two convenient transit stops within the project site. The transit stops shall be located on Eaton Road and shall include pedestrian shelters. In addition, adequate bus turn-out areas shall be provided so that stopped buses do not interfere with through vehicles on the roadway system. | | Improvement Plans. | |
| K. UTILITIES | | | | |
| <i>There are no significant impacts related to utilities.</i> | | | | |

NOTICE OF DETERMINATION

TO: Office of Planning and Research
P.O. Box 3044
Sacramento, CA 95812-3044

From: City of Chico Planning Office
P. O. Box 3420
Chico, CA 95927
(530) 879-6800

County Clerk
County of Butte
25 County Center Drive
Oroville, CA 95965



DATE RECEIVED FOR FILING

Subject: Filing of Notice of Determination in compliance with Section 21008 or 21152 of the Public Resources Code.

Project Title: Mountain Vista/Sycamore Glen Vesting Tentative Subdivision/Planned Development Permit (S/PDP 01-12 and S/PDP 00-11) and General Plan Amendment/Rezone 04-08 (Greenline Preservation Associates)

State Clearinghouse No. (If Applicable): 2003042068

Lead Agency Contact: Bob Summerville, Senior Planner Area Code/Telephone: (530) 879-6807

General Project Location: Chico, Butte County

Project Location - Specific: The site is generally bounded by Floral Avenue on the west, Sycamore Creek on the north, Ceanothus Avenue on the east, and on the south by an existing Pacific Gas and Electric (PG&E) easement with electrical lines, Assessor's Parcel Numbers 016-200-067, -069, -070, -071, and -072

Description of Project: To subdivide a vacant, 178-acre site comprised of five adjacent parcels with two vesting tentative subdivision maps to allow for the development of up to 679 residential units (409 single-family homes and 270 multi-family units) and up to 25,000 square feet of neighborhood commercial building area. The combined subdivisions include the dedication of approximately 56 acres of permanent open space to the City of Chico for the preservation, restoration, and enhancement of wetland resources along the south side of Sycamore Creek. The project also includes a General Plan Amendment and Rezone to create a mix of housing types and establish a Mixed Use Neighborhood Core with a neighborhood commercial area surrounded by low, medium, and medium-high density housing.

This is to advise that the City of Chico City Council, as Lead Agency, has certified an environmental impact report for the above described project on July 17, 2007 and has made the following determination regarding the above described project:

1. The project will will not have a significant effect on the environment.
2. An Environmental Impact Report was prepared for this project pursuant to CEQA.
3. A negative declaration was prepared for this project pursuant to the provision of CEQA.
4. Mitigation measures were made a condition of approval of the project.
5. A statement of overriding considerations was was not adopted for this project.
6. Findings have have not been made pursuant to Sections 15091 and 15093 of the CEQA guidelines and significant adverse environmental effects are considered acceptable.
7. Findings were made were not made pursuant to Section 15074 (b) that there is no substantial

evidence that the project will have a significant impact on the environment and this determination is based on independent judgement and analysis.

This is to certify that the final Environmental Document with comments and responses and record of project approval is available to the General Public at the City of Chico Planning Office, 411 Main Street, Chico, CA 95928.

Signature:  Date: July 18, 2007 Title: Senior Planner

DECLARATION OF FEES DUE
(California Fish and Game Code Section 711.4)

FOR CLERK USE ONLY

NAME AND ADDRESS OF LEAD AGENCY/APPLICANT:

City of Chico
P. O. Box 3420
Chico, CA 95927
(530) 879-6800

Project: Mountain Vista/Sycamore Glen Vesting Tentative Subdivision/Planned Development Permit (S/PDP 01-12 and S/PDP 00-11) and General Plan Amendment/Rezone 04-08 (Greenline Preservation Associates)

General Project Location: Chico, Butte County

Project Location - Specific: The site is generally bounded by Floral Avenue on the west, Sycamore Creek on the north, Ceanothus Avenue on the east, and on the south by an existing Pacific Gas and Electric (PG&E) easement with electrical lines, Assessor's Parcel Numbers 016-200-067, -069, -070, -071, and -072

FILING NO.

CLASSIFICATION OF ENVIRONMENTAL DOCUMENT:

1. NOTICE OF EXEMPTION/STATEMENT OF EXEMPTION
 A. Statutorily or Categorically Exempt
 \$50.00 (Fifty Dollars) Butte County Clerk's Filing Fee

2. NOTICE OF DETERMINATION - FEE REQUIRED
 A. Negative Declaration
 \$1,800.00 (Eighteen Hundred Dollars) State Filing Fee
 \$50.00 (Fifty Dollars) Butte County Clerk's Filing Fee
 B. Environmental Impact Report
 \$2,500.00 (Twenty-five Hundred Dollars) State Filing Fee
 \$50.00 (Fifty Dollars) Butte County Clerk's Filing Fee

3. OTHER (Specify) General Rule Exemption
 \$50.00 (Fifty Dollars) Butte County Clerk's Filing Fee

TWO COPIES OF THIS FORM MUST BE COMPLETED AND SUBMITTED WITH ALL ENVIRONMENTAL DOCUMENTS FILED WITH THE BUTTE COUNTY CLERK'S OFFICE.

ALL APPLICABLE FEES MUST BE PAID AT THE TIME OF FILING ANY ENVIRONMENTAL DOCUMENTS WITH THE BUTTE COUNTY CLERK'S OFFICE.

THREE COPIES OF ALL NECESSARY DOCUMENTS ARE REQUIRED FOR FILING PURPOSES.

THE \$50.00 HANDLING FEE IS REQUIRED PER FILING IN ADDITION TO THE FILING FEE SPECIFIED IN FISH AND GAME CODE SECTION 711.4(d).

MAKE CHECKS PAYABLE TO COUNTY OF BUTTE.
(10/14/02)