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## II. SUMMARY

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### A. INTRODUCTION

The purpose of this summary is to provide the reader with a clear and simple description of the proposed project and its potential environmental impacts. Section 15123 of the CEQA Guidelines requires that the summary identify each significant effect and recommended mitigation measures and alternatives that would minimize or avoid potential significant impacts. The summary is also required to identify areas of controversy known to the lead agency (San Mateo County), including issues raised by agencies and the public, and issues to be resolved, including the choice among alternatives and whether or how to mitigate significant effects. This section focuses on the major areas of the proposed project that are important to decision-makers.

### B. SUMMARY OF THE PROPOSED PROJECT

The 19.4-acre project site is located on Airport Street, northwest of the Princeton/Pillar Point Harbor area in unincorporated County of San Mateo and comprises two Assessor's Parcel Numbers (APN) 047-311-060 and APN 047-312-040. APN 047-311-060 ("northern parcel") is approximately 14.25 acres in size, and APN 047-312-040 ("southern parcel") is approximately 5.28 acres.

The proposed Big Wave Wellness Center and Office Park project ("proposed project") is designed as an economically and environmentally sustainable community development that provides housing and employment opportunities for low-income developmentally disabled (DD) adults at the Wellness Center whereas the Office Park would be occupied by private firms with their own workers (not DD residents). The two primary components of the proposed project include:

- The Office Park property (northern parcel) would be subdivided into five lots (Lots 1-5). Lots 1-4 would include four, three-story buildings (225,000 sf total) planned for mixed office use. Lot 5 would include common areas, a Communications Building, and a 640-space parking lot.
- The Wellness Center property (southern parcel) would be subdivided into three separate lots (Lots 1-3). Lot 1 would include a separate storage building (Building 4). Lot 2 would include the Wellness Center with a maximum of 70 units for approximately 50 DD adults and 20 live-in staff members, other onsite living and recreation facilities (Buildings 1-3, 5-7), and associated fencing. Lot 3 would include a 73-space parking lot.

The above components would be designed in tandem, so that the DD adults would be employed by the Wellness Center and would also provide services to the Office Park, with the Wellness Center funded through association fees and shared development costs.

In addition to these above primary components, the proposed project includes: development of an onsite trail system; restoration of wetland habitat; use of sustainable organic/non-organic, onsite/offsite farming for supplemental food sources; a native plant nursery for revegetation/landscaping efforts; recycling and

composting; dog walking and grooming services; and development of bus stops and shuttle services. Proposed utilities and service systems include: solar cells for heating/energy; carbonate fuel cells; natural gas generators; wind turbines and generators; geothermal cooling systems; rain garden infiltration/treatment ponds; options for water systems such as: (1) domestic hook-ups and one fire system hook-up, and (2) use of well water/treatment systems; options for wastewater systems such as: (1) use of an onsite wastewater treatment plant with disposal through irrigation and infiltration, and/or (2) municipal hook-ups; and a Communications Building with two microwave dishes.

All buildings and development would be designed to meet Platinum-level Leadership in Energy and Environmental Design (LEED) certified construction.

Further, various project-related business operations are included, which will be utilized to manage the above, as well as to generate income for the Wellness Center residents for the project services of the non-profit, such as: Big Wave (BW) Catering/Food Services; BW Energy; BW Farming; BW Water; BW Transportation; BW Recycling; BW Communications (radio telecom link); and BW Maintenance.

### **C. TOPICS OF KNOWN CONCERN**

Based on a review of environmental issues by the County of San Mateo, this Draft EIR (DEIR) analyzes the following environmental impact areas:

- Aesthetics
- Agriculture Resources
- Air Quality
- Biological Resources
- Cultural Resources
- Geology and Soils
- Hazards and Hazardous Materials
- Hydrology and Water Quality
- Land Use and Planning
- Noise
- Population & Housing
- Public Services
  - Police
  - Fire Protection
  - Schools
  - Parks and Recreation
  - Libraries
- Transportation/Traffic

- Utilities and Service Systems
  - Sewer
  - Water
  - Solid Waste
  - Energy

## **D. SUMMARY OF ALTERNATIVES TO THE PROPOSED PROJECT**

This EIR considers a range of alternatives to the proposed project to provide informed decision-making in accordance with Section 15126(f) of the *CEQA Guidelines*. The alternatives analyzed in this EIR include: A) No Project Alternative; B) Reduced Density/Height for Office Park and Reduced Size for Wellness Center Alternative; C) Modified Office Park Site Plan Alternative 1; and D) Modified Office Park Site Plan Alternative 2. For further discussion of these alternatives, see Section VI of this EIR.

## **E. AREAS OF CONTROVERSY**

Section 15123 of the CEQA Guidelines requires an EIR to identify areas of controversy known to the lead agency, including issues raised by agencies and the public, and issues to be resolved. Environmental concerns raised at the EIR scoping meetings and in letters submitted to the County of San Mateo in response to the Notice of Preparation (NOP) of the EIR include:

- Water Supply & Water Quality Impacts
- Cumulative Impacts
- Traffic Impacts; limited access in and out of the area
- Trail and Common Area Maintenance
- Visual Impacts
- Noise Impacts
- Structural Impacts
- Air Quality Impacts
- Geological Impacts
- Biological Impacts
- Socioeconomic Impacts
- Air Quality
- Cultural Impacts
- Hazards and Hazardous Material Impacts
- Phasing of the Project Development
- Public Services
- Utilities

**F. SUMMARY OF ENVIRONMENTAL IMPACTS AND MITIGATION MEASURES**

Table II-1 summarizes the various environmental impacts and mitigation measures associated with the construction and operation of the proposed project. Mitigation measures are included and required for significant environmental impacts, as well as recommended for various less-than-significant impacts to further reduce any adverse impacts. The level of impact significance after mitigation is also identified in Table II-1.

**Table II-1  
Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<b>AESTHETICS</b>		
<p><b>Impact AES-4</b> Create a New Source of Substantial Light or Glare which would Adversely Affect Day or Nighttime Views in the Area</p> <p>A significant impact may occur if a project introduces new sources of light or glare on the project site that would be incompatible with the areas surrounding the project site or which pose a safety hazard, such as to motorists utilizing adjacent streets. There are currently no sources of light and glare on the project site as the project site is undeveloped.</p> <p>The proposed project would introduce additional sources of lighting and reflective surfaces to the project site, as compared to the site's existing conditions. New lighting sources would include outdoor street lighting and security lighting, indoor lighting, and light generated by vehicle headlights. Lighting would be used as a design tool to highlight architectural elements and landscaping. Lighting would also provide security and safety in parking areas, service passages, and common areas of the project. As noted in Section III, Project Description, a detailed lighting plan is not available at this time. The applicant has indicated that all outdoor lighting will be low-level to illuminate walkways and provide safe access to parking. While it appears the project would not introduce new sources of light or glare on the project site that would be incompatible with the areas surrounding the project site or which pose a safety hazard, until a detailed lighting plan is prepared, impacts would be <b>significant</b>.</p>	<p><b>Mitigation Measure AES-4</b> Create a New Source of Substantial Light or Glare which would Adversely Affect Day or Nighttime Views in the Area</p> <ul style="list-style-type: none"> <li>• Prior to the approval of final project plans, a detailed lighting plan shall be submitted to San Mateo County for review and approval, consistent with their requirements. The lighting plan shall prohibit light spillover across property lines and limit lighting to the minimum necessary for security and exterior lighting purposes, as determined by the Community Development Director. All lighting shall be designed to be compatible with surrounding development. The project shall not propose light sources that are atypical of the surrounding environment.</li> <li>• Reflective glass or other glaring building materials shall be discouraged. The exterior of the proposed building shall be constructed of non-reflective materials such as, but not limited to: high-performance tinted non-reflective glass, metal panel, and pre-cast concrete or cast in-place or fabricated wall surfaces. The proposed materials shall be reviewed and approved by the Community Development Director prior to approval of the Final Map.</li> </ul>	<p><i>Less than Significant</i></p>
<b>AIR QUALITY</b>		
<p><b>Impact AQ-2 Construction and Operation Emissions</b></p> <p><i>Construction Emissions</i></p> <p>The project construction time schedule would be between approximately 30 and 36 months to fully complete the Wellness Center and Office Park development.</p> <p>Although there are exhaust emissions emitted from all engine-powered equipment, the <i>BAAQMD CEQA Guidelines</i> states that PM<sub>10</sub>, typically in the form of fugitive dust, is the pollutant of greatest concern with respect to construction activities. Fugitive dust is mostly caused by material handling,</p>	<p><b>Mitigation Measure AQ-2 Construction Emissions</b></p> <p>The applicant shall require the construction contractor to implement a dust control program. The program shall be applied to all construction activities involving grading, excavation, and use of unpaved areas for staging, extensive hauling of materials, or building demolition. The dust control program shall include the following measures:</p> <ul style="list-style-type: none"> <li>• Water all active construction areas at least twice daily.</li> <li>• Cover all trucks hauling soil, sand, and other loose materials or require all trucks to maintain at least two feet of freeboard.</li> <li>• Pave, apply water three times daily, or apply (non-toxic) soil stabilizers on all</li> </ul>	<p><i>Less than Significant</i></p>

**Table II-1  
Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p>grading activities, and traffic on unpaved or unimproved surfaces. As such, the BAAQMD requires that particular mitigation measures (depending on the size of the project site) geared towards PM<sub>10</sub> reduction be implemented. As stated in the BAAQMD CEQA Guidelines, “[t]he District’s approach to CEQA analyses of construction impacts is to emphasize implementation of effective and comprehensive control measures rather than detailed quantification of emissions. If all of the control measures indicated [here] (as appropriate, depending on the size of the project area) will be implemented, then air pollutant emissions from construction activities would be considered a less-than-significant impact.” Therefore, if all of the construction mitigation measures required by the BAAQMD for a project site greater than four acres are implemented (identified below in Mitigation Measure AQ-2), air quality impacts related to construction of the project would be <i>less than significant</i>.</p>	<ul style="list-style-type: none"> <li>• unpaved access roads, parking areas, and staging areas at construction sites.</li> <li>• Sweep daily (with water sweepers) all paved access roads, parking areas, and staging areas at construction sites.</li> <li>• Sweep streets daily (with water sweepers) if visible soil material is carried onto adjacent public streets.</li> <li>• Hydroseed or apply (non-toxic) soil stabilizers to inactive construction areas (previously graded areas inactive for ten days or more).</li> <li>• Enclose, cover, water twice daily, or apply (non-toxic) soil binders to exposed stockpiles (dirt, sand, etc.).</li> <li>• Limit traffic speeds on unpaved roads to 15 miles per hour (mph).</li> <li>• Install sandbags or other erosion control measures to prevent silt runoff to public roadways.</li> <li>• Replant vegetation in disturbed areas as quickly as possible.</li> <li>• Install wheel washers for all existing, or wash off the tires or tracks of all trucks and equipment leaving the site.</li> <li>• Limit the area subject to excavation, grading, and other construction activity at any one time.</li> </ul>	
<p><b>Impact AQ-5 Objectionable Odors</b> <i>Onsite Facilities</i> A wastewater treatment plant would be constructed onsite as part of the proposed project. All sewage treatment plants generate odors, with hydrogen sulfide (H<sub>2</sub>S) being the most prevalent malodorous gas. It has a very unique, unpleasant and discernable odor (rotten eggs). Odors can become a nuisance if they are allowed to escape the immediate sewage treatment area and spread to areas where people reside, work or congregate. The proposed wastewater treatment plant would be completely covered with aluminum plates and hatches and sealed with rubber gaskets. A vacuum fan would distribute all process air through a soil scrubber constructed adjacent to the plant. The wastewater plans for the project indicate that odors will be vented to a soil scrubber system that will be constructed adjacent to the treatment plant. The soil scrubber system is described as being 150 square feet in area, covered in loam, wood or root chips, and planted in native</p>	<p><b>Mitigation Measure AQ-5 Sewage Treatment Odors</b> The project applicant shall provide supporting engineering calculations and site plan details to verify the basis of design for the odor removal system. This information shall be supplied as part of the engineering report to be submitted for review and approval by the RWQCB.</p>	<p><i>Less than Significant</i></p>

Table II-1  
 Summary of Environmental Impacts & Mitigation Measures

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p>vegetation.</p> <p>This type of odor removal system is common and can be effective. Soil scrubber and other odor removal systems are normally sized on the basis of the air flow from the treatment plant blower system. Preliminary calculations should be provided to support the proposed sizing and confirm how the scrubber will be incorporated into the site plan. Odor generation is a potentially significant concern due to the location of the treatment plant in the southern corner of the project site, where there is very little buffer area between the treatment plant and neighboring properties or the Wellness Center buildings on the site. This is a <b>potentially significant</b> impact.</p>		
<b>BIOLOGICAL RESOURCES</b>		
<p><b>Impact BIO-1 Special-Status Species</b></p> <p><i>Special-Status Wildlife Species</i></p> <p>No direct impact or take of special-status species is expected as a result of the proposed project due to the lack of habitat suitable onsite to support those species with a potential to occur or known to occur in the project vicinity. However, development on the project site has the potential to indirectly impact special-status species such as western pond turtle, San Francisco garter snake and California red-legged frog due to the availability of suitable habitat in the immediate vicinity of the project as well as documented occurrences of the species in the project vicinity. Therefore, impacts would be <b>potentially significant</b>.</p>	<p><b>Mitigation Measure BIO-1 Special-Status Species</b></p> <p><i>Mitigation Measure BIO-1a Special-Status Species</i></p> <p>A qualified biologist (hereafter, biological monitor), capable of monitoring projects with potential habitat for Western pond turtle (WPT), San Francisco garter snakes (SFGS), and California red-legged frogs (CRLF) shall be present at the site as follows:</p> <ol style="list-style-type: none"> <li>1. Prior to and within 3 days of installation of exclusion fencing (type to be determined through consultation with CDFG and USFWS), the monitor shall survey the location for the installation for the presence of WPT, SFGS and CRLF. In addition, should any burrows be observed, the burrows shall be inspected by the biologist to determine if it is being used by any of the species. Should any of these species be observed, the area shall be vacated and re-inspected in one week. If no animal use is noted, the burrows shall be carefully excavated using a small trowel or shovel. Careful prodding using a blunt object will aid in determining the course of the tunnel such that the tunnel is excavated from the sides rather than the top, reducing the potential for any injury should an animal be present. Excavated burrows with no WPT, CRLF or SFGS shall be left open so they cannot be re-occupied. If any non-listed species are located, they shall be translocated outside of the construction zone. Should any individual WPT, CRLF or SFGS be found during the field survey or excavation, the area where that individual has been found shall remain undisturbed. If any life stage of the WPT, SFGS or CRLF is found during these surveys or excavations, the Department of Fish and Game and the US Fish and Wildlife Service shall be contacted immediately, and activities that could result in take shall be postponed until appropriate actions are taken</li> </ol>	<p><i>Less than Significant</i></p>

**Table II-1  
Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
	<p>to allow project activities to continue.</p> <p>2. During installation of construction zone exclusion fencing, the biological monitor shall be present and will oversee the installation of all construction fencing. The exclusionary fencing shall be installed on one parcel site first so that if any animals are within the construction zone, they will have the opportunity to move out of the area freely.</p> <p>Immediately following installation of exclusion fencing, the biological monitor shall survey the enclosed construction zone for the presence of WPT, SFGS and CRLF. If any life stage of the SFGS or CRLF is found during these surveys, the Department of Fish and Game and the U.S. Fish and Wildlife Service shall be contacted immediately, and activities that could result in take shall be postponed until appropriate actions are taken to allow project activities to continue.</p> <p>The biological monitor shall be present at all times during restoration area planting activities outside the construction zone and within the buffer area, to monitor for the presence of WPT, SFGS and CRLF.</p> <p>The biological monitor shall prepare a training document in both English and Spanish about the animals of concern, their identification, and the methods of avoidance and reporting requirements and procedures, should the species be observed. The document shall provide photographs of the species and notification numbers for the monitor, the Department of Fish and Game, and the U.S. Fish and Wildlife Service. The training document and contact information for the monitor shall be posted at the construction zone and maintained in the monitoring log. Every contractor, sub-contractor and construction worker shall be provided a copy of the training document in advance of their respective construction activities and shall be required to adhere to its contents.</p> <p>A highly visible warning sign shall be installed along the project perimeter. The warning sign shall be in English and Spanish and shall state: "Stay Out - Habitat Area of Federally Protected Species." A document drop shall be attached to several warning signs and stocked with a supply of training documents.</p> <p>The biological monitor shall conduct weekly site visits when construction is occurring to verify that all construction zone exclusionary fencing is in place and functioning as intended. Any repair or maintenance to the fencing deemed necessary by the biological monitor shall be completed under the monitor's</p>	

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<p><b>Bird Species</b> The project site does not provide suitable nesting habitat for any of the special-status bird species with the potential to occur or known to occur in the vicinity of the project site. Although the site currently provides some suitable foraging habitat, the proposed project proposes 32 acres of farming, 12 in row crop production in the immediate vicinity of the project site. A 5-</p>	<p>supervision. Such maintenance activities include adequate removal of vegetation at the construction fence line to ensure that vegetation “ladders” for species access are not allowed to establish. Once restoration activities are complete, the exclusion fencing shall be removed under the supervision of the biological monitor. Prior to the removal of the buffer area/restoration area fencing, permanent exclusionary measures shall be put in place to prevent special-status species movement beyond the buffer areas. Wildlife movement through the site shall be facilitated via a buffer zone on either side of the drainage that bisects the parcels. The general contractor shall assign a crew member that will be responsible for conducting site inspections, monitoring gate opening and closing, and assuring that other species protection measures are in place and being enforced when the Biological Monitor is not present. The crew member shall adhere to the procedures contained in the training document and shall be able to contact the biological monitor should any violations be noted or listed species observed onsite. The biological monitor has the authority to halt all or some construction activities and or modify all or some construction methods as necessary to protect habitat and individual sensitive species. The monitor shall be responsible for contacting USFWS should any endangered or threatened species be observed within the construction zones. The biological monitor shall complete daily monitoring reports for each day present, to be maintained in a monitoring log-book kept onsite. Reports must contain the date and time of work, weather conditions, biological monitor’s name, construction or project activity and progress performed that day, any listed species observed, any measures taken to repair and or maintain fencing, and any construction modifications required to protect habitat. The monitoring log-book with compiled reports shall be submitted to the Executive Director upon cessation of construction as part of a construction monitoring report.</p>	
<p><b>Bird Species</b> The project site does not provide suitable nesting habitat for any of the special-status bird species with the potential to occur or known to occur in the vicinity of the project site. Although the site currently provides some suitable foraging habitat, the proposed project proposes 32 acres of farming, 12 in row crop production in the immediate vicinity of the project site. A 5-</p>	<p><i>Mitigation Measure BIO-1b Special-Status Species</i> Any active bird nests in the vicinity of proposed grading shall be avoided until young birds are able to leave the nest (i.e., fledged) and forage on their own. Avoidance may be accomplished either by scheduling grading and tree removal during the non-nesting period (September through February), or if this is not feasible, by conducting a pre-construction nesting bird survey. Provisions of the pre-construction survey and nest-</p>	<p><i>Less than Significant</i></p>

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<p>acre native plant nursery will also occur onsite as part of the project. In addition, the project will provide 9 acres of riverine wetland and riparian ecosystem restoration. The restored wetlands will extend both foraging and breeding habitat currently available in Pillar Point Marsh for project area special-status species as well as provide a wider, protected movement corridor through the site. No special-status bird species will be substantially affected as a result of the proposed project.</p> <p>While no nests were observed on the site during the surveys conducted by the applicant's biologist, there is a potential for new nests to be established prior to project implementation, or during later phases of construction. Tree removal, vegetation clearing, or disturbance in the immediate vicinity of a nest in active use could result in abandonment of the nest or loss of eggs and young, which would be a violation of the Migratory Bird Treaty Act. Preconstruction surveys would be necessary in advance of construction during the nesting season (March through August) to confirm presence or absence of any new nests. This is considered a <b>potentially significant</b> impact.</p>	<p>avoidance, if necessary, shall include the following:</p> <p>If grading is scheduled during the active nesting period (March through August), a qualified wildlife biologist shall conduct a pre-construction nesting survey no more than 30 days prior to initiation of grading to provide confirmation on presence or absence of active nests in the vicinity.</p> <p>If active nests are encountered, species-specific measures shall be prepared by a qualified biologist in consultation with CDFG and implemented to prevent nest abandonment. At a minimum, grading in the vicinity of the nest shall be deferred until the young birds have fledged. A nest-setback zone shall be established via consultation with CDFG and USFWS, within which all construction-related disturbances shall be prohibited. The perimeter of the nest-setback zone shall be fenced or adequately demarcated, and construction personnel restricted from the area.</p> <p>If permanent avoidance of the nest is not feasible, impacts shall be minimized by prohibiting disturbance within the nest-setback zone until a qualified biologist verifies that the birds have either a) not begun egg-laying and incubation, or b) that the juveniles from the nest are foraging independently and capable of independent survival at an earlier date. A survey report by the qualified biologist verifying that the young have fledged shall be submitted to CDFG and USFWS prior to initiation of grading in the nest-setback zone.</p>	<p>Less than Significant</p>
	<p><i>Mitigation Measure BIO-1c Special-Status Species</i></p> <p>Proposed project construction activities will not result in impacts to project area wetlands and/or habitat for special-status species known to occur in the vicinity of the site. The applicant's biologist has obtained a verified wetland delineation and has consulted with the regulatory agencies regarding special-status species. The applicant shall continue to coordinate all project activities potentially regulated by State, Federal, and local agencies and shall obtain all necessary permits from CDFG, Corps, USFWS, and the RWQCB as required by federal and State law to avoid, minimize or offset impacts to any species listed under either the State or federal Endangered Species Acts or protected under any other State or federal law.</p> <p><i>Mitigation Measure BIO-1d Special-Status Species</i></p> <p>Sensitive and general habitat features outside the limits of approved grading and development shall be protected by identifying a construction and development boundary on all project plans and prohibiting construction equipment operation within this</p>	<p>Less than Significant</p>

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Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p><b>Impact BIO-4 Wildlife Movement and Habitat Connectivity</b></p> <p>Sensitive wildlife habitats are located south of the project site within the adjacent Pillar Point Marsh. Due to the continuous and ongoing agricultural activities on the project site, special-status and common wildlife species movement across the site is limited. The drainage that bisects the project parcels contains the only sensitive habitat onsite. This area will be restored and protected by a 100-foot buffer on either side, enhancing its habitat value and availability for use as a protected movement corridor through the site. No wildlife corridors or sensitive habitats will be affected as a result of the proposed project. Impacts would be <i>less than significant</i>.</p>	<p>The boundary shall be staked and flagged in the field with a highly visible color coded system and all construction and equipment operators shall be instructed to remain outside this no-disturbance boundary for the duration of construction. This measure is in addition to the wildlife exclusion fencing described in Mitigation Measure Bio-1a and applies to the protection of all habitat features outside of the project limits.</p> <p><b>Mitigation Measure BIO-4a Wildlife Movement and Habitat Connectivity</b></p> <p>Measures recommended in Mitigation Measures BIO-1a through BIO-1d would serve to protect important natural habitat on the site for wildlife, avoid the potential loss of bird nests, and protect sensitive natural areas. Although wildlife movement and habitat connectivity impacts were found to be less than significant, the following additional provisions shall be implemented to further protect wildlife habitat resources:</p> <p>Fencing that obstructs wildlife movement shall be restricted to building envelopes and wildlife exclusionary fencing along special-status species protection corridors and shall not be allowed elsewhere on the site. Fencing that obstructs wildlife movement contains one or more of the following conditions: lowest horizontal is within 1.5 feet of the ground OR highest horizontal is over 6 feet OR top or bottom wire is barbed OR distance between top wires is less than 10 inches OR it combines with existing structures or fences, even on neighboring parcels, to create an obstacle to wildlife movement.</p> <p>Lighting shall be carefully designed and controlled to prevent unnecessary illumination of natural habitat on the site. Lighting shall be restricted to building envelopes, at the minimum level necessary to illuminate roadways and other outdoor areas. Lighting shall generally be kept low to the ground, directed downward, and shielded to prevent illumination into adjacent natural areas.</p> <p>Dogs and cats shall be confined to individual residences and the fenced portion of the building envelopes to minimize harassment and loss of wildlife.</p> <p>All garbage, recycling, and composting shall be kept in closed containers and latched or locked to prevent wildlife from using the waste as a food source.</p>	<p><i>Less than Significant</i></p>
<b>CULTURAL RESOURCES</b>		
<p><b>Impact CULT-2 Archaeological Resources</b></p> <p>Site CA-SMA-151</p> <p>Prehistoric archaeological site CA-SMA-151 extends into the project site. The archaeological site is listed on the National Register, California</p>	<p><b>Mitigation Measure CULT-2 Archaeological Resources</b></p> <p><i>Mitigation Measure CULT-2a Archaeological Resources</i></p> <p>All final improvements for the proposed project shall be designed and approved by County staff, as well as a County-approved qualified archaeologist, to avoid impacts to</p>	<p><i>Less than Significant</i></p>

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<p>Register, meets criteria 1 and 2 for a “unique archaeological resource,” and is considered to be an important Native American site, known to contain human burials. As currently proposed, development on the proposed project would occur within the mapped boundaries of archaeological site CA-SMA-151.</p> <p>The majority of the project site is utilized for agricultural uses. The deepest soil penetration is approximately 18 inches with a ripper for irrigation piping, while normal depth is approximately 12 inches. Although the project site has been slightly disturbed from past agricultural activities, prehistoric archaeological site CA-SMA-151 is still intact and would be impacted by development of the proposed project. Possible indirect impacts that could occur include unauthorized artifact collection by construction workers and people drawn to this location through development. Therefore, without mitigation, project impacts to archaeological site CA-SMA-151 would be <i>significant</i>.</p>	<p>prehistoric archaeological site CA-SMA-151 due to the proposed development. To avoid impacts to CA-SMA-151, the archaeological site shall be excluded from disruption during project construction. Avoidance shall be assured by fencing the site perimeter (to be confirmed by a County-approved qualified archaeologist or licensed surveyor prior to any start of grading) to exclude construction equipment, particularly for grading activities. Fencing shall be removed when all construction activities are finished to avoid drawing attention to the site. Additionally, identified site CA-SMA-151 shall be included in a deed restriction recorded with the County Recorder’s Office to further protect this archaeological resource. The deed restriction shall limit uses within the site perimeter of CA-SMA-151 to farming within the existing plow zone and require any ground disturbing activity or development within the cultural site perimeter to be subject to a Coastal Development Permit and meet California Environmental Quality Act (CEQA) requirements for disturbance of a mapped cultural resource.</p> <p><b>OR</b></p> <p>If avoidance of site CA-SMA-151 is impractical or infeasible, a County-approved archaeologist shall be retained to conduct test excavations at the site to determine the integrity of its subsurface deposit. Additionally, a mitigation plan shall be developed by a County-approved archaeologist that addresses specific project impacts and outlines appropriate mitigation measures. At a minimum, the mitigation plan shall include the following:</p> <ul style="list-style-type: none"> <li>• Preparation of a research design that outlines regional issues and how they can be addressed through recovery of materials at CA-SMA-151;</li> <li>• Discussion of field, laboratory, and analytical methods;</li> <li>• Expected involvement of the Native American community;</li> <li>• Actions to be taken in the event that human remains are discovered;</li> <li>• Expected schedule for completing mitigation, including submittal of technical report; and</li> <li>• Curation plan for recovered materials.</li> </ul> <p>The site may continue to be used for growing crops, provided that no ground disturbing activity such as ripping, plowing, disking, etc. is allowed to extend deeper than the existing plow zone (approximately six inches from the existing grade). However, building on the flake scatter portion of the site would also be allowed as long as the improvements would require no ground disturbing activity below the plow zone. Prior to placing fill materials on top of the area being covered, an archaeological investigation</p>	

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Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p><i>Unrecorded Archaeological Deposits</i></p> <p>There is a possibility of accidental discovery and disturbance to unrecorded archaeological deposits found during excavation and grading of the project, including areas where offsite construction is necessary for infrastructure implementation. Without mitigation, project impacts on previously unidentified archaeological deposits would be <b>potentially significant</b>.</p>	<p>shall be conducted to gather baseline data about the nature of the site.</p> <p><i>Mitigation Measure CULT-2b Archaeological Resources</i></p> <p>A qualified archaeologist, as determined by the County, and a Native American shall monitor future ground-disturbing activities in the monitoring area north of site CA-SMA-151.</p>	
<p><i>Impact CULT-3 Paleontological Resources</i></p> <p>A significant adverse effect could occur if grading or excavation activities associated with the proposed project would disturb paleontological resources or geologic features which presently exist within the project site. Although no known paleontological resources have been identified on the project site, it is possible that the subsurface sediments could contain fossil-bearing or undiscovered paleontological resources. There is still the potential for these resources to be encountered during the grading and construction phases of the project, including areas where any offsite construction is necessary for implementation of infrastructure. Without proper care during the grading and excavation phases of the proposed project, unknown paleontological resources could be damaged or destroyed. Without mitigation, project impacts to unknown paleontological resources would be <b>potentially significant</b>.</p>	<p><i>Mitigation Measure CULT-2c Archaeological Resources</i></p> <p>In the event that additional subsurface archaeological resources are encountered during the course of grading and/or excavation, all development shall temporarily cease in these areas until the County Planning Department is contacted and agrees upon a qualified archaeologist to be brought onto the project site to properly assess the resources and make recommendations for their disposition. Construction activities could continue in other areas. If any findings are determined to be significant by the archeologist, they shall be subject to scientific analysis; duration/disposition of archaeological specimens as agreed to by the Native American community, land owner, and the County; and a report prepared according to current professional standards.</p>	<p><i>Less than Significant</i></p>
	<p><i>Mitigation Measure CULT-3 Paleontological Resources</i></p> <p>A qualified paleontologist, as determined by the County, shall monitor future ground-disturbing activities in native soil both onsite and offsite as related to the project. In the event that paleontological resources are discovered during grading and/or excavation, the monitor shall be empowered to temporarily halt or divert construction in the immediate vicinity of the discovery while it is evaluated for significance. Construction activities could continue in other areas. If any findings are determined to be significant by the paleontologist, they shall be subject to scientific analysis, professional museum curation, and a report prepared according to current professional standards.</p>	<p><i>Less than Significant</i></p>

**Table II-1  
Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<b>GEOLOGY AND SOILS</b>		
<p><b>Impact GEO-3 Seismic-Related Ground Failure</b></p> <p><i>Cyclic Densification</i> The settlement analysis performed for the project site estimates that differential settlement of the ground surface would be between 0.5 and 3.5 inches at the Office Park property. A preliminary evaluation of cyclic densification at the Wellness Center property indicates that ground settlement due to cyclic densification would be on the order of approximately 0.25 inches. Therefore, loose layers of sandy soil above the groundwater table that may densify during a major earthquake are present at the site. Impacts to the project due to differential ground settlement resulting from cyclic densification of the loose sandy soils would be <b>potentially significant</b>.</p>	<p><b>Mitigation Measure GEO-3 Seismic-Related Ground Failure</b></p> <p><i>Mitigation Measure GEO-3a Seismic-Related Ground Failure</i> The final geotechnical investigation for the project shall evaluate the potential for cyclic densification and develop final mitigation measures, as needed. Potential mitigation measures may include, but are not limited to: (1) overexcavating and replacing loose sandy soil with compacted engineered fill; (2) applying deep soil compaction techniques, such as DDC, RIC, or equivalent soil densification method; and (3) designing building foundations to accommodate total and differential ground settlement resulting from cyclic densification, as well as post-liquefaction settlement and consolidation ground settlement (if applicable).</p>	<p><i>Less than Significant</i></p>
<p><i>Liquefaction and Associated Hazards</i> The liquefaction potential and associated hazards at the Office Park and Wellness Center properties, was reviewed, including the impacts associated with extensive surface water recharge and wastewater disposal/infiltration. Existing subsurface information indicate liquefaction is likely to occur at the site. Potential liquefaction-induced hazards include: lateral spreading, ground settlement due to post-liquefaction reconsolidation, and surface manifestations such as sand boils and lurch cracking.</p> <p><u>Lateral Spreading</u> Based on the thickness and the relative density of the potentially liquefiable soil, the potential for lateral spreading to occur at the site is low and therefore project impacts would be <b>less than significant</b> and no mitigation measures are required.</p> <p><u>Liquefaction-induced Ground Surface Settlement</u> The estimate for liquefaction-induced ground surface settlement for the Office Park property is between 0 and 6 inches with differential settlement of about 3 inches across a 50-foot horizontal distance; and for the Wellness Center property is between 0 and 2.5 inches with differential settlement of</p>	<p><b>Mitigation Measure GEO-3b Seismic-Related Ground Failure</b></p> <p><i>Mitigation Measure GEO-3b Seismic-Related Ground Failure</i> Additional subsurface exploration using rotary-wash drilling methods and/or CPTs shall be performed to better characterize the subsurface conditions at the sites. Based on the results of subsurface investigation, the potential for soil liquefaction and liquefaction-induced ground failures, such as lateral spreading, post-liquefaction reconsolidation, lurch cracking, and sand boils shall be re-evaluated at the site. The final geotechnical investigation report shall provide mitigation measures for liquefaction-induced hazards. Potential mitigation measures may include: (1) improving the soil with deep soil compaction techniques, such as DDC, RIC, or equivalent method, to reduce the liquefaction potential; (2) buildings supported on stiffened shallow foundations (i.e. footings with interlocking grade beams) bearing on a layer of well-compacted fill; (3) buildings supported on deep foundations such as drilled piers, driven piles or proprietary piles (i.e., torque-down piles and auger cast piles); and (4) constructing a structural slab that spans supported between columns.</p>	<p><i>Less than Significant</i></p>

Table II-1  
Summary of Environmental Impacts & Mitigation Measures

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p>about 1.5 inches across a 50-foot horizontal distance. Therefore, impact to the proposed project due to liquefaction-induced ground surface settlement is <b>potentially significant</b>.</p> <p><u>Surface Manifestations</u></p> <p>Because of the potential for soil liquefaction within relatively shallow soil layers, the impact of surface manifestations of the liquefaction, such as sand boils or lurch cracking, is high at the Office Park and Wellness Center properties and therefore project impacts would be <b>potentially significant</b>.</p> <p><b>Impact GEO-4 Total and Differential Settlement</b></p> <p>Ground settlement at the project site will include cyclic densification settlement and post-liquefaction reconsolidation settlement (see above discussion), as well as consolidation settlement. Foundation settlement may occur due to the consolidation and compression of weak soil under the weight of new fill and structural loads as a result of the proposed project. The static settlement of soft and loose soil layers due to the placement of fill would range from 0.5 to 3 inches with differential settlement of about 1.25 inches over a 100-foot-distance for the Office Park property; no settlement estimates were provided for the Wellness Center property. There is currently insufficient data available to accurately predict the amount of settlement that would occur at the site due to the weight of new fill and building loads. Therefore, settlement impacts to the proposed project would be <b>potentially significant</b>.</p>	<p><b>Mitigation Measure GEO-4 Total and Differential Settlement</b></p> <p>Additional subsurface exploration using rotary-wash drilling methods and/or CPTs and consolidation laboratory testing shall be performed to better characterize the subsurface conditions and soil properties at the site. Based on the results of subsurface investigation, total and differential ground settlement due to cyclic densification, post-liquefaction reconsolidation, and consolidation settlement due to building loads and fill placement shall be re-evaluated. The final geotechnical investigation report shall provide mitigation measures for ground settlement. Potential mitigation measures may include: (1) improving the soil with deep soil compaction techniques, such as DDC, RIC, or equivalent method, to reduce the potential for total and differential ground settlement; (2) supporting the buildings on stiffened shallow foundations (i.e. footings with interlocking grade beams) bearing on a layer of well-compacted fill; (3) supporting the buildings on deep foundations such as drilled piers, driven piles or proprietary piles (i.e., torque-down piles and auger cast piles); and (4) constructing a structural slab that spans supported between columns. If deep foundations are selected, they shall be designed to accommodate load conditions resulting from post-liquefaction reconsolidation and consolidation due to the placement of new fill (if applicable).</p>	<p><i>Less than Significant</i></p>
<p><b>Impact GEO-6 Expansive Soil</b></p> <p>The near-surface soil encountered in the borings drilled at the Office Park property primarily consisted of medium to high plasticity clay. The near-surface soil encountered in the borings drilled at the Wellness Center property consisted of low to high plasticity clay. The site is blanketed by about 1.5 to 2.5 feet of potentially expansive clayey soil. Therefore, project impacts related to expansive soils would be <b>potentially significant</b>.</p>	<p><b>Mitigation Measure GEO-6 Expansive Soil</b></p> <p>The final geotechnical investigation shall provide an estimate of differential movement associated with the shrinking and swelling of the existing onsite expansive soil at the site. Mitigation measures for expansive soils may include designing the buildings to be supported on: (1) shallow foundations that rest on a layer of non-expansive engineered fill; (2) a deepened spread footing system where the proposed footings gain support at or below the depth of significant seasonal moisture fluctuation and the slab-on-grade floor will be supported on a layer non-expansive fill, as described above; (3) a stiffened</p>	<p><i>Less than Significant</i></p>

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Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p><b>Impact GEO-7 Pervious Pavements and Other Water/Wastewater Infiltration Systems</b></p> <p>Pervious pavements would be utilized for both the Office Park and Wellness Center properties. Additionally, extensive groundwater recharge and wastewater infiltration are proposed. The anticipated water/wastewater loading rate would be approximately 20,000 gallons per day. The near-surface soil consists of moderately to highly expansive clay and one of the proposed import fill materials is proposed to be fine-grained material with a plasticity index (PI) of less than 25; therefore, special subgrade preparation and pavement design recommendations may be required to prevent the near-surface clayey soil from ponding water, and becoming saturated and weak under the proposed traffic loads. Therefore, impacts to the proposed project would be <i>potentially significant</i>.</p>	<p>foundation system, such as a reinforced concrete or post-tensioned mat, that is capable of resisting the differential movement and soil pressures associated with the expansive soil; or (4) a deep foundation system that transfers the building and slab loads to competent soil beneath the near-surface moderately to highly expansive soil layer.</p> <p><b>Mitigation Measure GEO-7 Pervious Pavements and Other Water/Wastewater Infiltration Systems</b></p> <p>Considering the near-surface soil may consist of moderately to highly expansive clay, special subgrade preparation, and foundation and pavement design recommendations shall be required to prevent the near-surface clayey soil from ponding water, and becoming saturated and weak under the proposed site loading conditions, such as foundation and traffic loads. Final design recommendations for a pervious pavement system shall allow surface water to percolate through the pavement without causing adverse impacts to new pavements and building foundations due to moisture fluctuations in the near-surface expansive clay. Potential mitigation measures may include: (1) collecting and redirecting surface and subsurface water away from the proposed building foundations; (2) using permeable base material within pavement areas; and (3) installing subdrains to collect and redirect water from areas that could adversely impact building foundations and vehicular pavement to a suitable outlet.</p>	<p><i>Less than Significant</i></p>
	<p><b>Mitigation Measure GEO-8 Review and Approval of Final Grading, Drainage, and Foundation Plans and Specifications</b></p> <p>To ensure the applicant's geotechnical consultant is given the opportunity to participate in the final design and construction phases of the project, the applicant's consultant (Registered Geotechnical Engineer and Registered Engineering Geologist) shall review and approve the final grading, drainage, and foundation plans and specifications. Also, upon completion of construction activities, the applicant's consultant shall provide a final statement indicating whether the work was performed in accordance with project plans and specifications, and the consultant's recommendations. All mitigations and final design recommendations shall be reviewed and approved by the County prior to issuance of applicable permits and approval of the Final Map.</p>	<p><i>Less than Significant</i></p>

Table II-1  
Summary of Environmental Impacts & Mitigation Measures

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p><b>HAZARDS AND HAZARDOUS MATERIALS</b></p> <p><b>Impact HAZ-2 Accidental Release of Hazardous Materials</b></p> <p><i>Potential Solvents in Groundwater from Hydraulically Up-Gradient Properties</i></p> <p>An agricultural supply well was installed in the northern part of the project site and has been pumping water intermittently for agricultural use since 1987. The agricultural well is screened within the same aquifer as the Corona, Culebra, and Retiro Wells (up-gradient of the project site) where chlorinated solvents have historically been detected. The pumping of water from this agricultural well may have drawn chlorinated solvents onto the project site. But based on laboratory analytical results from the Retiro Well and on information from the County Health Department, this condition generally does not represent a threat to human health or the environment and generally would not be the subject of an enforcement action. Therefore, this does not qualify as a recognized environmental condition and the impact would be <b>less than significant</b> and no mitigation measures are required. However, to determine whether hazardous substances have migrated onto the project site from the north or northeast, it is recommended that a groundwater sample be collected from the agricultural supply well (refer to Mitigation Measure HAZ-2).</p> <p><i>Pesticide Use at the Project Site</i></p> <p>Pesticides may have been applied to soil at the project site during previous agricultural use. Although the current owner and project site operator both indicate that to their knowledge pesticides have not been applied to soil at the project site, pesticides may have been applied to soil by previous project site users. Based on Treadwell &amp; Rollo's professional experience with similar projects, the presence of pesticides at the project site is likely to be present and therefore qualifies as a recognized environmental condition, constituting a <b>potentially significant</b> impact. Because the extent of potential past contamination of soils is not yet fully known, the impacts related to the exposure of contaminants to construction workers, nearby businesses and residents during soil grading and excavation activities is unknown; therefore, the Mitigation Measure HAZ-2 is required.</p>	<p><b>Mitigation Measure HAZ-2 Accidental Release of Hazardous Materials</b></p> <p>Prior to approval of final development plans, a Phase II Environmental Site Assessment (Phase II ESA) shall be performed at the project site to evaluate whether the recognized environmental conditions identified in the Phase I ESA represent an actual release of hazardous substances to soil or groundwater at the project site. To determine whether hazardous substances have migrated onto the project site from the north or northeast, a groundwater sample shall be collected from the agricultural supply well. The Phase II ESA shall include parameters that may be applied to a health risk assessment and remediation (Site Management Plan) if soil is inappropriate for reuse and required to be transported off the project site. The recommendations of the Phase II ESA shall be incorporated into project plans to the satisfaction of the County and in conformance with applicable regulations.</p>	<p><i>Less than Significant</i></p>

**Table II-1  
Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p><b>Impact HAZ-3 Hazards Associated with Airport Operations</b></p> <p>An impact would be significant if the proposed land uses present a safety hazard associated with airport operations to people or property onsite or in the project area, or if the proposed land use would present a hazard to aircraft utilizing the Airport. Relatively few aircraft accidents are caused by land use conditions which are hazards to aircraft in flight. However, such potential exists, and protecting against such conditions is essential to airport/land use safety compatibility. Airport safety zones are established by the ALUP. Both project parcels fall within approximately 100 feet of the Approach Protection Zone (APZ) of the southern approach (Runway 30). The proposed Communications and Storage buildings would be located in the Airport Overlay (AO) setback. The AO setback is the required distance setback from the airport runway approaches. The structures proposed within the AO setback do not include residential uses or uses with three or more persons occupying the use at one time. These buildings would also have an approximately 20-foot setback from the Airport Street Right-of-Way (ROW) line.</p> <p>The San Mateo County Comprehensive Airport Land Use Plan has designed safety and land use compatibility criteria to minimize the risks associated with potential aircraft accidents. It is the policy of the Airport Land Use Commission to keep APZs free of structures. Although the project does propose structures within the APZ, the structures do not include residential uses or uses with three or more persons occupying the use at one time, consistent with AO setback requirements.</p> <p>Architectural and design features of the proposed project would comply with all applicable regulations and standards.</p> <p>During the preparation of the Draft EIR, the County received comments regarding potential wind impacts from the project to planes landing onto Half Moon Bay Airport runway. The comments expressed concern that, due to the orientation of the proposed Office Buildings, a wind tunnel could be created between two of the buildings, directly strong winds towards the Half Moon Bay Airport runways, making it hard for pilots to land planes at the airport, particularly smaller, lighter planes. However, the potential for a project-related wind tunnel is anticipated to be low, due to the terrain at the project site. The Pillar Ridge mountains currently block prevailing winds</p>	<p><b>Mitigation Measure HAZ-3 Hazards Associated with Airport Operations</b></p> <p>Prior to approval of final development plans, a navigational easement shall be established for the project site, to the satisfaction of the County Director of Public Works. The navigational easement shall be recorded and shown on the vesting tentative map.</p>	<p><i>Less than Significant</i></p>

**Table II-1  
Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p>from the west and would prevent a wind tunnel effect.</p> <p>Full compliance with all applicable federal, state, regional, and local regulations, programs and plans related to land uses in proximity to a public airport would be required. Therefore, the project would result in a <i>less-than-significant</i> impact associated with airport safety hazards to people residing or working in the area of a public airport.</p> <p>Mitigation Measure HAZ-3 is provided to assure that impacts remain less than significant.</p>		
<b>HYDROLOGY AND WATER QUALITY</b>		
<p><b>Impact HYDRO-3 Substantially Alter Drainage Patterns Resulting in Increased Erosion or Siltation</b></p> <p>The existing project site drains generally to the southwest towards the Pillar Point Marsh. The proposed project would essentially maintain the drainage discharge points onsite. Also, the nearby drainage swale would not be altered, so no stream or river would be altered as part of the proposed project. However, the proposed project would increase the amount of imperviousness onsite since the site currently has no impervious development, and the buildings are considered impervious cover. The increase in imperviousness serves to increase runoff amounts by 80 percent.</p> <p>The site includes soils with a low erosion potential, but the relatively steep parts of the site at the edges of the development will require attention during and after construction to avoid erosion. Erosion control plan sheets have been prepared by the applicant. However, these sheets only show short- or mid-term controls, such as fiber rolls and jute mesh at the downstream edges of the development. Clear flow paths of stormwater are not shown, and long-term erosion control measures are not described. Long-term erosion control measures are necessary, in particular for the relatively steep parts of the site at the edges of development. Indeed, these are the primary areas where construction BMPs are already being planned. A SWPPP has not yet been prepared for the project site. Measures to dissipate energy and control runoff velocities would be required to prevent discharges from eroding slopes and cause gullying and sediment transport downstream. Without a complete erosion control plan, a SWPPP, and a landscape plan showing erosion control measures, including measures that adequately control runoff velocities during larger events, the altered drainage patterns could cause</p>	<p><b>Mitigation Measure HYDRO-3 Substantially Alter Drainage Patterns Resulting in Increased Erosion or Siltation</b></p> <p>The applicant shall prepare and submit a SWPPP for the proposed project. The applicant's SWPPP shall identify the BMPs to control erosion and sedimentation and provide for treatment of 80 to 85 percent of post-construction runoff from new impervious areas. Neighborhood- and/or lot-level treatment BMPs shall be emphasized, consistent with San Francisco Bay RWQCB and SMCWPPP guidance for NPDES Phase 2 compliance. These types of BMPs, which may also assist in reducing post-project peak flows, include infiltration basins and trenches, dry wells, rain gardens, on-contour grassy swales, media filters, biofiltration features and grassy swales. BMPs shall be designed in accordance with engineering criteria in the California Stormwater BMP Handbook or other accepted guidance and designs shall be reviewed and approved by the County prior to issuance of grading or building permits. As discussed under Mitigation Measure HYDRO-5, if lot-level BMPs are accepted by SMCWPPP as a suitable control measure, the applicant shall establish a mechanism for enforcement to assure that BMP functioning is being maintained as designed. The applicant has included a detailed maintenance schedule, which includes monthly inspection of system components, annual weeding, annual replanting, bi-annual cleaning of catch basins, bi-monthly parking lot vacuuming, and daily trash pickup in the parking lots.</p> <p>Submittal of a project erosion control plan and SWPPP to San Mateo County for review shall be required as part of the Final Map application. The erosion control plan shall include components for erosion control, such as phasing of grading, limiting areas of disturbance, designation of restricted-entry zones, diversion of runoff away from disturbed areas, protective measures for sensitive areas, outlet protection, and provision for revegetation or mulching. The plan shall also prescribe treatment measures to trap sediment once it has been mobilized, at a scale and density appropriate to the size and</p>	<p><i>Less than Significant</i></p>

**Table II-1  
Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p><i>significant</i> erosion impacts.</p> <p><b>Impact HYDRO-4 Substantially Alter Drainage Patterns Resulting in Increased Flooding</b></p> <p>Placing fill or other structures in such a way as to block existing drainage paths could result in increased onsite or offsite flooding, particularly if there is significant offsite drainage that flows through the site. However, since no drainage report was provided by the applicant, it is unknown if there are substantial stormwater discharges that would travel onto the site from neighboring areas, particularly the residential development to the northwest. Increased flooding from onsite runoff can be analyzed by looking at the effects on Pillar Point Marsh of the increased runoff. The surface area of the freshwater portion of the marsh, which is upstream of West Point Avenue, is about 23.5 acres, based on Figure IV.H-6 and other reports. Based on the estimated precipitation for a 100-year, 24-hour storm and the increase in site impermeability, runoff volume is expected to increase by 17.0 acre-inches. This would increase the marsh level by about seven-tenths (0.7) of an inch over the existing level during a 100-year storm, assuming no increased outflow due to the higher water level. Therefore, the proposed project could have a <i>significant</i> impact on flooding.</p>	<p>slope of the catchment. These measures typically include inlet protection, straw bale barriers, straw mulching, straw wattles, silt fencing, check dams, terracing, and siltation or sediment ponds. Other aspects of the SWPPP, especially those related to water quality, are discussed below for other mitigation measures.</p> <p>Landscape plans showing the grassy swales and indicating flow paths shall also be provided.</p> <p><b>Mitigation Measure HYDRO-4 Alteration of Drainage Patterns Resulting in Increased Flooding</b></p> <p>The applicant shall submit a drainage report and plans to the County that identify the drainage pathways and the extent of any offsite drainage that flows onsite. How such offsite drainage will be conveyed through the site shall also be detailed. The drainage plan shall provide designs consistent with recognized engineering criteria. The drainage plan shall be reviewed and approved by the County prior to issuance of grading or building permits.</p>	<p><i>Less than Significant</i></p>
<p><b>Impact HYDRO-5 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</b></p> <p><i>Quality of Surface Water Runoff</i></p> <p>The proposed project may generate significant adverse impacts on water quality. Pollutants and chemicals associated with urban development would runoff new roadways and other transportation facilities, such as parking lots. The pollutants can then flow into the main Pillar Point Marsh or the associated drainage swale. Such contaminated urban runoff remains</p>	<p><b>Mitigation Measure HYDRO-5 Surface Water Runoff Quality</b></p> <p>The applicant shall prepared and submit a comprehensive erosion control plan and SWPPP. Potential construction-phase and post-construction pollutant impacts from development can be controlled through preparation and implementation of an erosion control plan and a SWPPP consistent with recommended design criteria, in accordance with the NPDES permitting requirements enforced by SMCWPPP and the San Francisco Bay RWQCB. The erosion control plan forms a significant portion of the construction-</p>	<p><i>Less than Significant</i></p>

**Table II-1  
Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p>relatively untreated, thus resulting in incremental long-term degradation of water quality. Increased stormwater runoff can also lead to erosion, which can then contribute sediment to receiving waters; sediment can impair water quality by carrying with it any of the pollutants mentioned above.</p> <p>Short-term adverse impacts to water quality may also occur during construction of the project when areas of disturbed soils become susceptible to water erosion and downstream sedimentation. This impact is of particular concern where projects are located on previously contaminated sites. Grading and vegetation removal in proximity to drainage features, such as the drainage swale, could result in an increase in bank erosion, affecting both water quality and slope stability along the drainage feature.</p> <p>Under existing conditions, fertilizer and pesticide compounds are the most likely pollutants of concern since the project site is currently in vegetable crop production. Given that agricultural production would be reduced following project construction, the project could potentially reduce any existing nitrate-nitrogen, ammonia-nitrogen and agriculture-related organic contributions to the surface water and ground water, a benefit to water quality.</p> <p>However, there are several pollutants that the project development could contribute to the surface water, including sediment and typical urban pollutants. In contrast to other potential pollutants, sediment is typically of greatest potential concern during the construction-phase of development. After a project has been constructed and the landscaping has been installed, erosion and sedimentation from development sites is usually minimal.</p> <p>Potential post-project contributions of sediment to surface waters from storm drain outlets have been discussed above. Pollutants other than sediment which might typically degrade surface-water quality during project construction include petroleum products (gasoline, diesel, kerosene, oil, and grease), hydrocarbons from asphalt paving, paints, and solvents, detergents, nutrients (fertilizers), pesticides (insecticides, fungicides, herbicides, rodenticides), and litter. Once the buildings and roadways have been constructed, typical urban runoff contaminants might include all of the above constituents, as well as trace metals from pavement runoff, nutrients, and bacteria from pet wastes, and landscape maintenance debris. Since the drainage system discharges directly to Pillar Point Marsh, these pollutants could affect aquatic and wetland habitats and sensitive species, and sediment could reduce flood storage of the marsh. Without mitigation, the effects on</p>	<p>phase controls required in a SWPPP, which also details the construction-phase housekeeping measures for control of contaminants other than sediment, as well as the treatment measures and BMPs to be implemented for control of pollutants once the project has been constructed. The SWPPP also sets forth the BMP monitoring and maintenance schedule and identifies the responsible entities during the construction and post-construction phases.</p> <p>The applicant's SWPPP shall identify the BMPs that will be used to reduce post-construction peak flows to existing levels in all onsite drainages where construction will occur. Neighborhood- and/or lot-level BMPs to promote infiltration of storm runoff shall be emphasized, consistent with San Francisco Bay RWQCB and SMCWPPP guidance for NPDES Phase 2 permit compliance. These types of BMPs, which may also enhance water quality, include infiltration basins and trenches, dry wells, rain gardens, on-contour grassy swales, media filters, and biofiltration features. BMPs shall be designed in accordance with engineering criteria in the California Stormwater BMP Handbook or other accepted guidance and designs shall be reviewed and approved by the County prior to issuance of grading or building permits. The applicant shall prepare a clearly defined operations and maintenance plan for water quality and quality control measures. The design and maintenance documents shall include measures to limit vector concerns, especially with respect to control of mosquitoes. The applicant shall identify the responsible parties and provide adequate funding to operate and maintain stormwater improvements (through a HOA, Geological Hazard Abatement District, CSD, CFD or similar organization). If lot-level BMPs are accepted by the County as a suitable control measure, the applicant shall establish a mechanism for enforcement to assure that BMP functioning is being maintained as designed. The applicant shall also establish financial assurances, as deemed appropriate by the Community Development Director, enabling the County to maintain the stormwater improvements should the HOA or other entity disband or cease to perform its maintenance responsibilities.</p> <p>The SWPPP must also include post-construction water quality BMPs that control pollutant levels to pre-development levels, or to the maximum extent practicable (MEP). To confirm that structural BMPs (e.g., biofiltration features, wet ponds, vegetated swales, constructed wetlands, or media filters) will function as intended, design must be consistent with engineering criteria, as set forth in guidance such as the recently revised California Storm Water BMP Handbook for New and Redevelopment. These types of structural BMPs are intended to supplement other storm water management program measures, such as street sweeping and litter control, outreach regarding appropriate fertilizer and pesticide use practices, and managed disposal of hazardous wastes.</p> <p>The main post-construction water quality enhancement measure indicated by the</p>	

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Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p>surface water quality could be <i>significant</i>.</p> <p><b>Impact HYDRO-6</b> <i>Otherwise Substantially Degrade Groundwater Quality</i></p> <p>The proposed project could potentially degrade groundwater quality due to contractor activities during construction, residents' and workers' activities following occupation of the constructed facilities, and contamination of unused wells.</p> <p>Constituent pollutants from the first two sources are the same as described above for surface waters, and the regulatory framework and mitigation measures proposed to minimize impacts are also identical. No further mitigation would be required.</p> <p>The project applicant has indicated that an existing well, permitted for potable water use although currently used only for agricultural purposes, is onsite and planned for continued use during project operation. If any other wells do exist, are not used, and are not properly destroyed, the unused wells could pose a potentially significant impact to ground water quality as pollutants entering the well would be rapidly conveyed to the subsurface aquifer. This would be a <i>significant</i> impact on ground water quality.</p>	<p>applicant report is the use of rain gardens (constructed wetlands) to control pollutants. Locations and designs of the stormwater infiltration system should be provided to the County as part of the grading plans during Final Map review.</p> <p>Many of the distributed BMPs that could prove useful to address control of post-project peak flows at the lot- and/or neighborhood level could reasonably be linked with measures to enhance water quality, thereby providing compliance with the NPDES Phase 2 permit requirements as well. For example, downspouts could direct roof runoff to biofiltration features, with percolated stormwater conveyed through subdrains to small infiltration basins or dry wells.</p> <p><b>Mitigation Measure HYDRO-6</b> <i>Groundwater Quality</i></p> <p>The applicant shall abandon all unused wells on the project site consistent with San Mateo County Department of Environmental Health standards and the standards described in the State of California Department of Water Resources Well Standards (Bulletins 74-81 and 74-90).</p> <p>Any onsite wells left in service should meet CDPH criteria for well protection. The applicant shall prepare, if required by the CDPH or County Department of Health Services, a Drinking Water Source Assessment and Protection (DWSAP) application to identify and protect against potential well contaminants.</p>	<p><i>Less than Significant</i></p>
<p><b>Impact HYDRO-9</b> <i>Expose People or Structures to Inundation by Seiche, Tsunami, or Mudflow</i></p> <p>There are hydrologic risks associated with seismic activity near large bodies of water, which can cause a tsunami, a seiche, or flow of mud and other debris from hillsides.</p> <p>A tsunami is a series of waves created when a body of water, such as an ocean, is rapidly displaced on a massive scale. Earthquakes, mass movements above or below water, volcanic eruptions, and other underwater explosions, landslides, and large meteoric impacts all have the potential to</p>	<p><b>Mitigation Measure HYDRO-9</b> <i>Exposure to Tsunami and Seiche</i></p> <p>In areas subject to tsunami and seiche effects, implementing agencies shall, where appropriate, ensure that the project incorporates features designed to minimize damage from a tsunami or seiche. Structures should either be placed at elevations above those likely to be adversely affected during a tsunami or seiche event or be designed to allow swift water to flow around, through, or underneath without causing collapse. Other features to be considered in designing projects within areas subject to tsunami or seiche may include using structures as buffer zones, providing front-line defenses, and securing</p>	<p><i>Less than Significant</i></p>

Table II-1  
Summary of Environmental Impacts & Mitigation Measures

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p>generate a tsunami or teletsunami. As described earlier, ABAG has created tsunami maps for the Bay Area. The map showing the project vicinity indicates that the project would place residential and commercial structures within a mapped tsunami area, understandable given its proximity to the Pacific Ocean. This could represent a <b>potentially significant</b> impact.</p> <p>The resonant oscillation of water (a standing wave) in an enclosed or partially enclosed water body is a seiche, which can raise flood levels of a water body. The Pillar Point Harbor near the project site is mostly enclosed by engineered and constructed jetties. While these jetties tend to protect the harbor from the day-to-day effects of currents and tides, they could lead to seiche effects, especially if a tsunami were to affect the harbor. There are no other lakes or other enclosed bodies of water in the general vicinity of the project that would produce seiche events and affect the project site. The proximity of the project to the partially enclosed Pillar Point Harbor and the potential for tsunami events could expose people to inundation by seiche, which represents a <b>potentially significant</b> impact. The mitigations for such an occurrence would coincide with mitigations for tsunami events.</p> <p>Landslides and mudflows tend to occur in steeply sloped areas. A USGS map of landslide potential for San Mateo County lists the project vicinity as a “flat land” area with a low potential for landslides, and a USGS map of debris-flow source areas does not include the project vicinity in an area predicted to be a principal debris source area. The USGS Quad Sheet confirms the flat terrain. Therefore, given the relative flatness of the area and the mapping results, the potential for impacts from mudflow are considered <b>less than significant</b> within the project area and site.</p>	<p>foundations of expendable structures so as not to add to debris in the flowing waters.</p>	
<b>NOISE</b>		
<p><b>Impact NOISE-1 Construction Noise</b></p> <p>Construction of the proposed project would require grading and excavation, installation of utilities, and construction and finishing of the proposed structures and facilities. The project construction time schedule would be between approximately 30 and 36 months to fully complete the Wellness Center and Office Park property development.</p> <p>The highest noise levels that would be experienced by the sensitive receptors would only occur for a limited duration during construction of the proposed project. General construction activities occurring more than 100</p>	<p><b>Mitigation Measure NOISE-1 Construction Noise</b></p> <p>The construction contractor shall implement measures to reduce the noise levels generated by construction equipment operating at the project site during project grading and construction phases. The construction contractor shall include in construction contracts the following requirements or measures shown to be equally effective:</p> <ul style="list-style-type: none"> <li>All construction equipment shall be equipped with improved noise muffling, and maintain the manufacturers’ recommended noise abatement measures, such as mufflers, engine covers, and engine isolators in good working</li> </ul>	<p><i>Less than Significant</i></p>

**Table II-1  
Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p>feet from the existing residences would not exceed 80 dBA and would not be significant. However, the temporary or periodic impact when grading or construction activities (e.g. paving and concrete installation) occur within 100 feet of an occupied residence would generate noise levels of up to 86 dBA, which would be <b>significant</b>. Also, the noise levels generated by pile driving operations at the site would generate substantial noise levels at the nearby residential units that would be highly disturbing and result in a <b>significant</b> impact.</p>	<p>condition.</p> <ul style="list-style-type: none"> <li>• Stationary construction equipment that generates noise levels in excess of 65 dBA <math>L_{eq}</math> shall be located as far away from existing residential areas as possible. The equipment shall be shielded from noise sensitive receptors by using temporary walls, sound curtains, or other similar devices.</li> <li>• Heavy-duty vehicle storage and start-up areas shall be located a minimum of 150 feet from occupied residences where feasible.</li> <li>• All equipment shall be turned off if not in use for more than five minutes.</li> <li>• Drilled piles or the use of sonic or vibratory pile drivers shall be used instead of impact pile drivers. The driving heads of sonic or vibratory pile drivers shall be screened on all sides by acoustic blankets capable of reducing noise levels by at least 15 dBA.</li> <li>• Temporary barriers such as flexible sound control curtains shall be erected between the proposed project and the El Granada Mobile Home Park to minimize the amount of noise during construction. The sound control curtains shall reduce construction-related noise levels at the El Granada Mobile Home Park to less than 80 dBA <math>L_{eq}</math>.</li> <li>• Two weeks prior to the commencement of grading or construction at the project site, notification must be provided to the immediate surrounding offsite residential uses that discloses the construction schedule, including the various types of activities and equipment that would be occurring throughout the duration of the grading and construction periods.</li> <li>• Two weeks prior to the commencement of grading or construction at the project site, an information sign shall be posted at the entrance to each construction site that identifies the permitted construction hours and provides a telephone number to call and receive information about the construction project or to report complaints regarding excessive noise levels. The applicant shall rectify all reasonable complaints within 24 hours of their receipt. The County may be required to determine whether a complaint is reasonable and subject to being rectified. Should the applicant consider a complaint to be unreasonable, the applicant shall contact the County Planning Department within 24 hours of the receipt of the complaint to discuss how the complaint should be addressed.</li> </ul>	

Table II-1  
 Summary of Environmental Impacts & Mitigation Measures

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p><b>Impact NOISE-2 Construction-Related Groundborne Vibration</b></p> <p>Project-related construction activities would include grading, excavation, and building construction, which would have the potential to generate low levels of groundborne vibration. In addition, pile driving may be required to offset the potential liquefaction-induced ground failures.</p> <p>Vibration velocities could reach as high as approximately 0.031 inches per second PPV at a distance of 50 feet from the source activity. This corresponds to a RMS velocity level (in VdB) of 78 VdB at 50 feet from the source activity.</p> <p>Construction activities would be limited to the hours of 7:00 A.M. to 6:00 P.M. on weekdays and 9:00 A.M. and 5:00 P.M. on Saturdays in accordance with Section 4.88.360 of the Mateo County Ordinance Code. Construction activities are also prohibited at any time on Sundays, Thanksgiving and Christmas. While the use of impact pile drivers at the project site would not occur during recognized sleep hours for residences, the impact of daytime groundborne vibration levels during construction of Building A or the Office Park would still be considered <b>significant</b>.</p>	<p><b>Mitigation Measure NOISE-1 Construction Noise</b></p> <p>Mitigation Measure NOISE-1 identified above requires the use of drilled piles or the use of sonic or vibratory pile drivers instead of impact pile drivers if at all feasible based on geological conditions (see above).</p>	<p><i>Less than Significant</i></p>
<p><b>PUBLIC SERVICES</b></p>		
<p><b>Impact PS-1 Police Services</b></p> <p>While the project would increase the number of persons and level of activity on the project site, given the type of use, it is reasonable to expect that the project would not result in a meaningful increase in the amount of crime in the project area. Further, given that the project is not expected to generate a considerable increase in crime, the affect that the project would have on response times would be minimal. Additionally, according to the Sheriff's Department, although additional deputies and equipment could be necessary to accommodate the project, the additional demand for police services created by the project would not require the need for new or altered police facilities. Therefore, project impacts on police services would be <b>less than significant</b> and no mitigation measures are required.</p> <p>Although impacts were found to be less than significant, the following mitigation measure is recommended by the Sheriff's Department to further reduce impacts related to an increased demand for police services associated</p>	<p><b>Mitigation Measure PS-1 Police Services</b></p> <p>Provide onsite manned security with clear lines of communication to fire and emergency medical response.</p>	<p><i>Less than Significant</i></p>

Table II-1  
 Summary of Environmental Impacts & Mitigation Measures

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p>with the proposed project.</p> <p><b>Impact PS-2 Fire Protection Services</b></p> <p><i>Construction</i></p> <p>Construction of the proposed project would increase the potential for accidental onsite fires from sources such as the operation of mechanical equipment and use of flammable construction materials. In most cases, the implementation of “good housekeeping” procedures by the construction contractors and the work crews would minimize these hazards. Good housekeeping procedures that would be implemented during construction of the proposed project include: the maintenance of mechanical equipment in good operating condition; careful storage of flammable materials in appropriate containers; and the immediate and complete cleanup of spills of flammable materials when they occur.</p> <p>Construction of the proposed project would not be expected to tax fire fighting and emergency services to the extent that there would be a need for new, expanded, consolidated, or relocated fire facilities, in order to maintain acceptable performance objectives set by the District. Therefore, impacts associated with fire protection services during construction would be <b>less than significant</b> and no mitigation measures are required.</p> <p>Although impacts were found to be less than significant, Mitigation Measure PS-2a would further reduce impacts associated with fire protection services during construction.</p>	<p><b>Mitigation Measure PS-2 Fire Protection Services</b></p> <p><i>Mitigation Measure PS-2a Fire Protection Services</i></p> <p>When there are partial closures, roadblocks, or encroachments to streets surrounding the project site during the grading and construction periods, flagmen shall be utilized to facilitate the traffic flow.</p>	<p><i>Less than Significant</i></p>
<b>TRANSPORTATION AND TRAFFIC</b>		
<p><b>Impact TRANS-1 Intersection Level of Service and Capacity</b></p> <p>The proposed project would bring additional traffic to the project site and the surrounding roadways. The proposed project would add approximately 2,123 daily trips to roads in the vicinity of the project site.</p> <p>The results of the LOS analysis under average project conditions show that all of the study intersections would operate at an acceptable LOS C or better. However, the eastbound left-turn movement at the intersection of SR 1 and Cypress Avenue is shown to operate at LOS F with a delay of 59.8 seconds under worst-case project conditions (the LOS calculation sheets are included in Appendix J of this DEIR). The traffic analysis found that there are no improvements possible at this intersection to improve this LOS F other than</p>	<p><b>Mitigation Measure TRANS-1 Intersection Level of Service and Capacity</b></p> <p>Following project occupancy, the applicant shall submit a bi-annual report, signed and stamped by a Professional Transportation Engineer in the State of California, to the Director of Planning and Building on the level of service at the intersection of Cypress Avenue and SR 1 stating whether or not this location warrants a signal. If it meets warrants, then the applicant shall coordinate with Caltrans to pay a fair share for the installation of a signal within 5 years of the date of that report.</p>	<p><i>Less than Significant</i></p>

Table II-1  
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Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p>signalization; therefore, with the project, the peak-hour signal warrant would be met at the intersection of SR 1 at Cypress Avenue and impacts to intersection LOS and capacity would be <b>significant</b> (the signal warrant analysis sheets are included in Appendix J of this DEIR). With signalization, this intersection would operate at LOS A under the AM and PM peak-hours for both (average and worst-case) project scenarios. Under signalized conditions, the existing roadway geometry would be adequate to handle the anticipated traffic demand.</p> <p><b>Impact TRANS-8 Construction</b></p> <p>Construction activities have the potential to add construction traffic to the street network in the vicinity of the project site. Construction activities are temporary by nature and project-related construction activities are not expected to cause a substantial disruption to roadway capacity. To fully complete the Wellness Center and Office Park development, the project's construction time schedule is anticipated to last between 30 and 36 months. Construction activities would occur in phases and would be required to comply with applicable County construction standards. The proposed project would not import or export any soil and grading would be balanced on the project site, eliminating truck haul-trips on regional roads. County and emergency services would be notified of any restrictions on any roadways, alternative emergency routes, and detours due to construction activities of the project. Therefore, impacts related to construction traffic would be <b>less than significant</b> and no mitigation measures are required. While traffic impacts during construction would be less than significant, Mitigation Measure TRANS-8 is recommended to further reduce adverse construction traffic impacts.</p>	<p><b>Mitigation Measure TRANS-8 Construction</b></p> <p>Prior to issuance of grading permits, the applicant shall also submit a traffic control plan to the County Department of Public Works for review and approval. All staging during construction shall occur onsite.</p>	<p><i>Less than Significant</i></p>
<p><b>Impact TRANS-9 Intersection Levels of Service Under Cumulative Conditions</b></p> <p>The results of the LOS analysis under Cumulative Conditions both with and without the project show that all the intersections would operate at LOS C or better under average conditions. Under cumulative with no project PM peak-hour conditions there would be a 46.0 second delay for the worst-case movement (eastbound left) of the Cypress Avenue at SR 1 intersection. This delay would continue to increase under the project condition scenario. The worst-case delay for this</p>	<p><b>Mitigation Measure TRANS-1 Intersection Level of Service and Capacity</b></p> <p>With implementation of Mitigation Measure TRANS-1 above, cumulative impacts related to peak-hour traffic volume and intersection LOS would be reduced to a less-than-significant level.</p>	<p><i>Less than Significant</i></p>

**Table II-1  
Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p>movement would be 177.7 seconds during the PM peak-hour (131.7 seconds more than without the project). As a result, some of the project trips might take the southbound Airport Street route to equalize this delay. However, the traffic analysis found that even if 25 percent of the project traffic took the southbound route as opposed to the northbound route, the delay at the intersection would continue to operate at LOS F for the left turn from Cypress Avenue onto SR 1 and the signal warrant would be met. This would result in a <i>significant</i> impact.</p> <p><b>Impact TRANS-10 Cumulative Signal Warrant Analysis</b></p> <p>The peak-hour signal warrant was checked for the seven currently unsignalized intersections to determine whether signalization would be justified on the basis of cumulative peak-hour volumes. The analysis showed that the study intersection of SR 1 at Cypress Avenue would meet the peak-hour signal warrant under cumulative conditions both with and without the project.</p> <p>Based on project and cumulative with and without project conditions, the peak-hour signal warrant is met at the intersection of SR 1 at Cypress Avenue. With this improvement, the SR 1/Cypress Avenue intersection would operate at LOS A during both the AM and PM peak-hours. Under signalized conditions, the existing roadway geometry would be adequate to handle the anticipated traffic demand.</p>	<p><b>Mitigation Measure TRANS-1 Intersection Level of Service and Capacity</b></p> <p>With implementation of Mitigation Measure TRANS-1, cumulative impacts related to project peak-hour traffic volume and intersection LOS would be reduced to a less-than-significant level.</p>	<p><i>Less than Significant</i></p>
<b>UTILITIES AND SERVICE SYSTEMS</b>		
<p><b>Impact UTIL-2 Wastewater Collection System Capacity</b></p> <p>The project proposes to have a sewer connection to the Granada Sanitary District as a contingency for surplus flows during the wet season and for other emergency purposes. The applicant has not provided estimates of the amount of sewage flow that would be directed to the sewer system from the project. However, based on the analysis in this DEIR, it should be anticipated that there will be times when the entire daily sewage flow (26,000 gpd) would be discharged to the sewer. This would occur, for example, as a result of having to suspend water recycling due to non-compliance with Title 22 treatment limits. No hydraulic analysis has been completed by the applicant to confirm that the existing 8-inch sewer line in Stanford Avenue has sufficient capacity to accommodate additional flows of 26,000 gpd. Analysis by the DEIR authors indicate that an average flow of</p>	<p><b>Mitigation Measure UTIL-2 Wastewater Collection System Capacity</b></p> <p>The applicant shall either: (a) revise the project design to limit the maximum amount of sewage flow to the Granada Sanitary District sewer system to that which can be accommodated by the existing 8-inch sewer line in Stanford Avenue and the Princeton Pump Station; or (b) provide necessary expansion of the capacity of the sewer system to accommodate the addition of the expected maximum sewage flow of 26,000 gpd from the project.</p>	<p><i>Less than Significant</i></p>

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Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p>26,000 gpd would likely require a minimum sewer line diameter of 12 inches or greater; thus the existing 8-inch line would not be adequate for the project. The Princeton Pump Station may also have inadequate capacity for the additional surcharge of 26,000 gpd sewage flow from the project. The potential lack of adequate capacity for the project wastewater flows in the existing Granada Sanitary District sewage collection system may require improvements that have not been accounted for in the project plans. This is a <i>potentially significant</i> impact.</p>		
<p><b>Impact UTIL-4 Wastewater Recycling and Disposal Requirements</b>                      Demonstration of the ability of the project wastewater facilities to comply with Title 22 Water Recycling Criteria and RWQCB Minimum Guidelines for drain field systems is critical to establishing project feasibility. Available information is insufficient to make this finding. This is a <i>potentially significant</i> impact.</p>	<p><b>Mitigation Measure UTIL-4 Wastewater Recycling and Disposal Requirements</b>                      The applicant shall comply with State Health Department and RWQCB requirements for wastewater recycling.</p>	<p><i>Less than Significant</i></p>
<p><b>Impact UTIL-5 Wastewater and Recycling Water Flow Estimates</b>                      The projected volume of wastewater recycling for toilet flushing appears to have been overestimated by the project applicant. The applicant estimates that approximately 16,000 gpd of recycled water will be used for toilet flushing at the Office Park and Wellness Center. The corrected estimate of water for toilet flushing could be two-thirds this amount. The estimates of toilet flushing flows have been used by the applicant to estimate: (a) the amount of recycled water available for irrigation uses; and (b) the total amount of wastewater flow to be disposed of by other means (i.e., leachfield beds) during the winter non-irrigation period. As a consequence of overestimating the toilet flushing flows, further analysis is needed to determine whether or not there are sufficient irrigation areas and necessary capacity in the drain fields for the corrected (larger) amount of wastewater flow. This is a <i>potentially significant</i> impact.</p>	<p><b>Mitigation Measure UTIL-5 Wastewater and Recycling Water Flow Estimates</b>                      The applicant shall revise the project plans and water budget analysis to correct the inconsistencies in the water recycling assumptions and calculations, and shall use this information to verify: (a) the adequacy of plans for irrigation uses of recycled water; and (b) the sufficiency of the proposed leachfields for winter season dispersal of all wastewater flow not distributed for toilet flushing. This information shall be provided for review and approval by the RWQCB.</p>	<p><i>Less than Significant</i></p>
<p><b>Impact UTIL-6 Creek Crossing by Sewage Pipeline</b>                      The preliminary utility plans for the project show a gravity sewer line running from the North Parcel to the South Parcel along the westerly side of Airport Street. It appears that the proposed alignment for the sewer line, as well as other utilities, crosses through the open creek channel area, on the downstream side of the existing concrete headwall. Correspondence from</p>	<p><b>Mitigation Measure UTIL-6 Creek Crossing by Sewage Pipeline</b>                      The project applicant shall modify the current plans for sewer connection between the North and South parcels to provide either: (a) re-alignment and profile correction to accommodate a gravity sewer line; or (b) incorporation of a lift station on either the North or South parcel.</p>	<p><i>Less than Significant</i></p>

**Table II-1  
Summary of Environmental Impacts & Mitigation Measures**

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p><b>Impact UTIL-11 Be Served by a Landfill with Insufficient Permitted Capacity to Accommodate the Project's Solid Waste Disposal Needs</b></p> <p><i>Construction Phase</i></p> <p>The construction phase of the proposed project would generate debris in the form of wood, scrap metal, asphalt/concrete, dry wall, plastics, roofing, green waste, and other miscellaneous and composite materials. Much of the solid waste generated during the construction phase would be recycled and salvaged to the maximum extent feasible. County Ordinance Code 04099 requires all major construction projects to submit a Waste Management Plan to the County. This plan requires identifying that 100 percent of inert solids (e.g., asphalt, brick, concrete, dirt, fines, rock, sand, soil and stone) must be recycled or salvaged, and 50 percent of non-inert debris (e.g., wood, metal, roofing, etc.) must be recycled or salvaged.</p> <p>Construction materials not recycled would be disposed of at local landfills. Provided the project conforms to County Ordinance No. 04099, impacts to landfill and solid waste services associated with the short-term generation of solid waste during project construction would be <b>less than significant</b>.</p>	<p><b>Mitigation Measure UTIL-11 Be Served by a Landfill with Insufficient Permitted Capacity to Accommodate the Project's Solid Waste Disposal Needs</b></p> <ul style="list-style-type: none"> <li>To facilitate onsite separation and recycling of construction-related wastes, the contractor(s) shall provide temporary waste separation bins onsite during construction. These bins shall be emptied and recycled accordingly as a part of the project's regular solid waste disposal program.</li> <li>The applicant shall prepare and submit a facility recycling program for the collection and loading of recyclable materials prepared in response to the California Solid Waste Reuse and Recycling Access Act of 1991 as described by the CIWMB, Model Ordinance, Relating to Areas for Collecting and Loading Recyclable Materials in Development Projects, March 31, 1993. Adequate space or enclosures for recycling bins shall be provided at appropriate locations to promote recycling of paper, metal, glass, and other recyclable material.</li> </ul>	<p><i>Less than Significant</i></p>

Table II-1  
 Summary of Environmental Impacts & Mitigation Measures

Environmental Impact	Mitigation Measures	Level of Significance after Mitigation
<p><i>Operational Impacts</i></p> <p>The site is currently in agricultural use and produces a negligible amount of solid waste. Implementation of the proposed project would result in an ongoing generation of solid waste throughout the lifespan of the project.</p> <p>While the Ox Mountain landfill is currently in excess of its total permitted capacity, it continues to accept waste as the landfill gradually settles and new space becomes available. Ox Mountain has sufficient capacity to meet the solid waste service demands of the proposed project. The proposed project would comply with all applicable County policies and ordinances (e.g., Green Building Ordinance). Implementation of the proposed project would result in a negligible increase in solid waste on a regional scale, and thus would not significantly impact available landfill capacity. The proposed project would not result in the need for additional waste collection routes or recycling or disposal facilities. Therefore, impacts associated with solid waste service during operation of the project would be <i>less than significant</i>.</p> <p>Although impacts were found to be less than significant, Mitigation Measure UTIL-11 is recommended to further reduce any adverse solid waste impacts.</p>		

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