4 OTHER STATUTORY REQUIREMENTS

4.1 GROWTH-INDUCING IMPACTS

4.1.1 INTRODUCTION

According to the State CEQA Guidelines (California Code of Regulations [CCR] Section 15126.2[d]), an EIR must discuss the growth-inducing impacts of a project. A growth-inducing impact would lead to economic or population growth or would encourage development or other activities that could result in physical impacts on the environment. Specifically, CEQA states that the EIR shall:

> [d]iscuss the ways in which the proposed project could foster economic or population growth, or the construction of additional housing, either directly or indirectly, in the surrounding environment. Included in this are projects that would remove obstacles to population growth (a major expansion of a wastewater treatment plant might, for example, allow for more construction in service areas). Increases in the population may tax existing community service facilities, requiring construction of new facilities that could cause significant environmental effects. Also, discuss the characteristics of some projects which may encourage and facilitate other activities that could significantly affect the environment, either individually or cumulatively. It must not be assumed that growth in any area is necessarily beneficial, detrimental, or of little significance to the environment.

Direct growth-inducement would result if a project involved construction of new housing. Indirect growth-inducement would result, for instance, if implementing a project resulted in any of the following:

- substantial new permanent employment opportunities (e.g., commercial, industrial, or governmental enterprises);
- a construction effort with substantial short-term employment opportunities that indirectly stimulates the need for additional housing and services to support the new temporary employment demand; or,
- removal of an obstacle to additional growth and development, such as removing a constraint on a required public utility or service (e.g., construction of a major sewer line with excess capacity through an undeveloped area) or adding development adjacent to undeveloped land.

Growth-inducement itself is not an environmental effect, but it may foreseeably lead to environmental effects. These environmental effects may include increased demand on other community and public services and infrastructure, increased traffic and noise, degradation of air or water quality, degradation or loss of plant or animal habitats, or conversion of agricultural and open space land to urban uses.

4.1.2 SUMMARY OF GROWTH PLANNED IN THE CITY OF RANCHO CORDOVA GENERAL PLAN

The Rancho Cordova General Plan (City General Plan) reflects an approach that combines specific land use designations in some areas of Rancho Cordova and more general descriptions of land uses in areas planned for future growth (i.e., Planning Areas), which have been incorporated as part of the City General Plan. These Planning Areas are described in general terms, but have not been specifically mapped with land use designations. Detailed plans (e.g., specific plans or similar planning tools) are required for implementation of the Planning Areas.

The City General Plan Housing Element was adopted on December 7, 2009. The population data in the City's adopted Housing Element is drawn largely from the Regional Housing Needs Plan (RHNP), prepared by the Sacramento Area Council of Governments (SACOG). As presented in the Housing Element, Rancho Cordova's population was anticipated to increase from 53,378 to 89,275 from 2005-2010 and to 183,362 in 2030. To comply with the targets discussed in the RHNP, the City of Rancho Cordova would need to provide 10,395 new housing units by 2013. At the time of release of the City General Plan Housing Element Update (2009), the City had 552.6 acres of vacant land zoned for single-family homes in addition to 29,805 units proposed in Specific Plan projects and Special Planning Areas (City of Rancho Cordova 2009).

4.1.3 GROWTH-INDUCING IMPACTS OF THE PROJECT

DENSITY OF DEVELOPMENT

The SPA is currently zoned by the City of Rancho Cordova zoning codes as AG-80 (agricultural, 80-acre minimum lot size) and AG-20 (agricultural, 20-acre minimum lot size). However, the SPA is identified in the City General Plan as part of the SunCreek/Preserve Planning Area (City of Rancho Cordova 2006a: Figure 3.0-15). Land uses proposed in the SPA as part of the SunCreek/Preserve Planning Area would consist of: public/quasi-public, park and open space, natural resources, residential-mixed density, and commercial mixed use (City of Rancho Cordova 2006b:83). The City General Plan states that proposed land uses within Planning Areas are considered to be conceptual and are intended to reflect the City's Building Block concepts and relevant goals, policies, and actions.

The City General Plan anticipated the SunCreek portion of the planning area would develop 5,104 dwelling units and generate 1,331 jobs and 13,526 new residents by 2030 (City of Rancho Cordova 2006a:4.1-25, City of Rancho Cordova 2009:78). Depending on the project alternative chosen, implementation of the project would include 4,235–5,399 new residential units, 196–2,854 jobs, and generate an estimated population of 11,349–14,469 new residents at full buildout.

SACRAMENTO AREA COUNCIL OF GOVERNMENTS' SACRAMENTO REGION BLUEPRINT

The Sacramento Region Blueprint is advisory and therefore does not establish land use restrictions on any jurisdiction. SACOG has no land use authority. SACOG makes clear that the land use designations presented on the Blueprint Preferred Scenario are conceptual and reflect general land use locations in a local area. Although it is only advisory, the Blueprint provides policy guidance in the Sacramento region for long-term regional land use and transportation planning that would potentially result in the protection of additional natural resources (because less land would be required for urban uses), less conversion of agricultural land, and reduction in traffic that would improve air quality in the region. Although the Blueprint is only advisory, the City encourages the types and intensity of land uses shown in the Preferred Blueprint Scenario.

The SACOG Blueprint Preferred Scenario anticipates an additional 112,000 households and 144,000 jobs in Rancho Cordova between 2000 and 2050. The Blueprint assumes Rancho Cordova would have a population of over 332,000 people by 2050 and a fairly even mixture of jobs and housing and this growth would occur through development on underutilized lands along and near Folsom Boulevard and lands inside the current Urban Services Boundary (USB). Housing is expected to be primarily single-family detached homes plus multifamily units (attached rowhouses, townhomes, condominiums, and apartments) to ensure housing for the growing population and work force (SACOG and Valley Vision 2004).

Sacramento County is experiencing demographic pressure reflecting an increasing statewide population and has experienced in the past intrastate migration from the San Francisco Bay Area. The City of Rancho Cordova is interested in furthering its goals and objectives of providing a mix of housing and new jobs to its residents. Smart growth principles therefore suggest that developing the SPA with a higher density use while avoiding wetland areas would focus market demand for development into an area near existing development, infrastructure, and

services. Further, higher densities make public transit more feasible, potentially taking relative pressure off highways compared with traditional automobile-dependent development. The Proposed Project Alternative incorporates the Smart Growth principles envisioned by SACOG. These features are summarized below:

- **Transportation Choices:** A public transit corridor would be designed to accommodate a range of transit services including buses, trolleys, and shuttles. Alternative transportation would be provided through a network of off-street trails that would connect residential, commercial, office, community/civic, and open space areas that could be used by bicyclists and pedestrians.

- **Mixed-Use Development:** Mixed-use centers would be strategically located to implement the City's building block concept of neighborhoods served by centers in walking distance of residents to ensure horizontal integration of compatible uses.

- **Compact Development:** Small, pedestrian friendly neighborhoods interwoven with a variety of open space areas both large and small would be linked together by an extensive network of trails. Walkable neighborhoods would be located where residents can easily walk from their homes to schools, parks, jobs, and shopping areas.

- **Housing Choice and Diversity:** A variety of housing types are proposed to better serve the economic diversity of local homebuyers, including high density apartments, mixed use residential, and executive homes.

- **Use of Existing Assets:** Land uses would be linked to existing major roadways, such as Sunrise Boulevard, Americanos Boulevard, and Grant Line Road.

- **Quality Design:** The project intended to provide a variety of high-quality neighborhood, commercial areas, town center, and neighborhood center designs, appropriate to the scale and use of these areas. Open space, recreational uses, and parks are proposed throughout the community and integrated within its design.

- **Natural Resource Conservation:** Substantial, permanent open space areas would be established to protect vernal pool complexes, other wetlands, and the riparian habitats.

The Blueprint identifies the SPA as a future planned community accommodating the long-term needs of Rancho Cordova and contributing to the Sacramento region. The Blueprint Vision generally consists of medium and low density residential housing over nearly the entire SPA. The SACOG Blueprint designated the SPA as Single Family Large Lot, Medium-Density Mixed Residential, Low-Density Mixed-Use Center or Corridor, Open Space, and Agriculture (see Exhibit 3.10-4 in Section 3.10, "Land Use and Agricultural Resources"). (Note that the SACOG Blueprint is a regional plan and does not precisely correspond with the SPA boundary and land use designations along Kiefer Boulevard do not correspond to the aerial image; as a result, it is reasonable to assume that the Single Family Large Lot SACOG land use designation is outside of the SPA project boundary.) The Medium-Density Mixed Residential and Low-Density Mixed-Use Center or Corridor land use designations emphasize residential development with approximately 85% to 90% of the urban land uses consisting of small-lot single-family dwelling units; site single-family large-lot dwelling units; site multifamily attached units such as apartments, condominiums, townhouses, and residential mixed use and approximately 10% to 15% of the urban development consisting of retail and commercial land uses.

The Proposed Project Alternative fulfills the principles of smart growth identified in the Blueprint. As discussed above, this alternative would allow for a system of multimodal transportation; would provide a variety of mixed-use areas and a range of housing choices; and would emphasize compact development, quality design, and natural resource conservation. Development of the Proposed Project Alternative would result in 86% residential land uses and 14% commercial land uses, which would be equal to the intensity of development identified in the Blueprint for the SPA. Although the Biological Impact Minimization, Conceptual Strategy, and Increased Development Alternatives would result in a slightly greater density of residential development and less commercial development than identified in the Blueprint for the SPA, these alternatives would be consistent with the planned

build out of the Rancho Cordova General Plan and would still fulfill the principles of smart growth identified in the Blueprint. Furthermore, there would be no expansion of infrastructure to facilitate future unplanned growth. For these reasons, the Proposed Project Alternative or any of the other four action alternatives would not be growth inducing.

ROADWAY IMPROVEMENTS

Access to the SPA would be provided by improved roads along existing roadway alignments in the project vicinity and new roads within the SPA itself. The following off-site roadway improvements would be necessary to serve the Proposed Project or the other four action alternatives, all of which would serve the project and provide access through the SPA to adjacent properties (see Section 3.15, "Traffic and Transportation," for intersection and roadway segment number correlations):

- Zinfandel Drive and International Drive Extensions—Sunrise Boulevard/Douglas Road, Sunrise Boulevard/White Rock Road, and Sunrise Boulevard/Folsom Boulevard intersections (Intersections 9, 18, and 19, respectively)
- Potential widening of the structure across U.S. 50—Hazel Avenue/U.S. 50 eastbound ramps and Hazel Avenue/U.S. 50 westbound ramps intersections (Intersections 24 and 25, respectively)
- International Drive Extension—Kilgore Road/White Rock Road intersection (Intersection 28)
- Widening of the existing crossing of the Folsom South Canal—Douglas Road between Mather Boulevard and Sunrise Boulevard (Roadway Segment 5)
- Improvements to White Rock Road between Sunrise Boulevard and Grant Line Road (Roadway Segment 9)
- New river crossings of the American River—Sunrise Boulevard between Gold Country Boulevard and Coloma Road and Sunrise Boulevard between Coloma Road and the U.S. 50 westbound ramps (Roadway Segments 17 and 18, respectively)
- Improvements to Sunrise Boulevard between Folsom Boulevard and White Rock Road (Roadway Segment 20)
- Improvements to Sunrise Boulevard between White Rock Road and Douglas Road (Roadway Segment 21)
- Improvements to Douglas Road between Rancho Cordova Parkway and Sunrise Boulevard (Roadway Segments 7)
- Improvements to Sunrise Boulevard between Douglas Road and Kiefer Boulevard (Roadway Segment 38 and 39)

These improvements, which would also serve the SPA, were identified as necessary to serve existing traffic and future development in the Sunrise Douglas Community Plan/Sunridge Specific Plan area and these roadway improvements have already been planned for and evaluated in the City General Plan. Therefore, implementation of the Proposed Project or any of the other four action alternatives are not considered growth-inducing.

UTILITIES AND SERVICE SYSTEMS

Stormwater Drainage

No public storm drain facilities currently serve the SPA. A network of conveyance pipes, inlets, manholes, and regulating structures would direct runoff flows into a total of 12 on-site detention basins (see Exhibits 2-4 and 2-5

in Chapter 2, "Alternatives") that would serve as combined water quality, peak flow attenuation, and hydro-modification flow-duration control facilities. Approximately 5 acres of stormwater canals would also be created.

Two hydromodification modeling scenarios were evaluated in the SunCreek Drainage Study (MacKay & Somps 2011 [Appendix D to this DEIR/DEIS]). Under the Alternative 'A' Model scenario, the on-site detention basins would not be sized or intended to serve any new development on lands other than the SPA and therefore would not be growth-inducing. Under the Alternative 'B' Model scenario, the design of on-site detention basins 3, 5, and 7 would be modified to serve existing and future development that has been planned and authorized within the Anatolia III development north of the SPA. These detention basins would not be sized to serve development beyond what is planned in the SPA and Anatolia III development; therefore, the Alternative 'B' Model scenario would also not be growth-inducing.

Water Supply

The Sacramento County Water Agency (SCWA) would provide water supplies to the SPA through its Zone 40 conjunctive-use water supply system. The SPA is identified as a subarea within Zone 40 known as the North Service Area (NSA). The water supplies necessary to serve the NSA area, including the SPA, were considered and evaluated as part of the *2002 Zone 40 Water Supply Master Plan* EIR (SCWA 2004) and specifically in the *Revised Sunrise Douglas Community Plan/Sunridge Specific Plan Long-Term Water Supply Plan Draft EIR* (AECOM 2011).

The water demand for the SPA was estimated in SCWA's *2005 Zone 40 Water Supply Master Plan* (Zone 40 WSMP) to be 3,176 acre-feet per year (afy) by 2030, and this total is reflected in the *2005 Zone 41 Urban Water Management Plan* (SCWA 2011:8). The total projected water demands based on SCWA's Zone 40 water-demand factors are 2,033 afy for the No USACE Permit Alternative, 3,058 afy for the Proposed Project Alternative, 2,672 afy for the Biological Impact Minimization Alternative, 2,952 afy for the Conceptual Strategy Alternative, and 3,478 afy for Increased Development Alternative. Because the water supply demand under the No USACE Permit, Proposed Project, Biological Minimization, and Conceptual Strategy Alternatives is less than the water demand estimated by SCWA for the SPA (3,176 afy), sufficient water supplies would be available to meet water demands for these alternatives (SCWA 2011:27). However, water supply demand under the Increased Development Alternative (3,478 afy) is greater than the water demand estimated by SCWA for the SPA (3,176 afy); an increase of approximately 302 afy. SCWA has stated that "it is unclear there would be sufficient water available during normal, single dry, and multiple-dry years to meet these water demands; additional analysis would be required if this alternative were to be approved by the City of Rancho Cordova and/or U.S. Army Corps of Engineers." (WSA [Appendix V to this DEIR/DEIS].) In the long term, SCWA anticipates the majority of water demands in the NSA (including the SPA) would be met with surface water. However, the year-to-year mix of surface and groundwater varies depending on a large number of variables and surface water and groundwater supplies would be adjusted as necessary to meet the demands of the NSA as part of its conjunctive use program (MacKay & Somps 2011:8, SCWA 2006:4-31). Implementing the Proposed Project or other four action alternatives would not cause capacity to be added to SCWA's existing or planned water systems; therefore, they would not be growth-inducing.

There are no public water supply facilities within the SPA, and the project would require construction of a new water system. The on-site water pipelines would be sized to accommodate project-related water demands. To meet water demands of the NSA, including the SPA, three groundwater wells, the SunCreek Water Treatment Plant, a storage tank, and booster pump stations could potentially be constructed east of Sunrise Boulevard and south of Kiefer Boulevard in the southern portion of the SPA. These water supply facilities would serve the demands of the SPA and future development that has already been planned in the NSA by SCWA in the Zone 40 WSMP and the Zone 40 WSIP, and evaluated in the Zone 40 WSMP EIR. Therefore, on-site water supply transmission and distribution facilities would not be growth inducing.

Wastewater Conveyance

The SPA is presently not served by any municipal wastewater collection and treatment systems. Project implementation would result in increased generation of wastewater and construction of wastewater collection and conveyance facilities. The proposed on-site sewer system would be constructed specifically to serve the project and would be sized to accommodate planned project sewer flows and would be incrementally expanded to meet the demands of the SPA.

The wastewater flows generated by the project have been planned for in the *SRCSD Interceptor System Master Plan 2000* (SRCSD 2003a). The master plan anticipates that project-related wastewater flows would be conveyed from the SPA to the Sacramento Regional Water Treatment Plant (SRWTP) via the Laguna Creek Interceptor (LCI) Sections 1–5. The project would construct Section 5 of the LCI that is within the SPA. In addition to serving the project, Section 5 of the LCI would be sized to accommodate proposed upstream developments of Anatolia III, Cordova Hills, Arista Del Sol, Arboretum, and portions of the Ranch at Sunridge (MacKay & Somps 2009:13 [attached as Appendix I to this DEIR/DEIS]). The *SRCSD Interceptor System Master Plan 2000* assumes buildout of these areas would be beyond the plan's 2020 planning horizon; however, the wastewater flows generated by these areas at buildout were planned for and evaluated in the master plan.

Until Sections 1–4 of the LCI are constructed, project-related wastewater flows would be conveyed from Section 5 of the LCI through existing gravity sewer pipelines and sewer force mains to the Anatolia III and/or Chrysanthy Boulevard sewer pump stations and then to the Northwest Interceptor (see Chapter 2 "Alternatives," Section 2.3.4, "Sewer" for a detailed description of sewer service options for the SPA). If the Mather Interceptor is constructed and in service before Sections 1–4 of the LCI, project-related wastewater flows could be conveyed from north from the Chrysanthy Boulevard sewer pump station through the Mather Interceptor to Section 7B of the Bradshaw Interceptor. The Mather Interceptor would be sized to serve the Villages of Zinfandel located northeast of the former Mather Air Force Base (AFB) and could provide interim sewer service to the SPA, including the upstream developments of Anatolia III, Cordova Hills, Arista Del Sol, Arboretum, and portions of the Ranch at Sunridge and the Aerojet area, including the Rio del Oro Specific Plan area, until the LCI and Aerojet Interceptor are constructed and in service (Sacramento County 2007:2-2). After the Aerojet Interceptor and LCI are constructed and in service, wastewater flows from the SPA and the upstream developments of Anatolia III, Cordova Hills, Arista Del Sol, Arboretum, and portions of the Ranch at Sunridge; and the Aerojet area would be pumped through these interceptors and the Mather Interceptor would only serve the Villages of Zinfandel (Sacramento County 2007:2-1). Because the wastewater flows generated by the project as well as wastewater flows generated by other development within the SRCSD service area were planned for and evaluated in the *SRCSD Interceptor System Master Plan 2000*, implementation of the Proposed Project or any of the other four action alternatives would not cause unplanned capacity to be added to SRCSD's existing or planned wastewater facilities and therefore would not be growth inducing.

WASTEWATER TREATMENT

Collected wastewater flows from the SPA would ultimately be transported to the SRWTP for treatment and disposal. Sacramento County evaluated the environmental impacts of construction and operation of the SRWTP for up to 218 mgd of flow capacity in the *Sacramento Regional Wastewater Treatment Plant 2020 Master Plan Draft Environmental Impact Report* (SRCSD 2003b) (SCH #002052004).

Currently, the SRWTP has a National Pollutant Discharge Elimination System permit issued by the Central Valley Regional Water Quality Control Board (RWQCB) for discharge of up to 181 mgd of treated effluent into the Sacramento River.

The wastewater flows generated by the project have been planned for in the *Sacramento Regional Wastewater Treatment Plant 2020 Master Plan* (2020 Master Plan) (2001). The 2020 Master Plan (2001) provides a phased program of recommended wastewater treatment facilities and management programs to accommodate planned

growth and to meet existing and anticipated regulatory requirements through the year 2020. As of 2010, the SRWTP receives and treats an average of 150 mgd (SRCSD 2010). In June 2010, SRCSD removed its formal request to the Central Valley RWQCB for an increase in permitted wastewater discharge capacity. Flows to the SRWTP have decreased from water conservation efforts over the last 10 years and it is anticipated that state legislation passed in 2009, which mandates further water conservation efforts, could substantially reduce the amount of wastewater in the future. In light of this reduced growth, the SCRSD has withdrawn its application to expand the treatment plant. If substantial population growth or new development occurs before 2020, the SRCSD will reevaluate expansion needs and phase treatment plant expansion to provide for sufficient long-term capacity as necessary to meet demand for wastewater treatment. The 2020 Master Plan relies on SACOG's population projections to determine SRWTP capacity requirements within the SRCSD service area through 2020 (SRCSD 2003b:3-22). Note that this total does not represent a buildout population total for SRCSD; rather, it represents the amount of growth expected within SRCSD based on population projections within its service area. Because the SPA is within the SRCSD service area, the projected SRWTP capacity specifically includes the wastewater flows generated on the SPA through 2020. Because wastewater flows generated by the project as well as development within the SRCSD service area have been planned for in the 2020 Master Plan, implementation of the Proposed Project or any of the other four action alternatives would not cause unplanned wastewater treatment capacity to be added to the SRWTP and therefore would not be growth inducing.

CONSTRUCTION-RELATED HOUSING DEMAND

Project construction activities would occur at intervals throughout the planning horizon of the project, and the SPA would ultimately be built out in approximately 20 years (2012–2032). It is estimated that project-related construction would generate approximately 780 construction jobs during the peak construction period of each of the three phases (for information on project phasing, please refer to Section 2.3.6, "Project Phasing and Construction" in Chapter 2, "Alternatives"). A greater number of construction workers would be employed during peak construction periods (determined by market demand and overall economic conditions), while fewer construction workers would be employed during nonpeak periods.

Construction workers serving the project can be expected to come from Rancho Cordova, Sacramento County, and from nearby communities. According to the latest labor data available from the U.S. Census Bureau (2009), it is estimated that 2,917 residents in Rancho Cordova and 59,225 residents in Sacramento County were employed in the construction industry. Although the current number of residents employed in construction is lower in 2011 due to the economic downturn, the construction industry in Sacramento County is more than sufficient to meet the demand for construction workers that would be generated by the project. Furthermore, the project would be constructed over a 20-year time frame. Because construction workers serving the project could be expected to come from Rancho Cordova itself and from nearby communities in Sacramento County, neither substantial population growth nor an increase in housing demand in the region is anticipated as a result of these jobs. Furthermore, because construction workers typically do not change residences each time they are assigned to a new construction site, it is not anticipated that there would be any substantial project-related relocation of construction workers to the immediate project area.

PUBLIC SERVICES

Under the No USACE Permit, Proposed Project, Biological Impact Minimization, and Conceptual Strategy Alternatives a new fire station would be constructed to meet the increased demand for fire protection services in the SPA. The timing of construction and staffing of the fire station would be completed in a manner that ensures that adequate levels of service are provided. Under the Increased Development Alternative, the fire station would not be constructed and this alternative would potentially result in a need for additional off-site fire protection facilities and services to meet the demands of the project. Funding for fire services and facilities resulting from new construction is facilitated through SMFD's Capital Fire Facilities Fee Schedule and the project applicants would fund the cost to provide fire services to the SPA without reducing current service levels.

The project proposes to construct three elementary schools at different locations within the SPA and these elementary schools could accommodate all students generated by the Proposed Project and the other four action alternatives as well as other students residing elsewhere in Rancho Cordova. One combined middle school and high school would be constructed in the SPA under the Proposed Project, Biological Impact Minimization, Conceptual Strategy, and Increased Development Alternatives. Once constructed, the combined middle school and high school would have sufficient capacity to meet the demands of project-generated middle school and high school students under the these alternatives and would not result in a shortfall of school services or facilities. In addition, the combined middle school and high school would have capacity to accommodate additional students that would be generated by planned growth as projected in the City General Plan. The EGUSD has approximately nine elementary school sites and two middle school/high school sites planned in the Sunrise-Douglas area, which includes those proposed in the SPA, with opening dates to be determined based on market conditions and associated student generation.

Under the No USACE Permit Alternative, the combined middle school and high school would not be constructed. This alternative would not accommodate the middle school/high school students living in the SPA, resulting in a shortfall of school services and facilities. Students generated by the No USACE Permit Alternative would be redirected to other schools in the EGUSD that have available capacity and no new middle school or high school facilities would be constructed to serve students generated by this alternative (Grambusch, pers. comm., 2010).

Implementing the No USACE Permit, Proposed Project, Biological Impact Minimization, Conceptual Strategy, and Increased Development Alternatives would not facilitate additional development with respect to public services because additional public services would be available to meet project demands, and it would not create additional public service capacity in Rancho Cordova beyond what would be necessary to serve project development and growth already planned and evaluated in the City General Plan. Therefore, the project would not be growth inducing with respect to public services.

JOBS/HOUSING BALANCE

As described in Section 3.13, "Population, Employment, and Housing," the simplest measure of jobs/housing balance is an index based on the ratio of employed residents (which is influenced by the number of homes) to jobs in the area. An index of 1.5 indicates a jobs/housing balance. An index above 1.5 indicates employment growth outpacing housing growth and, therefore, there are more jobs than employed residents, and may suggest that many employees are commuting in from outside the community. An index below 1.5 indicates housing growth outpacing employment growth and, therefore, there are more employed residents than jobs and may suggest that many residents are commuting to jobs outside the community. The average number of workers per household can vary from community to community, and the standard should be based on an analysis of local data on workers per household. A range of 1.3 to 1.6 is often recommended to signify jobs/housing balance (Weitz 2003:21). For the Proposed Project and the other four action alternatives, the jobs/housing indices were determined by dividing the projected number of jobs by the projected number of housing units.

The estimated number of jobs generated by the project and the number of employable residents in the SPA would depend on the project alternative chosen for development. The jobs/housing index would be 0.07 for the No USACE Permit Alternative (299 jobs and 4,360 housing units), 0.6 for the Proposed Project Alternative (2,854 jobs and 4,698 housing units), 0.05 for the Biological Impact Minimization Alternative (196 jobs and 4,235 housing units), 0.1 for the Conceptual Strategy (480 jobs and 4574 housing units), and 0.1 for the Increased Development Alternative (609 jobs and 5,399 housing units). Regardless of the alternative implemented, the project would be housing-rich, with housing generated in excess of proposed number of jobs.

The jobs/housing index for Rancho Cordova was 2.70 in 2005 and is projected to decrease to 1.29 in 2035 with the development of housing projects identified in the City's General Plan, including the project (SACOG 2007:15-3). The 2035 jobs/housing index indicates that the jobs/housing balance is expected to improve over the long term. However, Rancho Cordova will continue to have an imbalance between housing and jobs, with

employment growth outpacing housing growth. In this respect, the excess housing associated with Proposed Project and the other four action alternatives could accommodate employed residents and the project would not result in additional housing demand in the City; therefore, the project would not be growth inducing in this respect.

CONVERSION OF ADJACENT UNDEVELOPED LAND TO URBAN DEVELOPMENT

The SPA is located within the Sunrise Douglas Community Plan area in the city limits of the City of Rancho Cordova and is generally undeveloped and sporadically used for dry land farming and grazing on spring grasses. Under existing conditions, adjacent land uses to the SPA include the Anatolia III development to the west, which has been partially constructed, but is still under construction, and vacant land to the north, east, and south. Other nearby land uses include Kiefer Landfill, located approximately 1 mile southeast of the SPA, and the Sacramento Rendering Company, which is located southwest of the SPA at the intersection of Sunrise Boulevard and Kiefer Boulevard. Mather Airport (formerly Mather AFB) is located approximately 3 miles northwest of the SPA.

Rancho Cordova is in the process of urbanization, and various residential, commercial, and mixed-use projects in the Sunrise Douglas Community Plan/Sunridge Specific Plan area are either in the planning process, under environmental review, have been approved, or are under construction, including Anatolia I, II, and IV, and Montelena to the northwest; Sunridge Lot J, Sunridge Park, Douglas 103 and 98, Grantline 208, The Ranch at Sunridge, and Arista Del Sol to the north and northeast; and Arboretum to the south. In addition, the Rio del Oro Planning Area and the Grant Line North Planning Area are north and south, respectively, of the SPA within the city limits. The Rio del Oro Specific Plan was prepared in 2006 and approved by the City in 2010; however, the timeframe for development of Rio del Oro is currently unknown. A portion of the Arboretum Specific Plan project is within the Grant Line North Planning Area and an EIR/EIS is currently being prepared for that project. Projects within the Sunrise Douglas Community Plan/Sunridge Specific Plan area, Rio del Oro Planning Area, and Grant Line North Planning Area have converted or would convert predominantly grazing and undeveloped lands to urban uses. (See Exhibit 3.0-1 in Section 3.0.2, "Cumulative Context," and Exhibit 3.10-1 in Section 3.10, "Land Use and Agricultural Resources.") Conversion of the SPA and lands within the Sunrise Douglas Community Plan/Sunridge Specific Plan area, Rio del Oro Planning Area, and Grant Line North Planning Area to urban uses is consistent with the long-term planning for the City and the decision to urbanize these areas and convert them to urban uses was made with adoption of the existing City General Plan in 2006. In summary, much of the growth that the project would induce has been evaluated and provided for in the City of Rancho Cordova General Plan.

The lands northwest of the SPA are within the Mather Planning Area and lands southwest of the SPA are within the Jackson Planning Area. Therese planning areas are outside of the existing city limits within unincorporated areas Sacramento County that is governed by the Sacramento County General Plan. The Mather Planning Area currently consists of the Independence at Mather residential development, the Mather Regional Park, and other open space areas and the Jackson Planning Area includes wetland preserves, conservation easements, and the Sacramento Rendering Company. These planning areas have been identified in the City General Plan as areas for future urban development. As discussed above, conversion of lands within the Mather Planning Area and Jackson Planning Area to urban uses is consistent with the long-term planning for the City and the decision to urbanize these areas and convert them to urban uses was made with adoption of the existing City General Plan in 2006. However, because the City would be required to annex the Mather Planning Area and Jackson Planning Area into the city limits and amend its general plan, land use designations, and zoning, such a land use conversion to urban development is not assured.

The lands east of the SPA are within the East Planning Area and are outside of the existing city limits within unincorporated areas Sacramento County that is governed by the Sacramento County General Plan. The East Planning Area is undeveloped and predominantly used as grazing land. The proposed Cordova Hills project is within the East Planning Area and is already undergoing the EIR and EIS processes. Conversion of lands within the East Planning Area to urban uses is consistent with the long-term planning for Sacramento County and the decision to urbanize this area and convert it to urban uses was made with adoption of the County General Plan in

2011. Because development of the East Planning Area, including the Cordova Hills project, would require Sacramento County to amend its general plan, land use designations, and zoning, such a land use conversion to urban development is not assured.

4.1.4 SUMMARY OF GROWTH-INDUCING IMPACTS

Overall, the Proposed Project and the other four action alternatives would not be growth-inducing. The urban land uses proposed within the SPA are consistent with the long-term planning for the City and the decision to urbanize this area and convert it to urban uses was made with adoption of the existing City General Plan in 2006. The Proposed Project and the other four action alternatives would be consistent with the types and intensity of land uses shown in the Blueprint Scenario and would fulfill the principles of smart growth identified in the Blueprint. In addition, implementation of the Proposed Project and the other four action alternatives would not be growth inducing for the following reasons.

- Off-site roadway improvements that would be necessary to serve the Proposed Project or the other four action alternatives as well as future development in the Sunrise Douglas Community Plan/Sunridge Specific Plan have already been planned for and evaluated in the City General Plan.

- Sufficient water supplies would be available from SCWA to meet water demands of the Proposed Project or other four action alternatives and would not cause capacity to be added to SCWA's existing or planned water systems.

- On-site detention basins, water supply transmission and distribution facilities, and wastewater collection and conveyance facilities would be constructed specifically to serve the project and would not be sized to serve development beyond what is planned in the SPA.

- Off-site wastewater collection and conveyance facilities and wastewater treatment were planned for and evaluated in the *SRCSD Interceptor System Master Plan 2000* and Sacramento Regional Wastewater Treatment Plant 2020 Master Plan, respectively, and would not cause unplanned capacity to be added to SRCSD's existing or planned wastewater facilities.

- Public services would be available to meet project demands, and the project would not create additional public service capacity in Rancho Cordova beyond what would be necessary to serve project development.

- Housing associated with the Proposed Project and the other four action alternatives could accommodate employed residents and the project would not result in additional housing demand in the City.

Although the Proposed Project and the other four action alternatives include the provision of commercial and retail services, on-site services would meet only some of the needs of the project population. The additional population associated with the project would spur an increase in demand for goods and services in Rancho Cordova and the Sacramento region, which could result in additional development to satisfy this demand. It would be speculative, however, to try to predict exactly where any such new services would be located. The most logical assumption is that they would be located where the existing Rancho Cordova, Sacramento County, and other surrounding communities' general plans currently anticipate them. The general plans have already undergone environmental review and any new individual projects requiring discretionary approvals would be required to undergo their own environmental review.

4.2 IRREVERSIBLE AND IRRETRIEVABLE COMMITMENT OF RESOURCES

CEQA requires that irreversible and irretrievable commitment of resources be addressed for certain categories of projects, including the "[t]he adoption, amendment, or enactment of a plan, policy, or ordinance of a public

agency" and any project also subject to NEPA. (State CEQA Guidelines CCR Sections 15127[a] and 15127[c].) NEPA requires that an environmental analysis include identification of "…any irreversible and irretrievable commitment of resources which would be involved in the proposed action should it be implemented." (Section 102 [42 U.S. Code Section 4332(c)].) Irreversible and irretrievable resource commitments are related to the use of nonrenewable resources and the effects that this use could have on future generations. Irreversible effects result primarily from the use or destruction of a specific resource (e.g., energy and minerals) that cannot be replaced within a reasonable time frame. Irretrievable resource commitments involve the loss in value of an affected resource that cannot be restored as a result of the action (e.g., extinction of a threatened or endangered species or the disturbance of a cultural resource).

There are several resources, both natural and built, that would be expended in the construction and operation of the project. These resources include the building materials used in construction of the project and energy in the form of natural gas, petroleum products, and electricity consumed during construction and operation of housing and commercial land uses. Loss of these resources is considered irreversible because their reuse for some other purpose than the project would be impossible or highly unlikely. The project constitutes an irreversible and irretrievable commitment of the site as a land resource, thereby rendering land use for other purposes infeasible. Thus, except to the extent minimized by the designation of the on-site wetland preserve, the land would also be permanently lost as a habitat area.

4.3 RELATIONSHIP BETWEEN SHORT-TERM USE OF THE ENVIRONMENT AND THE MAINTENANCE AND ENHANCEMENT OF LONG-TERM PRODUCTIVITY

Effects on resources are often characterized as being temporary and short-term or long-term in duration. Impacts that occur only during construction are considered temporary. Impacts that occur over a period of 3 years or less result from short-term uses of the resources in an area most often associated with construction and up to 3 years after construction ceases. Construction can create temporary water quality effects and increases in noise, air quality and greenhouse gas emissions, traffic, and human population that can disturb resources in an area but subside when the work is complete. Long-term effects relate to the maintenance and enhancement of long-term productivity—in particular, the consistency of the project with long-term economic, social, regional, and local planning objectives. These impacts may lead to permanent loss or degradation of resources. As required by California Public Resources Code Section 21001(g), the short- and long-term effects of the project under consideration are summarized below.

4.3.1 SHORT-TERM USES

Implementation of the No USACE Permit, Proposed Project, Biological Impact Minimization, Conceptual Strategy, or Increased Development Alternatives would result in temporary and short-term construction-related impacts. As discussed elsewhere in this EIR/EIS, the temporary and short-term construction impacts would be associated predominantly with water quality, traffic, air quality and greenhouse gas emissions, and noise. The project applicant(s) would implement mitigation measures identified in each topical section to reduce these impacts to a less-than-significant level wherever feasible and available. At the same time, however, construction of the project would create economic benefits during construction, in the form of jobs and the subsequent direct and indirect demand for goods and services.

4.3.2 LONG-TERM USES

Implementation of the No USACE Permit, Proposed Project, Biological Impact Minimization, Conceptual Strategy, or Increased Development Alternatives would result in long-term impacts related to the loss of biological resources, habitat, and open space; a change in the visual character and quality of the SPA; air quality emissions; greenhouse gas emissions; noise; increased traffic; and increased demand for public services and

utilities, including water supply, wastewater service, natural gas, electricity, communications service, fire protection, police service, and public schools. Long-term benefits and increases in productivity from implementation of the project are described below.

- A well-integrated, mixed-use master-planned community would be developed.
- The project would provide a diversity of housing types. This would help alleviate the existing and future jobs/housing imbalance in Rancho Cordova and the surrounding region. Particular emphasis would be placed on affordability and proximity of housing to the major employment-generating centers along the U.S. 50 corridor and major existing or planned utility infrastructure.
- A pedestrian-friendly, human-scale community environment would be developed, with a safe and pleasant place for people to live, work, and recreate.
- The project would facilitate the implementation of regional and city transportation circulation linkages. It also would facilitate the expansion and use of alternative modes of transportation. The SPA would be integrated with the surrounding development and circulation pattern. Street, pedestrian, and bicycle access would be created throughout the SPA so that people could complete trips without depending exclusively on major roads, secondary roads, or the automobile.
- The No USACE Permit, Proposed Project, Biological Impact Minimization, and Conceptual Strategy Alternatives would preserve a substantial amount of the highest quality biological resources on the SPA, including wetlands and vernal pools.

4.4 SIGNIFICANT AND UNAVOIDABLE ADVERSE IMPACTS

CCR Section 15216.2(b) of the State CEQA Guidelines requires EIRs to include a discussion of any significant environmental impacts that cannot be avoided if the project is implemented. Chapter 3 of this EIR/EIS provides a detailed analysis of all significant and potentially significant environmental impacts related to implementing the project; identifies feasible mitigation measures, where available and practicable, that could avoid or reduce these significant and potentially significant impacts; and presents a determination whether these mitigation measures would fully reduce these impacts to less-than-significant levels. In addition, each resource section identifies the significant cumulative impacts resulting from the combined effects of the project and related projects. If a specific impact cannot be fully reduced to a less-than-significant level, it is considered a significant and unavoidable adverse impact.

Project implementation would result in significant and unavoidable adverse impacts after mitigation implementation in seven environmental issue areas, as shown in Table 4-1 and discussed in detail in Sections 4.4.1–4.4.7.

The detailed discussion of specific significant and unavoidable impacts below follows the issue areas and impacts of the DEIR/DEIS that are identified in Table 4-1. If no significant and unavoidable impacts would occur, that topic or that portion of the DEIR/DEIS is not discussed below. Significant and unavoidable cumulative impacts are summarized below in Section 4.4.8.

4.4.1 AESTHETICS

Because the SPA contains high levels of vividness, intactness, and unity, viewer sensitivity is considered to be high. Project implementation would substantially alter the existing scenic vista in the SPA, from open grazing land to urban development (Impact 3.1-1). No feasible mitigation measures are available to reduce impacts associated with the alteration of scenic vistas from project development to a less-than-significant level. Therefore, this impact would be significant and unavoidable.

Table 4-1
Summary of Project-Related Significant and Unavoidable Impacts

Section Name/ Issue Area/ Project Component	Impact Number	Impact Title
3.1 Aesthetics	3.1-1	Substantial Adverse Effect on a Scenic Vista
	3.1-2	Substantial Degradation of Existing Visual Character or Quality of the Site and its Surroundings
	3.1-5	New Skyglow Effects
3.2 Air Quality	3.2-2	Generation of Long-Term Operational (Regional) Emissions of ROG and NO_X
	3.2-3	Exposure of Sensitive Receptors to Temporary and Short-, and Long-Term Emissions of Toxic Air Contaminants
3.3 Biological Resources	3.3-1	Loss and Degradation of Jurisdictional Wetlands and Other Waters of the U.S.
	3.3-3	Loss and Degradation of Habitat for Special-Status Wildlife
	3.3-5	Potential for Substantial Interference with the Movement of any Native Resident or Migratory Wildlife Species or with Established Native Resident or Migratory Wildlife Corridors, or Impede the use of Native Wildlife Nursery Sites (Increased Development Alternative Only)
	3.3-7	Substantial Reduction in the Habitat of a Wildlife Species (Proposed Project, Conceptual Strategy, and Increased Development Alternatives only)
3.4 Climate Change	3.4-1	Generation of Temporary and Short-Term Construction-Related GHG Emissions
	3.4-2	Generation of Long-Term Operational GHG Emissions
3.15 Traffic	3.15-1a	Unacceptable LOS at the SR 16/Excelsior Road Intersection (Intersection 1)
	3.15-1b	Unacceptable LOS at the SR 16/Eagles Nest Road Intersection (Intersection 2)
	3.15-1c	Unacceptable LOS at the SR 16/Sunrise Boulevard Intersection (Intersection 3)
	3.15-1d	Unacceptable LOS at the SR 16/Grant Line Road Intersection (Intersection 4)
	3.15-1e	Unacceptable LOS at the Florin Road/Sunrise Boulevard Intersection (Intersection 5)
	3.15-1h	Unacceptable LOS at the Sunrise Boulevard/Douglas Road Intersection (Intersection 9)
	3.15-1i	Unacceptable LOS at the Mather Field Road/U.S. 50 Eastbound Ramps (Intersection 12)
	3.15-1j	Unacceptable LOS at the Sunrise Boulevard/White Rock Road Intersection (Intersection 18)
	3.15-1l	Unacceptable LOS at the Hazel Avenue/U.S. 50 Westbound Ramps Intersection (Intersection 25)
	3.15-1m	Unacceptable LOS at the Grant Line Road/White Rock Road Intersection (Intersection 27)
	3.15-1o	Unacceptable LOS at the Eagles Nest Road/Douglas Road Intersection (Intersection 29)
	3.15-1q	Unacceptable LOS on Mather Boulevard between Femoyer Street and Douglas Road (Roadway Segment 4)
	3.15-1r	Unacceptable LOS on Douglas Road between Mather Boulevard and Sunrise Boulevard (Roadway Segment 5)
	3.15-1s	Unacceptable LOS on Sunrise Boulevard between Gold Country Boulevard and Coloma Road (Roadway Segment 17)
	3.15-1t	Unacceptable LOS on Sunrise Boulevard between Coloma Road and the U.S. 50 Westbound Ramps (Roadway Segment 18)
	3.15-1u	Unacceptable LOS on Sunrise Boulevard between the U.S. 50 Eastbound Ramps and Folsom Boulevard (Roadway Segment 19)
	3.15-1v	Unacceptable LOS on Sunrise Boulevard between Folsom Boulevard and White Rock Road (Roadway Segment 20)
	3.15-1y	Unacceptable LOS at Various Merge and Diverge Segments of U.S. 50
	3.15-2	Increased Demand for Alternative Modes of Transportation
3.17 Water Supply	3.17-4	Need for Off-Site Water Conveyance Facilities—Americanos Boulevard Pipelines (only for indirect construction-related impacts to waters of the U.S. and other wetlands and special-status wildlife)

Source: Data compiled by AECOM in 2011

Project implementation would substantially degrade the visual character of the SPA through conversion of grazing land to developed urban uses (Impact 3.1-2). Implementation of Mitigation Measure 3.1-2 would partially reduce the level of this impact by requiring the development to conform with design, architectural, development, and maintenance standards identified in the SunCreek Specific Plan. However, because of the large size of the SPA, there is no feasible mitigation available to fully reduce visual resource impacts associated with the conversion of a large expanse of agricultural land to urban development. Therefore, this impact would be significant and unavoidable.

Project implementation would require lighting of new development that could inadvertently cause increased skyglow effects, effectively obscuring views of stars, constellations, and other features of the night sky (Impact 3.1-5). Implementation of Mitigation Measure 3.1-4 would reduce excessive lighting and thereby reduce skyglow effects to the maximum extent feasible. However, because project implementation would introduce a substantial quantity of nighttime light over a large area of a rural landscape that is essentially dark under existing conditions, overall skyglow effects are considered significant and unavoidable.

4.4.2 AIR QUALITY

Operational area- and mobile-source emissions from project implementation would exceed the SMAQMD-recommended threshold of 65 lb/day for reactive organic gases (ROG) and oxides of nitrogen (NO_x), and would result in or substantially contribute to emissions concentrations that exceed the national or California ambient air quality standards (Impact 3.2-2). Because development of the SPA is included in the City's General Plan, operational emissions of ROG, NO_x, respirable particulate matter (PM_{10}), and fine particulate matter ($PM_{2.5}$) associated with land use development on the site are already accounted for to some degree in the applicable air quality plans. However, implementation of the project could still potentially conflict with air quality planning efforts in the Sacramento Valley Air Basin. Implementation of Mitigation Measure 3.2-2 would reduce ROG and NO_x emissions associated with operation of the project. As described in detail in Impact 3.2-2, even if operational emissions of ROG and NO_x were 15% lower than the levels reported in Tables 3.2-5 through 3.2-9, they would still exceed SMAQMD's significance threshold of 65 lb/day. As a result, this impact would be significant and unavoidable.

Project implementation would result in exposure of sensitive receptors to short- and long-term emissions of toxic air contaminants (TACs) from on-site construction and on-site operational mobile sources and from off-site mobile sources (Impact 3.2-3). Implementation of Mitigation Measures 3.2-1a, 3.2-3a, and 3.4-1 would lessen health-related risks associated with the operation of off-road diesel powered equipment during construction activity and would lessen health-related risks associated with mobile-source TACs; however, TAC exposure levels would not necessarily be reduced to less-than-significant levels. Because no additional feasible mitigation measures are available, exposure to mobile-source TAC emissions from on-site mobile sources therefore would be a significant and unavoidable impact. This conclusion has been reached due to the uncertainty about the potential TAC emission sources associated with on-site commercial land use activities and the proximity of sensitive receptors to such uses. In addition, there is also uncertainty about the feasibility and effectiveness of extending the setback distances between roadways and receptors.

4.4.3 BIOLOGICAL RESOURCES

Implementation of the project could result in the placement of fill material into Waters of the U.S., including wetlands subject to USACE jurisdiction under the Federal Clean Water Act (CWA), and the potential loss and degradation of wetland habitats protected under state and local regulations (Impact 3.3-1). Implementation of Mitigation Measures 3.3-1a and 3.3-1b would reduce significant impacts on jurisdictional wetlands and other waters of the U.S. but not to a less-than-significant level because (1) the extent of habitat loss and degradation is extensive and contributes significantly to the loss of this habitat type in the region, and (2) vernal pools and other wetland habitats within the wetland preserve and on adjacent parcels could be adversely affected by habitat fragmentation and indirect impacts for which no feasible mitigation measures are available.

Project implementation would result in the loss and degradation of habitat for several special-status wildlife species (Impact 3.3-3). Implementation of Mitigation Measures 3.3-1a, 3.3-1b, 3.3-3a, 3.3-3b, and 3.3-3c would lessen direct and indirect significant impacts on special-status wildlife; however, this impact would remain significant and unavoidable, because the removal of between approximately 650 acres (under the No USACE Permit Alternative) and 1,170 acres (under the Increased Development Alternative) of potential habitat for special-status wildlife and the indirect effects and associated fragmentation of surrounding potentially suitable habitat cannot be fully mitigated. Indirect impacts under the No USACE Permit Alternative would be reduced by implementing Mitigation Measure 3.3-1a because it requires measures to minimize adverse effects on water quality and wetland hydrology; however, indirect impacts would remain significant and unavoidable due to habitat fragmentation and edge effects, similar to the other action alternatives. The amount of grassland habitat lost could potentially contribute to the decline of Swainson's hawk populations in the region. This decline would constitute a substantial adverse effect under CEQA. Furthermore, the loss of between 10 and 26 acres of vernal pool fairy shrimp and vernal pool tadpole shrimp habitat and the habitat fragmentation that would occur under the Proposed Project, Biological Impact Minimization, Conceptual Strategy, and Increased Development Alternatives could potentially contribute to the decline of listed vernal pool invertebrate populations in the region, especially considering that the SPA is within an area identified by the U.S. Fish and Wildlife Service (USFWS) as crucial to the recovery of these species and considering the rate of habitat destruction in the region. Impacts to special-status wildlife species could only be fully mitigated through a combination of habitat preservation and restoration in the vicinity of the SPA. While parcels of similar habitat quality are currently present in the project vicinity, these parcels would be of lower value following development of the project because of the effects of habitat fragmentation and secondary impacts related to the project. Moreover, there would be a net loss of between 650 and 1,170 acres (1,062 acres under the Proposed Project Alternative) of vernal pool grassland regardless of the acreage preserved if any of the action alternatives are implemented and there is not sufficient undeveloped land in the Mather Core Area or the project vicinity to offset the effects of habitat fragmentation on special-status species, and thus, fully mitigate the impact or reduce it to a less-than-significant level.

Under the Increased Development Alternative, a very narrow corridor would be preserved along a portion of Kite Creek within the SPA, but this preserved corridor would not link to natural habitat areas off site, except to the planned habitat preserve area to the south of the Shalako property. Therefore, implementation of the Increased Density Alternative could substantially interfere with the movement of native resident or migratory wildlife species or with established native resident or migratory wildlife corridors (Impact 3.3-5). There are no feasible mitigation measures available that would increase wildlife movement opportunities other than redesigning the Increased Development Alternative. Because this DEIR/DEIS already includes four other land use alternatives that have been designed to provide opportunities for wildlife movement, redesigning the Increased Development Alternative is not considered feasible. (The reader should note that, as described in Chapter 1, "Introduction" and Chapter 2, "Alternatives," the Increased Development Alternative was the original proposal for development of the SPA. The need for additional wildlife connectivity was one of the reasons that the Proposed Project Alternative was designed in its current form.) The lack of wildlife connectivity is considered a significant and unavoidable impact under the Increased Development Alternative.

Implementing the project would substantially reduce the habitat of a wildlife species (vernal pool fairy shrimp and vernal pool tadpole shrimp habitat) (Impact 3.3-7). Implementing Mitigation Measures 3.3-1a, 3.3-1b, and 3.3-3a would lessen the significant impact of substantial loss in habitat for vernal fairy shrimp and vernal pool tadpole shrimp, but not to a less-than-significant level. Mitigation Measures 3.3-1a and 3.3-3a would require that aquatic habitat lost or degraded by implementing the project would be replaced according to USACE's and USFWS's no-net-loss standards. However, the only way to ensure no net loss of habitat acreage is to create aquatic habitats to replace those that would be filled. While created habitats can compensate for the loss of wetted habitat acreage, they cannot be guaranteed to replace the full spectrum of habitat functions and the value of the habitat lost. It is not known if aquatic habitats that might be created to compensate for project losses would support self-sustaining populations of vernal pool tadpole shrimp and vernal pool fairy shrimp and preservation of existing habitats at any ratio would still result in a net loss of habitat for these species. Furthermore, it is unlikely that habitat compensation can be accomplished within the Mather Core Area and mitigation outside of the Mather Core Area

cannot fully compensate for the loss of habitat within the core area in terms of its value to vernal pool tadpole shrimp. Habitat within the Mather Core Area is considered vital to preventing the extinction or irreversible decline of vernal pool fairy shrimp and vernal pool tadpole shrimp At the time this document was prepared, the rate of compensatory mitigation provided within the core area for CWA permits issued to projects removing vernal pool habitat from the core area was approximately 50% (i.e., for every 1 acre of wetland habitat removed, 0.5 acre of habitat was mitigated in the core area) and the amount of undeveloped, unspoken-for land within the Mather Core Area that could potentially be preserved is running out. Moreover, habitat that is preserved on the SPA and other project preserves in the vicinity would ultimately be of lower value following development because of the effects of habitat fragmentation. Therefore, fully compensating for project impacts by preserving existing habitat in the project vicinity and within the Mather Core Area is infeasible and no feasible mitigation exists to reduce this impact to a less-than-significant level. This impact would remain significant and unavoidable.

4.4.4 CLIMATE CHANGE

Project implementation would result in increased generation of GHGs, which could contribute to global climate change on a cumulative level. The project would contribute to cumulatively considerable GHG emissions in both the short term and the long term (Impacts 3.4-1 and 3.4-2).

Implementation of Mitigation Measures 3.2-1 and 3.4-1 would partially reduce GHG emissions from short-term GHG emissions associated with construction activity. Because the project would be constructed in phases over a 20-year period (for information on project phasing, please refer to Section 2.3.4 in Chapter 2, "Alternatives"), the extent to which feasible technologies and GHG reduction measures will continue to be developed is not known at the time of writing this EIR/EIS. Therefore, this analysis concludes that the reductions achieved by implementing Mitigation Measures 3.2-1 and 3.4-1 would not be sufficient to fully reduce the construction-generated GHGs to the extent that they would not be cumulatively considerable.

Although implementation of Mitigation Measures Although Mitigation Measures 3.4-2a and 3.4-2b would require the implementation of all feasible GHG reduction measures currently known and would reduce the project's incremental contribution to long-term operational GHG emissions, it is unknown at the time of writing this EIR/EIS whether the selected measures in combination with potential GHG offsets and other GHG reductions realized from the regulatory environment that exists at that time, would result in attainment of the applicable CO_2e/SP goal during each increment of development. Therefore, the project's long-term contribution of operational GHG emissions is considered potentially significant and unavoidable.

4.4.5 TRAFFIC AND TRANSPORTATION

Implementation of the proposed project or the alternatives would result in significant impacts to numerous intersections and roadways. However, mitigation measures, including construction of roadway and intersection improvements, would reduce many of these impacts to a less-than-significant level. The specific roadway segments that would remain significant and unavoidable, either because feasible mitigation measures are not available or because the implementation of mitigation falls under the jurisdiction of another agency, are listed above in Table 4-1.

Implementation of the project would create demand for alternative transportation mode facilities such as buses, LRT, and carpools in Rancho Cordova (Impact 3.15-2). Implementation of Mitigation Measures 3.15-2a and 3.15-2b would promote usage of alternative transportation modes and increase the supply of these modes. However, because neither the City nor the project applicant(s) can guarantee implementation of increased transit service within Rancho Cordova, the impact is potentially significant and unavoidable. If Sacramento Regional Transit cooperates in allowing the improvements to move forward, the impact would be classified as significant in the short term but eventually would be reduced to a less-than-significant level in the long term.

4.4.6 WATER SUPPLY

Water supply for the project would require two parallel off-site conveyance pipelines which are planned to be installed in the right-of-way for Americanos Boulevard. However, Americanos Boulevard has not yet been constructed, and therefore this document contains a broad, program-level CEQA/NEPA analysis of the potential environmental impacts of installing the pipelines in the location shown in Exhibit 2-12 in Chapter 2, "Alternatives." The parallel pipelines would be installed underneath the intermittent tributary of Morrison Creek using jack-and-bore techniques to avoid impacts on this water of the U.S.; however, the pipeline route crosses properties supporting an extremely high density of vernal pools making it infeasible to avoid impacts to all wetlands. The pipeline route is also within a planned wetland preserve area. Therefore, constructing the proposed Americanos Boulevard pipeline would result in direct and indirect significant impacts to wetlands. Construction activities affecting vernal pools and other seasonal wetlands could also affect special-status species that occur in wetlands through the loss and degradation of habitat, if they are present. There are also a few clusters of large trees in the pipeline vicinity that may provide suitable nest sites for nesting raptors. If Swainson's hawks or other raptors are nesting in these trees at the time of construction, construction disturbances could result in nest abandonment and mortality of chicks or eggs. Therefore, construction activities could result in direct and indirect, potentially significant impacts on special-status species. Implementation of Mitigation Measures 3.3-1a. 3.3-1b, 3.3-3a, 3.3-3c, 3.3-3d, and 3.17-4 would reduce direct and indirect significant impacts on Swainson's hawks, white-tailed kites, burrowing owls, and other raptors; western spadefoot; western pond turtle; and special-status plants resulting from the Americanos Boulevard pipeline installation to a less-than-significant level because they would ensure that wetland habitat removed from the pipeline route would be replaced on a no net loss basis; require measures to minimize adverse effects on water quality and wetland hydrology that could indirectly affect wetland habitat and species; ensure that nesting raptors are identified prior to construction and require avoidance measures or buffers to ensure nesting raptors are not disturbed; require surveys to identify and avoid western pond turtles; and require plant surveys to identify and avoid or compensate for special-status plants. Implementing Mitigation Measures 3.3-1a, 3.3-1b, and 3.3-3c would reduce direct significant impacts on jurisdictional wetlands and other waters of the U.S. and on vernal pool fairy shrimp and vernal pool tadpole shrimp resulting from pipeline construction, but not necessarily to a less-than-significant level for the same reasons indicated in Section 4.4.3, "Biological Resources" (discussed above). Therefore impacts on wetlands and other waters of the U.S. and on vernal pool fairy shrimp and vernal pool tadpole shrimp from construction of the parallel pipelines would remain significant and unavoidable.

4.4.7 CUMULATIVELY CONSIDERABLE IMPACTS

As discussed in detail in each resource section, project implementation would result in direct and indirect cumulatively considerable incremental contributions to significant adverse cumulative impacts. Those impacts are summarized below.

AESTHETICS

- Substantial alteration of a scenic vista
- Substantial degradation of visual character (short-term and long-term)
- New light and glare effects
- Skyglow effects

AIR QUALITY

- Short-term construction and long-term operational generation of NOx and PM_{10} emissions

BIOLOGICAL RESOURCES

- Loss or fill of wetlands and other Waters of the U.S., including wetlands and Waters of the State

- Loss or modification of sensitive natural habitats
- Decline of special-status plant and animal species in the region
- Degradation of wildlife habitat
- Loss of annual grassland

CLIMATE CHANGE

- Temporary, short-term construction-related generation of greenhouse gases
- Long-term operation-related generation of greenhouse gases

NOISE

- Temporary, short-term exposure of sensitive receptors to construction equipment noise
- Temporary, short-term exposure of sensitive receptors to potential groundborne noise and vibration
- Long-term exposure of sensitive receptors to increased stationary-source noise

TRAFFIC AND TRANSPORTATION

- Increases to peak-hour and daily traffic volumes resulting in unacceptable levels of service