

**INITIAL STUDY/
PROPOSED MITIGATED NEGATIVE
DECLARATION**

OAK GROVE RESIDENTIAL PROJECT

**PLANNING APPLICATION PA 160056
INITIAL STUDY NO. PA 160056**



December **2022**

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**PLANNING APPLICATION PA 160056
INITIAL STUDY NO. PA 160056**

Submitted to:



County of Orange
OC Development Services/Planning
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Project No. OAK1601

LSA

December **2022**

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PROJECT DESCRIPTION

Project Title:	Oak Grove Residential Project
Lead Agency Contact:	County of Orange OC Development Services/Planning 601 North Ross Street Santa Ana, California 92701 Debbie Drasler, Contract Planner Debbie.Drasler@ocpw.ocgov.com
Project Location:	The Project site is located at 23432 Vista del Verde ¹ in Coto de Caza, a gated community in unincorporated Orange County. The Project site consists of approximately 5.1 acres of partially developed land. Refer to Figure 1, <i>Regional Project Location and Vicinity Map</i> ; Figure 2, <i>Photograph Key Map</i> ; Figures 3A through 3D, <i>Existing Site Photographs</i> , and <i>Photographs of Existing Surrounding Land Uses</i> ; and Figure 5, <i>Existing Project Site</i> .
General Plan Designations:	Suburban Residential (1B)
Zoning:	Coto de Caza Specific Plan, Planning Area 21, Community Center/Commercial
Specific Plan:	Coto de Caza Specific Plan

PROJECT LOCATION AND SITE DESCRIPTION

Regional Project Location

The Project site is located in the unincorporated Coto de Caza community in the foothills of the Santa Ana Mountains in the southeastern portion of unincorporated Orange County (County), California. Regionally, the Project site is located east of State Route 241 (SR-241), northeast of the community of Las Flores, southeast of the City of Rancho Santa Margarita, northeast of the communities of Ladera Ranch and Rancho Mission Viejo, north of State Route 74 (SR-74/Ortega Highway), north of Ronald W. Caspers Wilderness Park, northeast of the Pacific Ocean, and south of the Santa Ana Mountains. Figure 1, *Regional Project Location and Vicinity Map*, provides an overview of the Project site's location within the County.

¹ The Coto de Caza Specific Plan names this street Vista del Verde. Maps in technical appendices from different authors may write "del" in either lower case or title case. This document uses the lower case "del."

Vicinity Project Location

The Project site is located within Planning Area (PA) 21 of the Coto de Caza Specific Plan (referred to hereafter as the Specific Plan), located in the northerly portion of the Coto de Caza community. The Coto de Caza community was planned as two residential communities with one portion located within a gated community and another portion located adjacent to and outside of the gated community. The Project site is located within the northerly portion of the gated community approximately 1-mile south of the northern entrance guard house.

Surrounding and Adjacent Land Uses

The Project site is adjacent to and near the following uses:

- Equestrian uses to the northeast, north, and northwest,
- Medium-density single-family residential uses to the northwest beyond the equestrian uses,
- Open space, community park & ride lot across Via Pajaro and the Four Pines Pastures property (formerly Maxwell Stables) to the east,
- Fairway Oaks residential condominiums to the west and southwest across Vista del Verde Road,
- An approximately 1.6-acre undeveloped site with an approved retail/commercial use² on the site of the former General Store adjacent to the southerly site boundary and now known as the Coto de Caza General Store and Mercantile, which is anticipated to begin construction in Fall 2022 or soon thereafter, and
- Coto de Caza Golf Course to the southwest.

Project Site

The Project site is approximately 5.1 acres and is irregular in shape. Elevation ranges from approximately 828-847 feet above mean sea level. The Project site encompasses a 3,453-square-foot (sf) maintenance building/hay barn and two round pen enclosures from the equestrian site, as well as various utility apparatuses including a small operative electrical structure that retains an existing Southern California Edison transformer and Capacitor. Undeveloped areas within the Project site are characterized by the presence of dry soil and scattered vegetation, including several mature western sycamore trees and California coast live oak trees. Refer to Figure 2, *Photograph Key Map*, and Figures 3A, 3B, 3C, and 3D for representative photos of the Project site and surrounding land uses.

Project Site Drainage and Hydrology

In the existing condition, the Project site is comprised of approximately 1.0 acre (or 20 percent of the total Project site) of impervious surface and approximately 4.1 acres (or 80 percent of the total Project site) of pervious surface area.

² Planning Application PA150020 approved the demolition and redevelopment of the existing General Store and the construction of a new 17,008 sf Coto de Caza General Store and Mercantile. Uses will include office space, retail and service commercial, and eating establishments.

The northeastern portion of the Project site bordering Via Pajaro is within Zone AE of the 100-year floodplain³. According to the Federal Emergency Management Agency (FEMA), the portion of the Project site within Zone AE has a base flood elevation ranging from approximately 828 feet (ft) to 835 ft⁴ above mean sea level. This area is currently subject to flooding depths of approximately 2 ft to 5 ft in a 100-year storm event. The remainder of the Project site is outside Zone AE, as shown on Figure 4, *Flood Zone AE*.

The Project site is within the Cañada Gobernadora watershed of southern Orange County, which is a tributary to San Juan Creek. Site drainage generally flows south to Via Pajaro. Currently, on-site drainage sheet flows from impervious and pervious surfaces to the south and is collected by a series of storm drainpipes that outlet into the Cañada Gobernadora watershed, a small natural creek separated from the Project site by Via Pajaro. The Cañada Gobernadora watershed drains south, flowing into the San Juan Creek and eventually discharges to the Pacific Ocean. An existing detention basin, which currently collects stormwater runoff, is located within the floodplain in the northeastern limits of the Project site overlying both the Project site and the neighboring equestrian site to the north. The existing detention basin is not an engineered facility and was not designed to retain a specific volume of stormwater runoff but serve to reduce runoff velocity leaving the site.

PROJECT CONTEXT

Coto de Caza was originally approved as a planned community district prior to the land use entitlement as proposed by the Specific Plan that was adopted in 1982. The Specific Plan originally provided for a resort-residential community with particular emphasis on open space, including the preservation of two ridgelines that are important for both wildlife movement corridors and their aesthetic value.

Final Environmental Impact Report (EIR) 401 certified by the Orange County Board of Supervisors on September 21, 1982, analyzed the existing conditions within the proposed Specific Plan and its projected environmental impacts at full buildout of the Project. Full buildout provided for the construction of 6,419 residential units, 591 acres of open space, 482 acres of recreation, 19 acres of public facilities, and approximately 215,000 sf of commercial spaces. EIR 401 identified three areas where community centers will occur when the Project is implemented—North Ranch Community Center, South Ranch Community Center, and the Wagon Wheel Community Center. Each Community Center is different in nature and is an activity/amenity “hub” for its surrounding neighborhood. Each plays an integral role in providing recreation, convenience and community uses, and adds to the character of development within Coto de Caza. The location of the Project site was identified in EIR 401 as part of the proposed North Ranch Community Center, approximately the same boundary as Planning Area 21. Section 2.3.3 “Project Specific Plan Development Concept Plan” of EIR 401 described the proposed use on the North Ranch Community Center as:

“The North Ranch Community Center will be situated at the northern end of the North Ranch Golf Course and will provide convenience and specialty commercial uses (including the existing General Store), recreation (including the existing

³ Zone AE of the 100-year floodplain refers to areas with a 1 percent chance of flooding in any given year, for which base flood elevations have been determined.

⁴ FEMA Flood Map Service Center. Map No. 0605C0452J, effective 12/3/2009. Website: <https://msc.fema.gov/portal/search?AddressQuery=23359%20via%20pajaro#searchresultsanchor> (accessed September 18, 2019).

equestrian center), community meeting facilities (most probably a conversion of the existing conference center), and a portion of the onsite employee housing. A portion of the center is designated as a candidate elementary school site. Another area of the center will prove a portion of the onsite employee housing. Approximately 65,000 square feet of commercial floor space is planned for this center”.

With the exception of the existing equestrian center, the uses identified above have ceased operations or never materialized in the intervening nearly 40 years since EIR 401 was certified.

Following certification of EIR 401, four addenda and one Supplemental Environmental Impact Report (SEIR) (SEIR No. 608) to EIR 401 were prepared to assess the potential environmental impacts of the Specific Plan and subsequent specific plan amendments. The subsequent approved Addenda and SEIR to EIR 401 include the following projects:

- Addendum No. 1 certified by the Board of Supervisors on March 16, 1986, was prepared to assess the environmental impacts of Specific Plan Amendment No. 2, which amended residential development and grading standards, maps, various technical amendments, and flexibility in density and acreage calculating within Planning Areas.
- Addendum No. 2 approved by the Planning Commission on June 13, 1989, was prepared to assess the environmental impacts of the Coto de Caza Community-Wide Area Plan (CWAP) (AP 88-12), which included Implementation Plans for Resource Management, Riding and Hiking Trails, and Parks and Recreation Facilities to address the development within the South Ranch area.
- Addendum No. 3, certified by the Board of Supervisors on August 8, 1995, addressed the changes proposed in Specific Plan Amendment No. 3. Specific Plan Amendment No. 3, developed in response to noted ambiguities and inconsistencies within and between the Specific Plan and the CWAP. These changes also consolidated and rezoned Planning Areas within the Specific Plan and established the South Ranch Area Plan (SRAP) which replaced the CWAP.
- Final SEIR No. 608 certified by the Board of Supervisors on December 13, 2011, addressed the Area Plan Permit to implement the development proposed in PA 10 and the amendment to an existing Grant of Easement for Parcel Map 89-107, which changed the development intensity from recreational use to rural residential and increased the acreage commitment to habitat preservation in PA 10. This development necessitated Specific Plan Amendment No. 4, which modified Exhibits 3, 6, and 7 in connection with the implementation of the proposed development in PA 10.
- Addendum (IS PA150020) No. 4 approved in October 2015, was prepared to address a Site Development Permit for the redevelopment of a new 17,008 sf Coto de Caza General Store and Mercantile anticipated to begin construction in Fall 2022 or soon thereafter, on an approximately 1.5-acre site in PA 21.

Inclusive of the aforementioned Specific Plan amendments, the Specific Plan (Section 10: Statistical Summary) allows a maximum of 6,268 residential dwelling units, a maximum of 225,000 sf of commercial, and a minimum of 2,290 acres of open space. Development to date has resulted in the construction of 5,030 residential units or approximately 80 percent of the allowable number of units and 2,345 acres of open space. Refer to Table B, *Statistical Comparison 2021 Draft Update* for a statistical comparison of land uses.

Coto de Caza is divided into 24 planning areas. The Project site falls in the geographic boundaries of PA 21, which is 36 acres in size and designated as Community Center/Commercial. Found within PA 21 is the Coto Equestrian Preserve, a private riding ring (Hebner property), the former Merryhill School site, the Four Pines Pastures (formerly Maxwell Stables), and the site of the former Coto de Caza General Store now known as the Coto de Caza General Store and Mercantile anticipated to begin construction in Fall 2022 or soon thereafter. Although PA 21 is designated Community Center/Commercial, 35 of the 36 acres, including the Project site, are currently occupied by open space uses. Section II(F) of the Specific Plan stipulates that minor adjustments to the boundaries of planning areas, their gross acreage, and number of dwelling units and/or acreage of uses can be made as future planning occurs in the Specific Plan Planning Area if adjustments are consistent with the purposes and intent of the Specific Plan.

PROJECT HISTORY

As illustrated on Figure 5, *Existing Project Site*, the former Merryhill School site occupied 2.9 acres of the 5.1-acre Project site. The remaining 2.2 acres of the site made up a portion of the former Coto de Caza Equestrian Center. The 2.9-acre southern and western portion of the Project site was first developed as a one-story multi-structure conference center facility (Coto Conference Center) between 1968 and 1970. The Coto Conference Center eventually closed in the 1980s, and various uses, including a church, occupied the site for approximately the next decade. In 1994, the Oak Ridge Private School took over the former Coto Conference Center. The property was purchased by Nobel Learning Communities in 1997 from Silver-Bronze Corporation and was subsequently developed with the Merryhill School, a private, combined elementary school, which served kindergarten through sixth-grade students, until its eventual closure in June 2008 due to lack of enrollment. The school was approved for a maximum enrollment of 200 students. The property was subsequently sold by Nobel Learning Communities to Oak Grove LLC in October 2013. In 2015, the Merryhill School buildings were partially destroyed by fire, after which the buildings were abandoned and boarded up. In May 2022, the remaining buildings associated with the Merryhill School were demolished by the Applicant, pursuant to several demolition permits issued by the County.⁵

The equestrian center, adjacent to the Project site, which predates the adoption of the Specific Plan, has historically operated as a horse boarding and training facility and as an evacuation center for horses during wildfires and other disasters. In 1984, the equestrian center hosted portions of the 1984 Olympic Games Pentathlon, for equestrian show jumping, pistol shooting, cross country running, and fencing (one-touch épée), in which the United States won Silver and Bronze medals.

The Silver-Bronze Corporation became the owner of the equestrian center in 1989. According to the *Cultural Resources Memorandum of Findings* (LSA, March 2016) and the *Cultural Resources Survey and Memorandum of Findings* (LSA, September 2019 and revised October 2022) (both of which are included in Appendix C) prepared for the Project, equestrian-related structures, training rings, and a pole-barn (lower barn), had been constructed in the northern portion of the Project site adjacent to the Merryhill School. By 1980, other structures, including additional stables and a covered bullpen, had been built just north of what is now the Project site.

⁵ Demolition permit numbers DM170-110, DM170-117 through 120.

In 2016, the lower barn was demolished. Only one barn structure currently remains on the northeastern portion of the Project site. In January 2017, lot line adjustment (LLA 2015-018) combined the 2.9-acre Merryhill School site and the 2.2-acre portion of the equestrian center into one legal 5.1-acre parcel (Parcel 3 of LLA 2015-018), which is referred to as the Project site throughout this IS/MND. The remaining 28.33-acres were subdivided into three legal parcels with Parcel 1 of LLA 2015-018 to remain as the Equestrian Preserve.

Since 2016, the 24.1-acre equestrian center has been referred to as the Coto Equestrian Preserve. In recognition of the historical and cultural value that the Coto Equestrian Preserve represents to the community, and in order to prevent the Coto Equestrian Preserve from ever being converted to a different use, Silver Bronze Corporation voluntarily extended a recorded perpetual Equestrian Use Preservation Easement offer to the County of Orange and the California State Horsemen's Association (CSHA) for the 24.1-acre site. This is not an easement the County or the CSHA accepted or were a party to. The CSHA, a California-based non-profit organization, was founded in 1942 for the purpose of fostering equestrian interest and horsemanship, including preserving equestrian riding and hiking trails throughout the State of California.

PROPOSED PROJECT

The proposed Project is for the future development of 13 single-family detached dwelling units on a 5.1-acre site. No equestrian-related uses are proposed as part of the Project. As illustrated on Figure 6, *Plot Plan and Building Limits*, and Figure 7, *Conceptual Site Plan*, the Project includes 13 numbered lots with private street access (Lot A) via Vista del Verde. The initial Project entry includes a 72 ft wide right-of-way comprised of a 48 ft wide single point private internal roadway with a 12 ft wide center island and 12 ft wide landscaped parkways on both sides. The private internal roadway ingress/egress including the center island and parkways would extend 14 ft beyond the Project's western property line intersecting the existing, adjacent equestrian trail with the objective of incorporating the existing off-site oak tree located within the equestrian trail easement into the Project entry design. Within the interior of the Project site, the proposed right-of-way tapers from 72 ft to 52 ft in width encompassing a 36 ft wide private internal roadway with on-street parking and 8 ft wide landscape parkways on both sides. The private internal roadway would bisect the Project site from east to west and terminate in a cul-de-sac near the northeastern corner of the site. The proposed residential lots range from approximately 11,986 to 20,411 sf with the average lot size at approximately 13,717 sf in size. No architectural plans have been submitted.

Building pads for each lot would be created as part of the rough Grading Permit process that precedes recordation of the Tract Map. For planning purposes, it is assumed that the average residential pad would include approximately 8,230 sf (or 60 percent) of impervious development (residence, driveways, and hardscape).⁶ Consequently, the average residential pad would include approximately 5,487 sf (or 40 percent) of pervious surface area. The Project site would be comprised of approximately 3.1 acres of impervious surface area and 2.0 acres of pervious surface area. Compared to the existing conditions, the proposed Project would result in an increase of impervious surface area (from 20 percent to 60 percent).

⁶ Impervious surface area estimates per the CWQMP, dated March 2022.

Lighting. Private residential lighting would include low-voltage light fixtures typically used for single-family residential landscaping and security. This lighting would be designed consistent with the County's lighting standards and the specifications in Section 4.7.h *Lights* of the Specific Plan that states that "all lights shall be designed and located so that direct light rays shall be confined to the premises" and would avoid the creation of intrusive lighting and glare within the immediate Project area. Street lighting is not proposed but may be added when the site is developed.

Signage. No off-site monument signage is proposed. Signs within the Project site would comply with Section 8: *Sign Regulations* of the Specific Plan and County Zoning Code Section 7-9-114.

Parking. On-street parking is proposed along both sides of the proposed private street (Lot A). Off-street parking for each residence would be provided in compliance with Section 9: *Off-Street Parking Regulations* of the Specific Plan and in compliance with County Zoning Code Section 7-9-70.3: *Off-street Parking Requirements for Residential Uses*.

Landscaping. Landscaping for the Project would include groundcover, shrubs, and/or trees within the street center island, street parkways, and open space areas (Lot B through Lot E). The off-site underground infiltration reservoir northeast of the Project site, which would function as a soil and plant-based filtration for stormwater runoff, would consist of grasses and various plant materials. All landscaping within all residential lots would be privately installed and maintained as specified by the Orange County Fire Authority (OCFA) Conceptual Fuel Modification Plan and Fire Master Plan, and the Homeowners Association (HOA).

Architectural Theme Characteristics. Although no architectural plans have been submitted, the development of single-family detached homes would be designed in conformance with the existing rural architectural styles of the surrounding residential dwelling units in the area and the six architectural guidelines outlined in Section II.G. *Residential Uses* of the Specific Plan.

Architectural guidelines for residential uses are as follows:

- Dwellings are encouraged to be located (depending upon density) in clustered, and/or neighborhood units, defined by natural and man-made physical features such as landform, vegetation, roadways, and other infrastructure which accompany development.
- Rural architectural themes using natural appearing building materials and tones should be utilized whenever feasible. Monotonous architectural elements should be discouraged.
- Homes should emphasize and be designed to complement topographic conditions; exposure of unsightly under-stories should be discouraged.
- Architectural design should encourage energy efficient consciousness, taking advantage of natural heating and/or cooling, wind power and solar energy opportunities.
- Residential neighborhoods should blend and be integrated with open space and community facilities.
- Residential projects which are proposed to have more than one (1) dwelling unit with a garage face five (5) ft or less from the property line should be designed to minimize what would otherwise be considered an over-linear street scene.

Perimeter Walls/Fencing/Barriers. Perimeter walls and fencing varying in height from 6 to 12 ft above grade elevation (with a maximum retaining height of 7 ft) would be installed on the Project site boundary to screen the Project from the Coto Equestrian Preserve and other adjacent uses. The proposed perimeter wall would primarily be comprised of masonry with river stone facing. Due to grade differences along the westerly boundary property line of Lot 1 and Lot 2, a 4 ft high wrought iron fence would be installed above the wall resulting in an overall height of 6 to 12 ft. In the northeastern portion of the site along the easterly boundary of Lot 9, a combination wall with wildfire barrier would be installed. As illustrated in Figure 8, *Proposed Wall Plan*, the perimeter wall along Vista del Verde would range from 6 ft to 9 ft in height and 12 ft in height along Via Pajaro.

Dry Utilities. The Project would require the extension of electrical service, natural gas, and telecommunications. All utilities on the Project site and any utilities off site serving the Project (such as connections to existing facilities underlying the Vista del Verde right-of-way) would be undergrounded. On-site utilities, including electrical services, will be installed in coordination with Southern California Edison, natural gas services in coordination with San Diego Gas & Electric, and telecommunication services in coordination with AT&T, Cox Cable. These utilities would be installed within an on-site easement underlying the private internal roadway (Lot A) and connected to the existing facilities underlying the Vista del Verde right-of-way. No electrical, natural gas, or telecommunication improvements would be provided for any other adjacent properties.

Energy. The proposed Project will fully comply with all applicable provisions of the “California Energy Code” (CEC), “California Green Building Code,” (CalGreen), and other applicable codes and ordinances relating to the Project’s design, construction, and operation.

Domestic Water Supply and Wastewater Collection. The Santa Margarita Water District would provide domestic water and wastewater services to the Project site. The Project proposes to install a new 8-inch domestic water line underlying the private internal roadway to connect to the existing off-site 8-inch water line that underlies the Vista del Verde right-of-way. The existing 6-inch water line and easement that traverses through the southwestern portion of the Project site and the southwestern portion within the adjacent Coto Equestrian Preserve site will be removed and abandoned.

The Project proposes to install a new 8-inch off-site sewer line northeast of the Project site. This line would reroute the existing off-site wastewater flows and direct the new wastewater flows southeast before turning 45 degrees southwest through the Project site, ultimately connecting to a new 8-inch off-site sewer line proposed within the Vista del Verde right-of-way. The existing sewer line and easement that currently traverses through the northwestern and southwestern portions of the Project site and the southwestern portion of the adjacent Coto Equestrian Preserve site will be removed and abandoned. The new sewer line would connect to the existing sewer line that underlies Vista del Verde approximately 150 feet northwest of the Project site and traverse southeast along Vista del Verde approximately 755 feet. Construction of the sewer improvements would require a partial lane closure of the northbound lane on Vista del Verde for a total of approximately 45 days with the southbound lane remaining open during partial lane closure. It is assumed that this would occur during a single period of construction and would take place on weekdays. If feasible, the construction contractor may be able to maintain traffic flow in both directions by implementing a temporary rerouting of lanes in conformance with the California Department of Transportation (Caltrans) *California Manual on Uniform Traffic Control Devices* (CA MUTCD). A shared water/sewer/private street and utility easement is included within the private internal roadway. No new sewer or water

improvements are provided for any other adjacent properties. The location of proposed water and sewer easements are depicted in Figure 9, *Proposed Water and Sewer Easements*.

Stormwater Conveyance. Stormwater would be collected on the Project site and conveyed off site to a proposed underground infiltration reservoir, and then discharged into the existing below-grade stormwater trunk line that underlies the Via Pajaro right-of-way (refer to Figure 10, *Drainage Plan*).

Underground Infiltration Reservoir. An underground infiltration reservoir would be constructed off site on the Coto Equestrian Preserve property, adjacent to the northeastern Project site boundary.⁷

On-Site Stormwater Conveyance. On-site runoff would be directed to the private internal roadway and subsequently conveyed via curb and gutter to a proposed on-site concrete open swale located between Lots 8 and 9 (refer to Figure 10, *Drainage Plan*). The proposed on-site concrete open swale would channel the stormwater flows into a proposed off-site underground infiltration reservoir sized to reduce increases in runoff from the proposed Project. Ultimately, storm water from the underground infiltration reservoir would discharge into the Cañada Gobernadora watershed through a proposed off-site connection to an existing stormwater outfall currently underlying the Via Pajaro right-of-way. The underground infiltration reservoir would meet the South Orange County hydromodification requirements, would be approximately 600 to 1,000 sf in size, and would be designed to capture the 85th percentile of runoff associated with a 24-hour storm event.⁸ The on-site concrete open swale and off-site underground infiltration reservoir would be maintained by the future HOA.

Off-Site Stormwater Conveyance. Off-site drainage infrastructure would be necessary to convey stormwater runoff from the adjacent Coto Equestrian Preserve site separate and independent from existing surrounding properties and the Project site. Runoff north and northeast of the Project site (that originally drained southeast across the Project site) would be conveyed off site via a proposed 5 ft wide concrete-lined drainage channel into a proposed concrete open swale located northeast of the Project's underground infiltration reservoir (refer to Figure 10, *Drainage Plan*). The collected off-site runoff from the concrete open swale would flow through a proposed culvert into an existing below grade stormwater trunk line within the Via Pajaro right-of-way before being discharged into the Cañada Gobernadora watershed east of the Project site. Runoff west of the Project site would be conveyed to Vista del Verde via a proposed 3 ft wide open concrete drain, which borders the western portion of the Project site. Runoff that is conveyed to Vista del Verde eventually drains into existing catch basins (similar to existing conditions), prior to discharging into the Cañada Gobernadora watershed near the Project's easterly property boundary. The off-site concrete-lined drainage channels on the northern and western sides of the Project site would be maintained by the future HOA. The existing drain located on the eastern portion of the Project site would be abandoned (refer to Figure 10, *Drainage Plan*).

Roadway Access. Access to the Project site would be provided by a new single 48 ft wide ingress/egress point off Vista del Verde that tapers to 36 ft in width, approximately 81 ft from the point of entry. This access provides for residents, visitors, services, and emergencies. Construction of the

⁷ The proposed underground infiltration reservoir would replace the existing retention basin that overlies the property lines of the Project site and Coto Equestrian Preserve, and currently collects stormwater from both properties. The existing basin is not an engineered facility and was not designed to retain a specific amount of stormwater.

⁸ Underground infiltration reservoir details as described in the CWQMP, dated March 2022.

sewer improvements, as described above, would require a 45-day partial lane closure of the northbound lane on Vista del Verde with the southbound lane remaining open during partial lane closure. This partial lane closure would have the potential to temporarily limit the use of the equestrian trail as it crosses the access point to the Project site. However, one lane on Vista del Verde would remain open throughout Project construction, including during the 45-day partial closure of Vista del Verde for use by emergency vehicles and other modes of transportation. The new ingress/egress access point off of Vista del Verde would be constructed during the temporary partial lane closure on the northbound lane on Vista del Verde. If feasible, the construction contractor may be able to maintain traffic flow in both directions by implementing a temporary rerouting of lanes in conformance with the Caltrans CA MUTCD.

The proposed private street would consist of asphalt paving and encompass a 12 ft wide center island composed of decomposed granite. The portion of private internal roadway that extends beyond the Project’s western property line transecting the existing 14 ft wide equestrian trail would feature flush curb heights to facilitate equestrian use and crossing (refer to Figure 7, *Conceptual Site Plan*). Entry gates are not proposed as part of the Project.

Due to the location of the existing off-site 60-inch diameter oak tree and the intent to incorporate it into the Project’s entry design, the Project Applicant has applied for a deviation from Standard Plan 1117 – Intersection Sight Distance to exceed the 10 ft line of site requirement and allow exiting vehicles to move an additional 4 ft beyond the curb so that the driver may see around the oak tree a greater distance than the required minimum sight distance of 390 ft. The Project Applicant has also applied for a deviation from Standard Plan 1107 – Other Site Improvements eliminating the requirement for sidewalks on both sides of the street. In place of sidewalks, 8 ft wide landscaped parkways are proposed.

Grading. As shown in Figure 11, *Conceptual Grading Plan*, the estimated cut (8,550 cubic yards [cy]) and fill (8,550 cy) of soils would be balanced and no import or export of soils is required (i.e., all of the soil removed/graded/cut will be used as part of the on-site and off-site improvements). In addition to the southern portion of the Project site, the greatest amount of fill is required within Lot 9, where a portion of the site is below Zone AE at an elevation of approximately 828 ft. Up to 7 ft of fill is required to raise the site to an elevation of approximately 835 ft. Cut up to 7 ft will be required on a portion of Lot A and within the AE Flood Zone north of Lot 9. In addition, grading would occur off site within the trail easement to create a 2:1 downward slope in a southeast direction, subject to Coto de Caza Master Association approval. As shown in Table A, *Construction Schedule*, the site would be graded in one continuous phase.

Table A: Construction Schedule

Phase Name	Phase Start Date	Phase End Date	Number of Days
Site Preparation*	6/1/2023	6/14/2023	10
Grading	6/15/2023	7/12/2023	20
Domestic Water Line	6/15/2023	7/12/2023	10
Sewer Line	6/15/2023	7/12/2023	10
Building Construction	7/13/2023	5/30/2024	230
Paving	5/31/2024	6/27/2024	20
Architectural Coating	6/28/2024	7/25/2024	20

Source: Compiled by LSA (May 2021).

* The maintenance building/hay barn and round pens will be demolished prior to any site preparation activities.

Construction Phasing. Based on standard construction techniques and schedule for this size of development, it is assumed that all 13 residences would be constructed in a single phase over 13 months as shown in Table A, *Construction Schedule*. The Project would require site preparation, grading, building construction, paving, and architectural coating activities during construction. Construction would be staged on-site.

On-site and off-site impacts resulting from Project implementation are discussed in detail below within each respective environmental topic area in the Environmental Checklist Form Supporting Data section.

As described above, an HOA would be formed to maintain all common on-site improvements including landscaping, streets, walls, and utility systems and easements, as well as needed off-site improvements including off-site concrete lined drainage channels, water quality basin, and the internal roadway ingress/egress inclusive of the center island, parkways, associated landscaping, and any applicable vehicular/pedestrian/equestrian control signs that extends beyond the Project site's western property line and overlies the public right-of-way. The HOA would not be responsible for maintaining any public off-site improvements, such as off-site landscaping, signage, lighting, utilities, or fencing.

Discretionary Actions

As the lead agency, the County has the principal authority and jurisdiction over all land use entitlements within the unincorporated areas of the County. Due to its unincorporated status, all discretionary permits for the proposed development must be consistent with the County of Orange General Plan, County of Orange Codified Ordinances, and the Specific Plan, which provides regulatory guidance for the development of the community. The Project would require the following discretionary actions by the County:

- **Adoption of Initial Study/Mitigated Negative Declaration:** In accordance with the California Environmental Quality Act (CEQA) and the implementing *CEQA Guidelines*, and the 2020 Orange County Local CEQA Procedures Manual, this Initial Study/Mitigated Negative Declaration (IS/MND) has been prepared for the proposed Oak Grove Residential Project (Project). Consistent with *CEQA Guidelines* Section 15071, this IS/MND includes a description of the Project, an evaluation of the potential environmental impacts, and findings from the environmental analysis.

This IS/MND evaluates the potential environmental impacts that may result from development of the Project. Consistent with *CEQA Guidelines* Section 15050, the County of Orange (County) is the Lead Agency under CEQA and is responsible for adoption of the IS/MND and approval of the Project.

The Draft IS/MND examines the potential impacts generated by the Project in relation to the following Environmental Analysis Checklist Form categories: Aesthetics, Agricultural and Forestry Resources, Air Quality, Biological Resources, Cultural Resources, Energy, Geology and Soils, Greenhouse Gas Emissions, Hazards and Hazardous Materials, Hydrology and Water Quality, Land Use and Planning, Mineral Resources, Noise, Population and Housing, Public Services, Recreation, Transportation, Tribal Cultural Resources, Utilities and Service Systems, Wildfires, and Mandatory Findings of Significance. As discussed in more detail in this IS/MND, all potentially significant impacts can be mitigated to a less than significant level.

- Specific Plan Amendment:** The Project site is located within PA 21 which is designated for Community Center/Commercial Uses. The Project requires a Specific Plan Amendment (SPA) to the Coto de Caza Specific Plan to establish a low-density residential use, in accordance with California Government Code Section 65450, et seq. The SPA would result in the creation of a new PA (PA 5.1) to encompass the 5.1-acre Project site currently located within PA 21. PA 5.1 would be designated as Low-Density Residential. The SPA would also include amendments to several exhibits in the Specific Plan, including Exhibit 3 – Major Open Space Areas, Exhibit 4 – Land Use Plan, Exhibit 6 – Master Grading Concept, and Exhibit 7 – Development Map to refine the boundaries of PA 21 to accommodate PA 5.1. In addition, Exhibit 8 – Statistical Table would be amended to adjust the acreage allocation from PA 21 and unit allocation from PA 2 (refer to Table B, *Statistical Comparison 2021 Draft Update*). Changes to the reported open space acreage do not affect any area subject to open space restrictions by the “Major Open Space Areas” of the Specific Plan. The proposed boundary revision to PA 21 is depicted in Figure 12, *Coto de Caza: PA 21 Boundary Revision*.

Table B: Statistical Comparison –2021 Draft Update

Planning Area	Land Use	Allocated Units	TT Approved	Available Units	Acreage	OS Acreage	Pending TTM 17866 Approval
PA 1	RR	75	75	0	354	115	
PA 2	M	53	39	14	44	13	-13 units
PA 3	M	400	400	0	233	68	
PA 4	M	644	644	0	319	147	
PA 5	L	118	43	75	129	102	
PA 5.1	L	0	0	0	0	0	+13 units +5.1 ac
PA 6	L	383	383	0	317	158	
PA 7	RR	162	159	3	535	217	
PA 8 (a)	M	350	231	119	116	44	
PA 9	M	104	104	0	16	2	
PA 10	RR	197	192	5	684	378	
PA 11	M	920	776	144	382	190	
PA 12	L	168	153	15	236	97	
PA 13	M	265	144	121	125	38	
PA 14	M	340	178	162	130	30	
PA 15 (a)	H	978	744	234	177	49	
PA 16	M	100	100	0	64	22	
PA 17	M	955	606	349	311	95	
PA 18	ROS				475	475	
PA 19	CC/C				19	17	
PA 20	CC/C	56	56	0	25	2	
PA 21	CC/C				36	35	-5.1 ac
PA 22	CC/C	(a)			16	6	
PA 23	CC/C				4	0	
PA 24 (d)	CC/C				17	17	
TOTAL		6,268	5,027	1,241	4,764 (b)	2,317*(c)	

Table B: Statistical Comparison –2021 Draft Update

Planning Area	Land Use	Allocated Units	TT Approved	Available Units	Acreage	OS Acreage	Pending TTM 17866 Approval
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Source: Orange County Public Works / Development Services/Planning

Note: PA acreages have not been verified.

- (a) Potential affordable housing sites. If built, an equivalent number of units will be deducted from other planning areas. The total of 6,268 may not be exceeded without prior approval of an amendment to this Plan.
- (b) Does not include roads.
- (c) Includes Resource Preservation Areas, Scenic Areas, Regional Park, Golf Courses and the Community Parks in Planning Areas 5 and 16.
- (d) Major use in this planning area is Coto de Caza Golf & Racquet Club.

* A minimum of 2,290 acres of active, passive, Scenic Preservation, Resource Preservation open space is required for the Coto de Caza community at buildout.

CC/C = Community Center / Commercial

M = Medium Density Residential

ROS = Regional Open Space

H = High Density Residential

OS = Open Space

RR = Rural Residential

L = Low-Density Residential

PA = Planning Area

TTM = Tentative Tract Map

- **Use Permit:** A Use Permit is required to allow perimeter walls and fencing over 6 ft in height.
- **Tentative Tract Map No. 17866 Approval:** Tentative Tract Map (TTM) No. 17866 is required to subdivide a 5.1-acre site within Coto de Caza into 13 numbered lots for the future development of 13 single-family detached dwelling units and 5 lettered lots for a private street (Lot A) and landscaped areas (Lot B, C, D, and E). TTM No. 17866 has been prepared pursuant to County requirements and the California Subdivision Map Act. TTM No. 17866 proposes two deviations, including a deviation from Standard Plan 1117 – Intersection Sight Distance to encroach 4 ft beyond the 10 ft line of sight setback, and a deviation from Standard Plan 1107 – Other Street Improvements, eliminating the requirement for sidewalks on both sides of the street. Formal approval of the deviations will accompany map approval at the Subdivision Committee.

The Project would also require non-discretionary permits/approvals, as listed in Table C, *Discretionary and Non-Discretionary Permits/Approvals*.

Table C: Discretionary and Non-Discretionary Permits/Approvals

Agency	Permit/Approval
Discretionary Permits/Approvals	
Orange County Subdivision Committee	Deviation from Standard Plan 1107 - Other Site Improvements eliminating the requirement for sidewalks on both sides of the street
	Deviation from Standard Plan 1117 - Intersection Sight Distance to exceed the 10 ft line of the site requirements and allow exiting vehicles to move an additional 4 ft beyond the curb
	Tentative Tract Map No. 17866 to allow the future development of 13 single-family residential units
Orange County Planning Commission	Recommendation to the Board of Supervisors on Specific Plan Amendment to establish a low-density residential use within a new Planning Area 5.1
	Recommendation to the Board of Supervisors on a Use Permit for walls/fencing/barriers over 6 ft in height
	Review of proposed Mitigated Negative Declaration (MND) and recommendation of adequacy to the Board of Supervisors
	Recommendation to the Board of Supervisors on the proposed Oak Grove Residential Project
Orange County Board of Supervisors	Adoption of proposed Mitigated Negative Declaration (MND)
	Approval of Specific Plan Amendment to establish a low-density residential use within a new Planning Area 5.1
	Approval of a Use Permit for walls/fencing/barriers over 6 ft in height

Table C: Discretionary and Non-Discretionary Permits/Approvals

Agency	Permit/Approval
	Approval of the proposed Oak Grove Residential Project
	Approval of Final Map No. 17866
Orange County Fire Authority	Conceptual Fuel Modification and Fire Master Plan
Orange County Flood Control District	Conditional Letter of Map Revision (CLOMR) Letter of Map Revision (LOMR)
Federal Emergency Management Agency (FEMA)	
Non-Discretionary Permits/Approvals	
State Water Resources Control Board (SWRCB)	Project Applicant must submit a Notice of Intent (NOI) to comply with the General Activity Construction National Pollutant Discharge Elimination System (NPDES) Permit
San Diego Regional Water Quality Control Board (RWQCB)	NPDES Permit and Temporary Construction Dewatering Permit
	Water Quality Management Plan pursuant to South County OC MS4 Permit Order No. R9-2013-0001/NPDES No. CAS019266 of the San Diego Regional Water Quality Control Board, Order No. R9-2015-0001

Source: OC Public Works, OC Development Services/Planning

DOCUMENTS INCORPORATED BY REFERENCE

The documents listed below are incorporated into this document by reference:

- County of Orange. Coto de Caza Specific Plan, 1995, and its three associated amendments (available at OC Public Works, OC Development Services website: https://www.ocpublicworks.com/ds/community_plans)
- County of Orange. General Plan (available at OC Public Works, OC Development Services website: <https://ocds.ocpublicworks.com/service-areas/oc-development-services/planning-development/codes-and-regulations/general-plan>)
- County of Orange. OC Development Services. Final Environmental Impact Report 401, Coto de Caza General Plan Amendment No. 82-2 and Specific Plan ZC 82-42, September 1982, and its four associated Addendum and one SEIR (No. 608)

REPORT PREPARER

The following consulting firm assisted the County in the preparation of this Initial Study:

LSA Associates, Inc.
 20 Executive Park, Suite 200
 Irvine, California 92614
 Attn: Ryan Bensley, Environmental Planner/Project Manager

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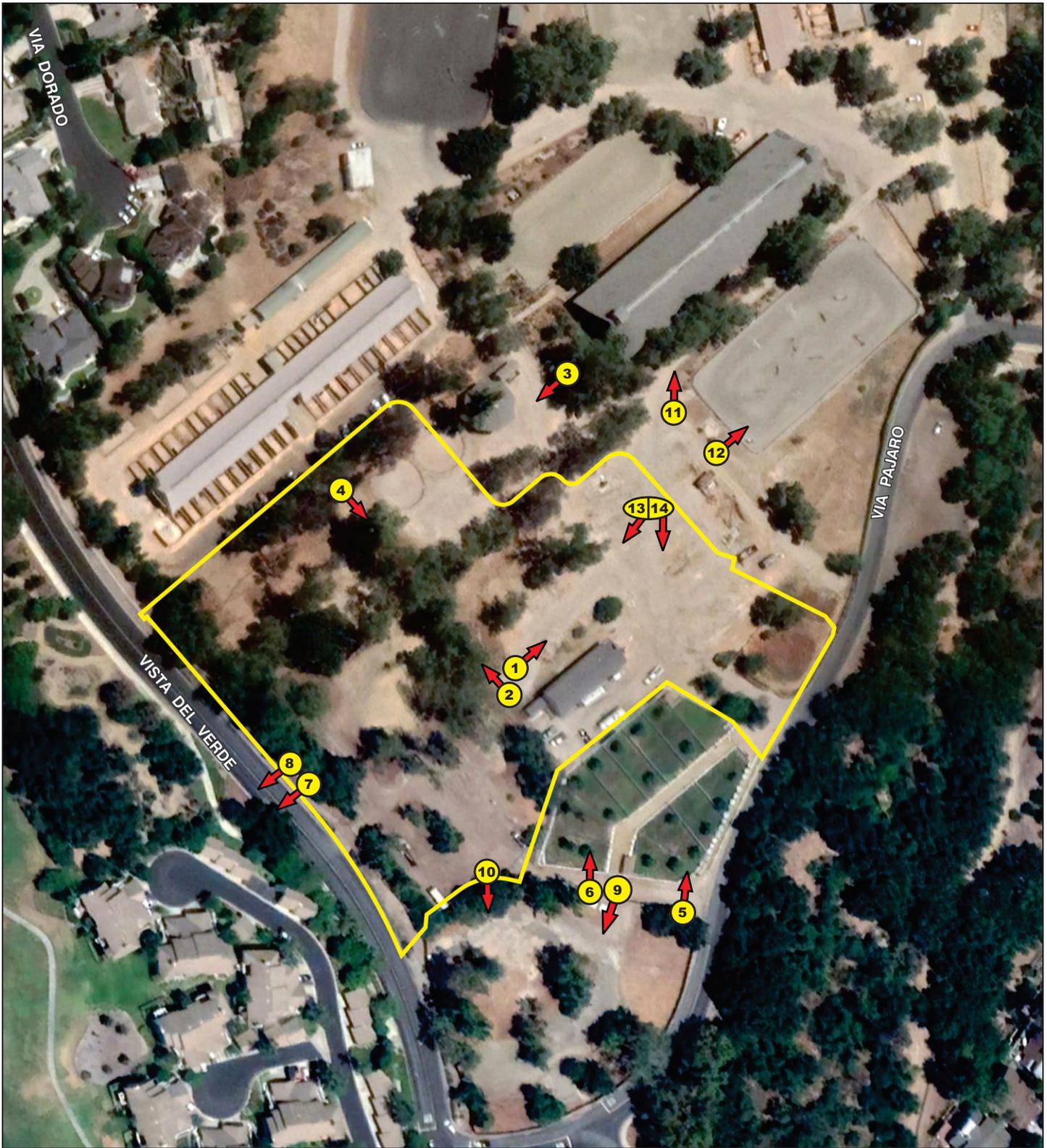
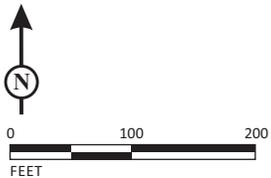


FIGURE 2

LSA

LEGEND

-  Project Site Boundary
-  Photo Location and Direction



SOURCE: Google Earth, 2022

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Oak Grove Residential
Photograph Key Map

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Photo 1 - Looking northeast at the interior of the site from the remaining hay barn.



Photo 2 - Looking northwest at the interior of the site from the remaining hay barn.



Photo 3 - Looking southwest toward the project site from the upper barn located on the Equestrian Preserve site.



Photo 4 - Looking southeast into the project site from the northern boundary with the remaining operative electrical structure that retains an existing Southern California Edison transformer and Capacitor to the west and the open round enclosure to the east.

LSA

FIGURE 3A

Oak Grove Residential
Existing Site Photographs

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Photo 5 - Looking northeast into the Four Pines Pastures area from the south.



Photo 6 - Looking northwest into the Four Pines Pastures area from the south.



Photo 7 - Looking southwest toward the Fairway Oaks residential development from the western project boundary.



Photo 8 - Looking southwest toward the Fairway Oaks residential development from the western project boundary.

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Photo 9 - Looking south at the General Store site from the southern project boundary.



Photo 10 - Looking southeast at the General Store site from the southern project boundary Coto Equestrian Preserve.



Photo 11 - Looking northeast at the Coto Equestrian Preserve from the northeast project boundary.



Photo 12 - Looking northeast at the Coto Equestrian Preserve from the eastern project boundary.

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Photo 13: Looking southwest into the project site from the eastern project boundary.



Photo 14: Looking southeast from the eastern project boundary.

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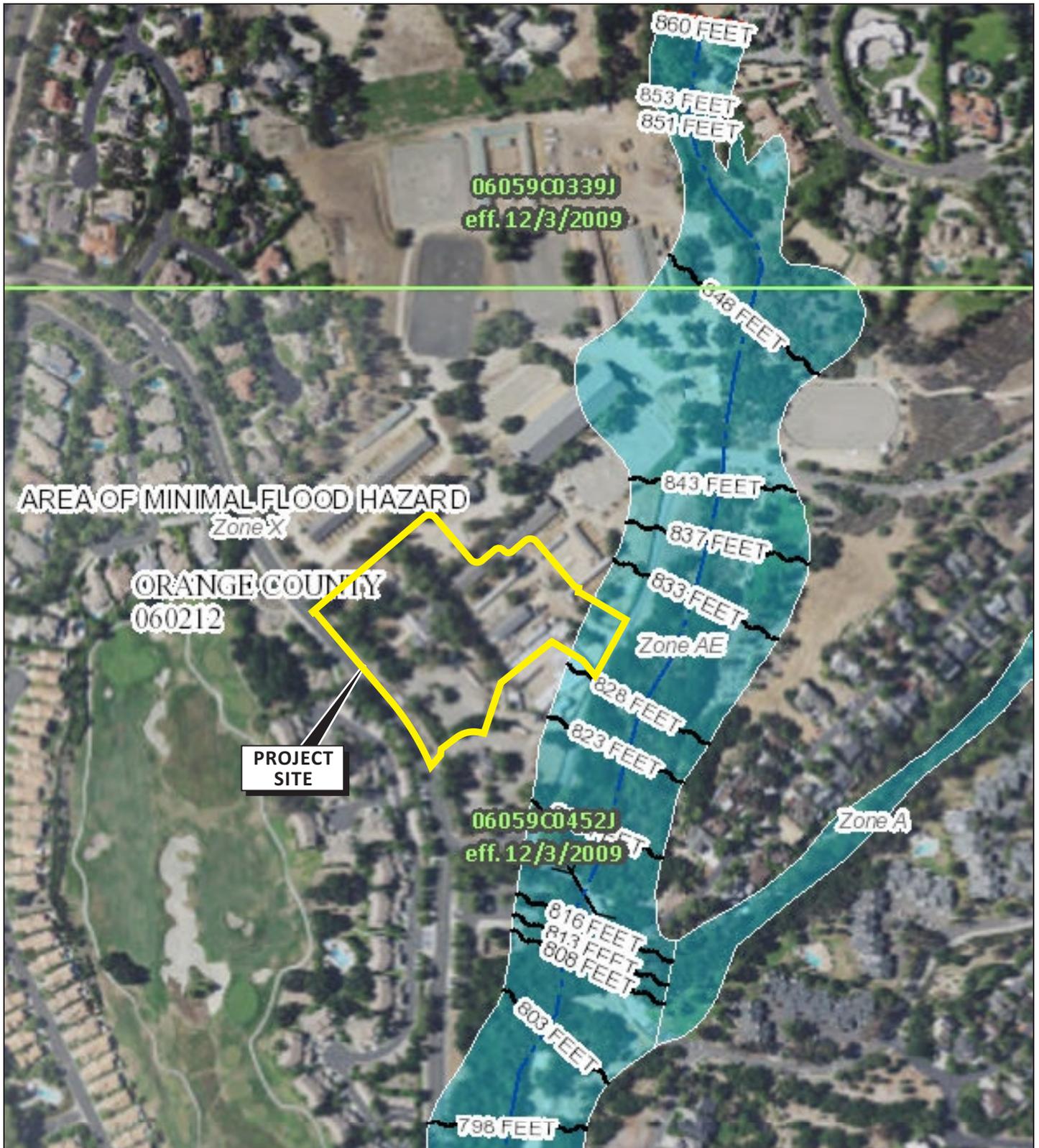
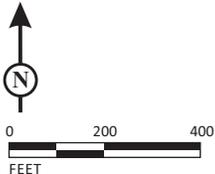


FIGURE 4

LSA

**Note: The aerial photo shown in this figure was taken prior to the demolition of the former Merryhill School Buildings. Refer to the aerial photo in Figure 5 for an accurate depiction of the current conditions on the Project site.



SOURCE: FEMA, USGS The National Map: Orthoimagery. Data refreshed April, 2019

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Oak Grove Residential
Flood Zone AE

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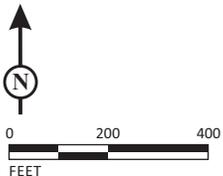


FIGURE 5

LSA

LEGEND

- Project Site Boundary
- Former Merryhill Private School Site
- Former Coto Equestrian Center Site



SOURCE: Google Earth, 2022

Oak Grove Residential
Existing Project Site

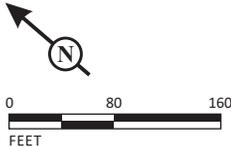
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FIGURE 7

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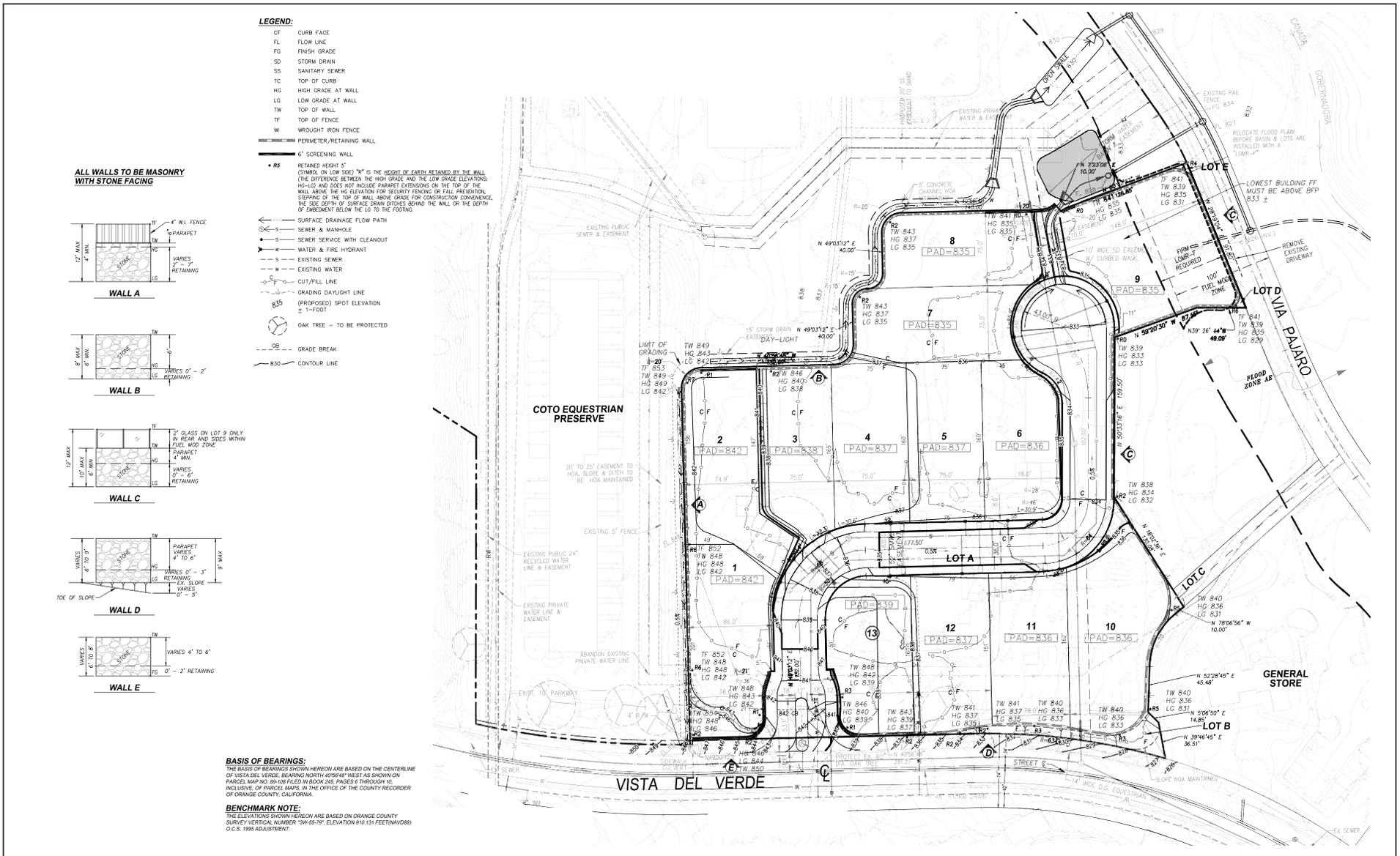


- Project Site Boundary
- AE Flood Zone Boundary
- Property Boundaries

*Oak Grove Residential
Conceptual Site Plan*

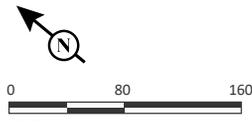
SOURCE: Land Strategies, LLC. (1/21/2019)
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FIGURE 8



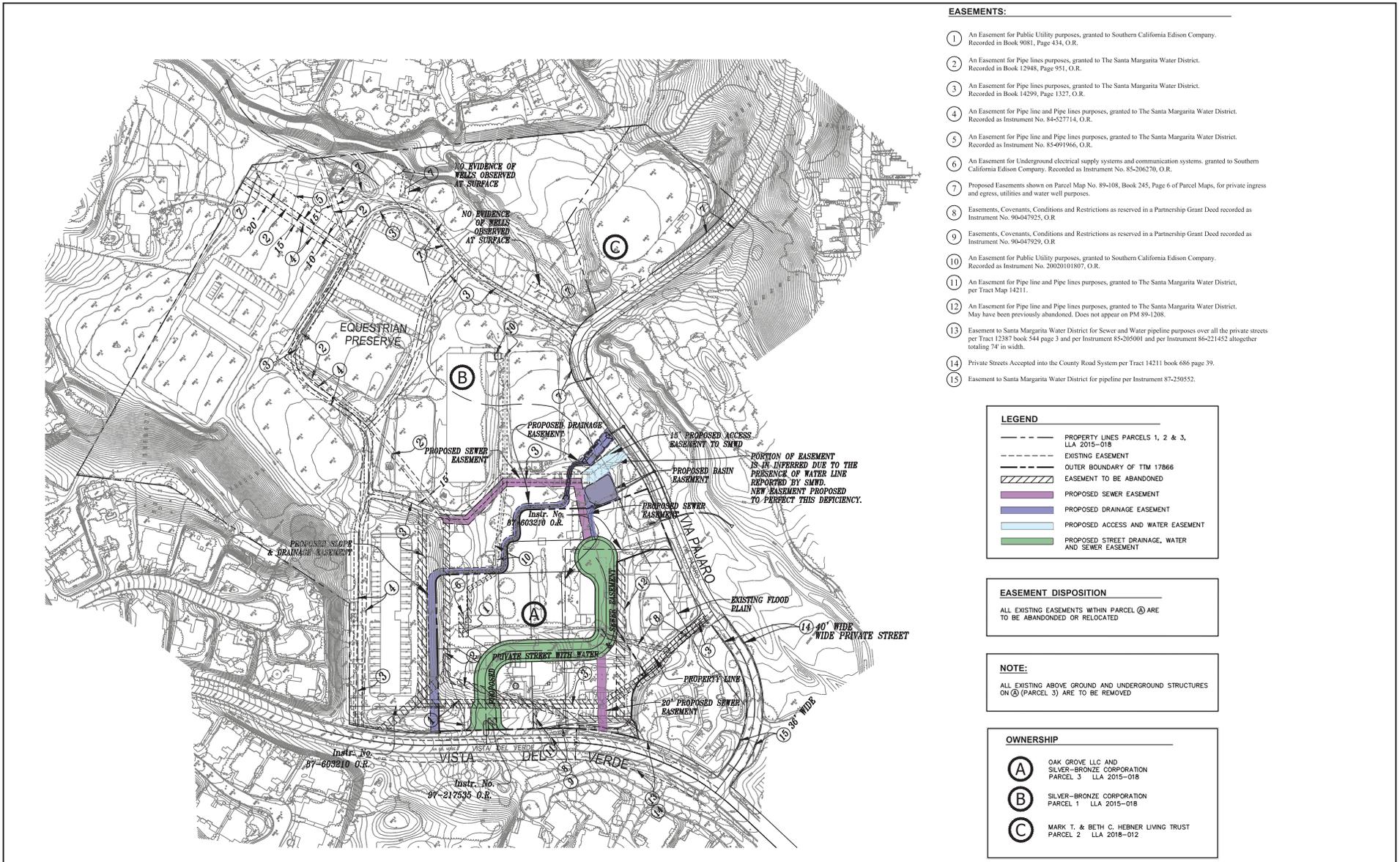
FEET

SOURCE: Land Strategies, LLC.

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Oak Grove Residential
Proposed Wall Plan

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- EASEMENTS:**
- ① An Easement for Public Utility purposes, granted to Southern California Edison Company. Recorded in Book 9081, Page 434, O.R.
 - ② An Easement for Pipe lines purposes, granted to The Santa Margarita Water District. Recorded in Book 12948, Page 951, O.R.
 - ③ An Easement for Pipe lines purposes, granted to The Santa Margarita Water District. Recorded in Book 14299, Page 1327, O.R.
 - ④ An Easement for Pipe line and Pipe lines purposes, granted to The Santa Margarita Water District. Recorded as Instrument No. 84-527714, O.R.
 - ⑤ An Easement for Pipe line and Pipe lines purposes, granted to The Santa Margarita Water District. Recorded as Instrument No. 85-491966, O.R.
 - ⑥ An Easement for Underground electrical supply systems and communication systems, granted to Southern California Edison Company. Recorded as Instrument No. 85-206270, O.R.
 - ⑦ Proposed Easements shown on Parcel Map No. 89-108, Book 245, Page 6 of Parcel Maps, for private ingress and egress, utilities and water well purposes.
 - ⑧ Easements, Covenants, Conditions and Restrictions as reserved in a Partnership Grant Deed recorded as Instrument No. 90-047925, O.R.
 - ⑨ Easements, Covenants, Conditions and Restrictions as reserved in a Partnership Grant Deed recorded as Instrument No. 90-047929, O.R.
 - ⑩ An Easement for Public Utility purposes, granted to Southern California Edison Company. Recorded as Instrument No. 20020101807, O.R.
 - ⑪ An Easement for Pipe line and Pipe lines purposes, granted to The Santa Margarita Water District, per Tract Map 14211.
 - ⑫ An Easement for Pipe line and Pipe lines purposes, granted to The Santa Margarita Water District. May have been previously abandoned. Does not appear on PM 89-1208.
 - ⑬ Easement to Santa Margarita Water District for Sewer and Water pipeline purposes over all the private streets per Tract 12387 book 544 page 3 and per Instrument 85-205001 and per Instrument 86-221452 altogether totaling 74' in width.
 - ⑭ Private Streets Accepted into the County Road System per Tract 14211 book 686 page 39.
 - ⑮ Easement to Santa Margarita Water District for pipeline per Instrument 87-250552.

LEGEND

	PROPERTY LINES PARCELS 1, 2 & 3, LLA 2015-018
	EXISTING EASEMENT
	OUTER BOUNDARY OF TTM 17866
	EASEMENT TO BE ABANDONED
	PROPOSED SEWER EASEMENT
	PROPOSED DRAINAGE EASEMENT
	PROPOSED ACCESS AND WATER EASEMENT
	PROPOSED STREET DRAINAGE, WATER AND SEWER EASEMENT

EASEMENT DISPOSITION

ALL EXISTING EASEMENTS WITHIN PARCEL ② ARE TO BE ABANDONED OR RELOCATED

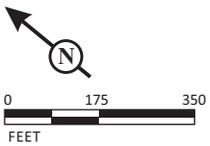
NOTE:

ALL EXISTING ABOVE GROUND AND UNDERGROUND STRUCTURES ON ② (PARCEL 3) ARE TO BE REMOVED

OWNERSHIP

Ⓐ	OAK GROVE LLC AND SILVER-BRONZE CORPORATION PARCEL 3 LLA 2015-018
Ⓑ	SILVER-BRONZE CORPORATION PARCEL 1 LLA 2015-018
Ⓒ	MARK T. & BETH C. HEBNER LIVING TRUST PARCEL 2 LLA 2018-012

LSA

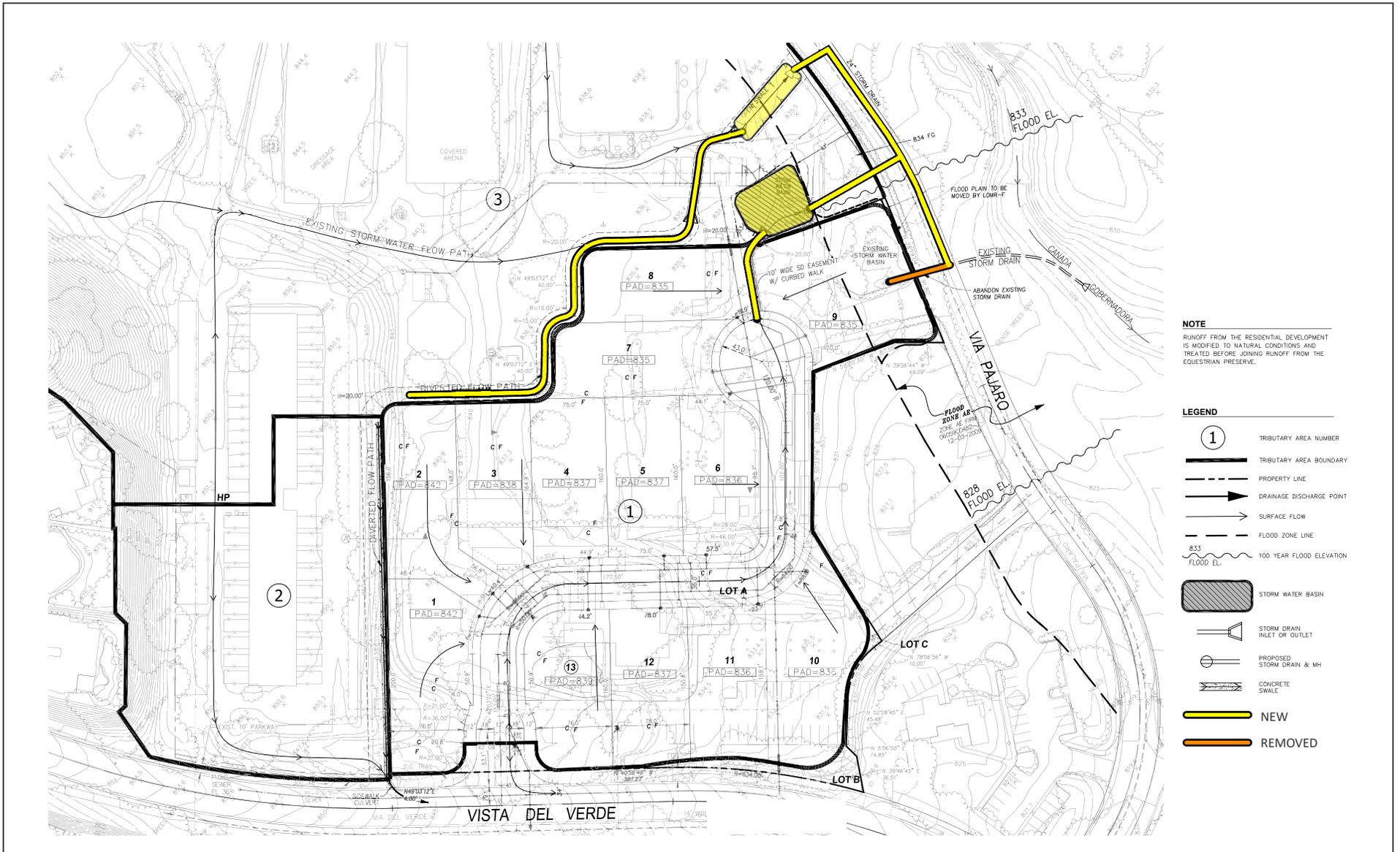


SOURCE: Land Strategies, LLC.

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FIGURE 9

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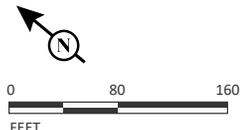


NOTE
 RUNOFF FROM THE RESIDENTIAL DEVELOPMENT IS MODIFIED TO NATURAL CONDITIONS AND TREATED BEFORE JOINING RUNOFF FROM THE EQUESTRIAN PRESERVE.

- LEGEND**
- ① TRIBUTARY AREA NUMBER
 - ▬ TRIBUTARY AREA BOUNDARY
 - - - PROPERTY LINE
 - ▶ DRAINAGE DISCHARGE POINT
 - SURFACE FLOW
 - - - FLOOD ZONE LINE
 - 833 FLOOD EL. 100 YEAR FLOOD ELEVATION
 - ▨ STORM WATER BASIN
 - ◡ STORM DRAIN INLET OR OUTLET
 - PROPOSED STORM DRAIN & MH
 - ▨ CONCRETE SWALE
 - ▬ NEW
 - ▬ REMOVED

LSA

FIGURE 10



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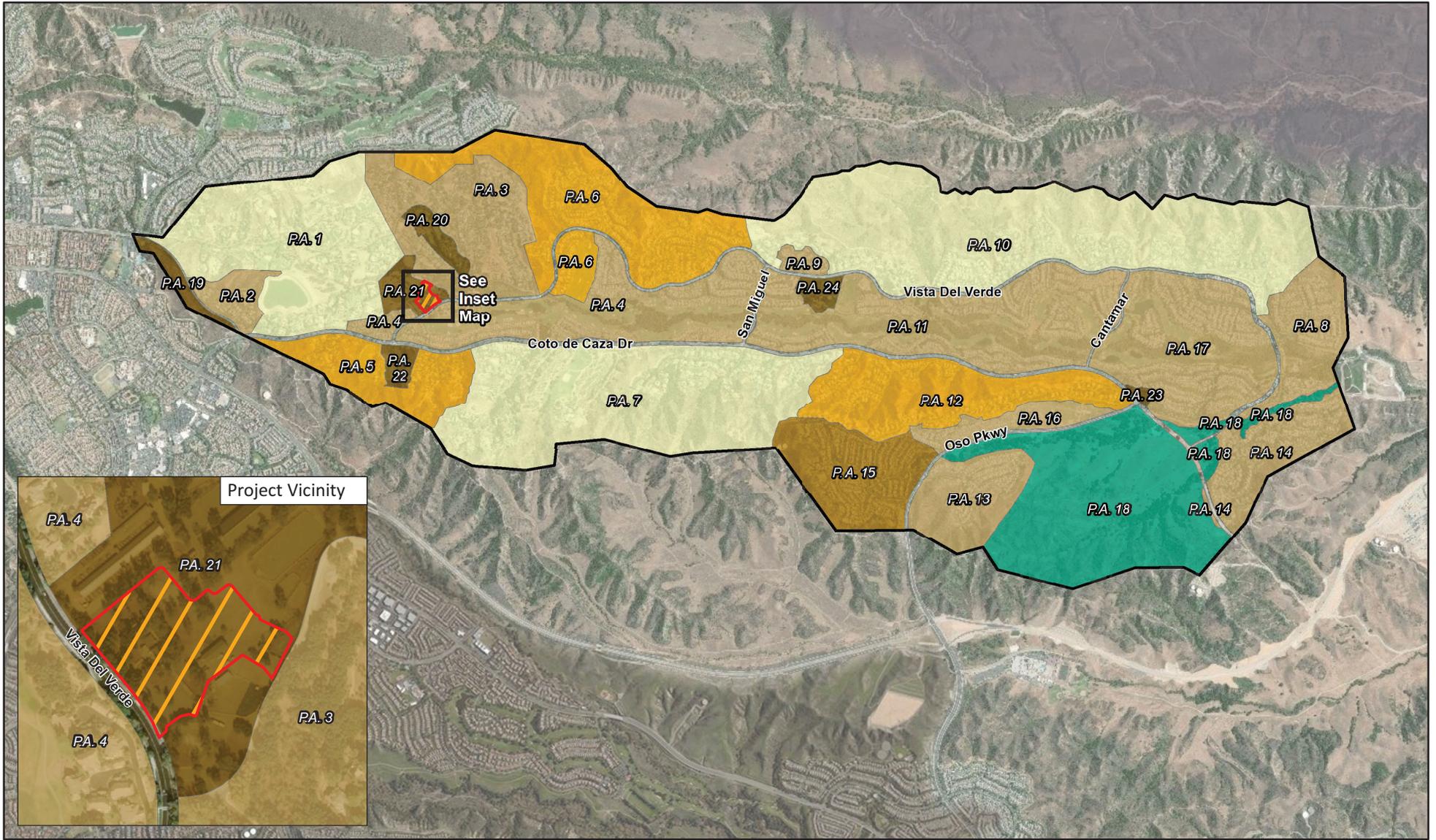


FIGURE 12

LSA

LEGEND

- Project Location
- Coto de Caza
- Proposed Planning Area Changes*
- Rural Residential
- Low Density
- Medium Density
- High Density
- Community Center/Commercial
- Regional Open Space

*Specific Plan Amendment would involve the creation of PA 5.1 encompassing an additional island of land comprised of the 5.1-acre project site currently located within a portion of PA 21.



SOURCE: Bing Maps (2015); Orange County (1995)

I:\OAK1601\GIS\LandUse.mxd (2/9/2021)

Oak Grove Residential
Coto de Caza
Planning Area 21 Boundary Revision

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INITIAL STUDY CHECKLIST FORM

ENVIRONMENTAL FACTORS POTENTIALLY AFFECTED

This document incorporates the Environmental Checklist Form from Appendix G of the *CEQA Guidelines*. The table below lists the environmental factors that are evaluated in this document. Environmental factors that are checked contain at least one impact has been determined to be a “Potentially Significant Impact.” Environmental factors that are not checked indicate that impacts were determined to have resulted in no impacts, less than significant impacts, or less than significant impacts with mitigation measures or County Standard Conditions of Approval incorporated into the Project.

<input type="checkbox"/> Aesthetics	<input type="checkbox"/> Agriculture and Forestry Resources	<input type="checkbox"/> Air Quality
<input type="checkbox"/> Biological Resources	<input type="checkbox"/> Energy	<input type="checkbox"/> Cultural Resources
<input type="checkbox"/> Geology and Soils	<input type="checkbox"/> Greenhouse Gas Emissions	<input type="checkbox"/> Hazards and Hazardous Materials
<input type="checkbox"/> Hydrology and Water Quality	<input type="checkbox"/> Land Use and Planning	<input type="checkbox"/> Mineral Resources
<input type="checkbox"/> Noise	<input type="checkbox"/> Population and Housing	<input type="checkbox"/> Public Services
<input type="checkbox"/> Recreation	<input type="checkbox"/> Transportation/Traffic	<input type="checkbox"/> Utilities and Service Systems
<input type="checkbox"/> Wildfire	<input type="checkbox"/> Tribal Cultural Resources	<input type="checkbox"/> Mandatory Findings of Significance

DETERMINATION

On the basis of this initial evaluation:

- I find that the proposed Project COULD NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared pursuant to CEQA Guidelines Article 6, 15070 through 15075.
- I find that although the proposed Project could have a significant effect on the environment, there will not be a significant effect in this case because revisions in the Project have been made by or agreed to by the Project proponent. A MITIGATED NEGATIVE DECLARATION will be prepared pursuant to CEQA Guidelines Article 6, 15070 through 15075.
- I find that the proposed Project MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required.
- I find that the proposed Project MAY have a “potentially significant impact” or “potentially significant unless mitigated” impact on the environment, but at least one effect (1) has been adequately analyzed in an earlier document pursuant to applicable legal standards, and (2) has been evaluated by mitigation measures based on the earlier analysis as described on attached sheets. An ENVIRONMENTAL IMPACT REPORT is required, but it must analyze only the effects that remain to be addressed.

- I find that although the proposed Project could have a significant effect on the environment, because all potentially significant effects (a) have been analyzed adequately in an earlier DEIR or NEGATIVE DECLARATION pursuant to applicable standards, and (b) have been avoided or mitigated pursuant to that earlier DEIR or NEGATIVE DECLARATION, including revisions or mitigation measures that are imposed upon the proposed Project, nothing further is required.
- I find that although the proposed Project could have a significant effect on the environment, because potentially effects (1) have been analyzed adequately in an earlier EIR or ND/MND pursuant to applicable legal standards, and (2) have been avoided or mitigated pursuant to that earlier EIR/ND/MND, including revisions or mitigation measures that are imposed upon the Project, MINOR ADDITIONS AND/OR CLARIFICATIONS are needed to make the previous documentation adequate to cover the Project which are documented in this Addendum to the earlier CEQA Document (Section 15164).

Kevin Shannon

Kevin Shannon, Consultant - Environmental Planner
OC Public Works, OC Development Services/Planning

December 8, 2022

Date

EVALUATION OF ENVIRONMENTAL IMPACTS

1. A brief explanation is required for all answers, except “No Impact” answers that are adequately supported by the information sources a lead agency cites in the parentheses following each question. A “No Impact” answer is adequately supported if the referenced information sources show that the impact simply does not apply to projects like the one involved (e.g., the project falls outside a fault rupture zone). A “No Impact” answer should be explained where it is based on project-specific factors as well as general standards (e.g., the project will not expose sensitive receptors to pollutants, based on a project-specific screening analysis.)
2. All answers must take account of the whole action involved, including off site as well as on-site, cumulative as well as project-level, indirect as well as direct, and construction as well as operational impacts.
3. Once the lead agency has determined that a particular physical impact may occur, then the checklist answers must indicate whether the impact is potentially significant, less than significant with mitigation, or less than significant. “Potentially Significant Impact” is appropriate if there is substantial evidence that an effect may be significant. If there are one or more “Potentially Significant Impact” entries when the determination is made, a DEIR is required.
4. “Negative Declaration: Less than Significant With Mitigation Incorporated” applies where the incorporation of mitigation measures has reduced an effect from “Potentially Significant Impact” to a “Less than Significant Impact.” The lead agency must describe the mitigation measures, and briefly explain how they reduce the effect to a less than significant level (mitigation measures from Section XVII, “Earlier Analyses,” may be cross-referenced).
5. Earlier analyses may be used where, pursuant to the tiering, program DEIR, or other CEQA process, an effect has been adequately analyzed in an earlier DEIR or negative declaration (Section 15063(c)(3)(D)). In this case, a brief discussion should identify the following:
 - a. **Earlier Analysis Used.** Identify and state where they are available for review.
 - b. **Impacts Adequately Evaluated.** Identify which effects from the above checklist were within the scope of and adequately analyzed in an earlier document pursuant to applicable legal standards, and state whether such effects were evaluated by mitigation measures based on the earlier analysis.
 - c. **Mitigation Measures.** For effects that are “Less than Significant with Mitigation Measures Incorporated,” describe the mitigation measures, which were incorporated or refined from the earlier document and the extent to which they address site-specific conditions for the project.
6. Lead agencies are encouraged to incorporate into the checklist references to information sources for potential impacts (e.g., general plans, zoning ordinances). Reference to a previously prepared or outside document should, where appropriate, include a reference to the page or pages where the statement is substantiated.
7. **Supporting Information Sources:** A source list should be attached, and other sources used, or individuals contacted should be cited in the discussion.
8. This is only a suggested form, and lead agencies are free to use different formats; however, lead agencies should formally address the questions from this checklist that are relevant to a project’s environmental effects in whatever format is selected.

9. The explanation of each issue should identify:
 - a. The significance criteria or threshold, if any, used to evaluate each question; and
 - b. The mitigation measure identified, if any, to reduce the impact to less than significant.

The following information is provided to supplement the Evaluation of Environmental Impacts discussed above.

THRESHOLDS OF SIGNIFICANCE

Thresholds of significance are identifiable quantitative, qualitative, or a performance level for a particular environmental effect. Non-compliance with a threshold means the effect will normally be determined to be significant, and, conversely, compliance with a threshold means the effect will normally be less than significant (*CEQA Guidelines* Section 15064.7).

The County relies upon the specific questions relating to environmental impact areas listed in Appendix G of the *CEQA Guidelines* to determine a level of significance.

On November 17, 2020, the County adopted “Guidelines for Evaluating Vehicle Miles Traveled under CEQA” (VMT Guidelines), included as Appendix C in the County CEQA Manual. The VMT Guidelines included CEQA thresholds of significance for vehicle miles traveled (VMT). Other than the VMT thresholds, the County has not adopted specific thresholds of significance and rather relies upon the specific questions relating to the topical environmental factors listed in Appendix G of the *CEQA Guidelines* to assist in the determination of a whether an identified impact is potentially significant. The County may, depending on the circumstances of a particular project, use specific thresholds of significance on a case-by-case basis as provided in *CEQA Guidelines* Section 15064.7(b).

COUNTY STANDARD CONDITIONS OF APPROVAL

OC Planning has prepared a list of “Standard Conditions of Approval” (undated), representing permit conditions routinely imposed by the County on development projects in unincorporated areas of the County. Relative to each of the topical issues identified in this document, relevant “Standard Conditions of Approval” are identified and, for the purpose of environmental review, are assumed to constitute a reasonable listing of “conditions” to be imposed on the proposed Project. These Standard Conditions of Approval may be modified as they are applied to individual projects or created based on professional practice associated with other projects subject to County approval.

The County’s “Standard Conditions of Approval” constitute “uniformly applicable development policies or standards (i.e., policies or standards adopted or enacted by a city or county or by a lead agency that reduce one or more adverse environmental effects) as defined in Section 15183.3(f)(7) of the *CEQA Guidelines*. Because not all the “Standard Conditions of Approval” formulated by the County are applicable to all development projects, only those “Standard Conditions of Approval” applicable to the proposed Project have been identified in this document. Similarly, because other “Standard Conditions of Approval” may exist that are not identified in this document, should the proposed Project be approved or conditionally approved, this listing may not be inclusive of all Standards of Approval that may be imposed by the County. The categorization of “Standard Conditions of Approval” as shown in this section is present for convenience only and does not limit

the application of those “Standard Conditions of Approval” to other resources or topical issues to which they are also relevant.

Where deemed applicable by OC Planning, each of the “Standard Conditions of Approval” listed are assumed to constitute components of and incorporated into the “project description” and are not measures separate from the Project itself. In the context of CEQA and the *CEQA Guidelines*, these “Standard Conditions of Approval” are not analogous to “mitigation measures” and are not, therefore, subject to mitigation reporting and monitoring program obligations (Section 15097, *CEQA Guidelines*).

ENVIRONMENTAL BASELINE

To adequately determine the significance of a potential environmental impact, the environmental baseline must be established. *CEQA Guidelines* Section 15125(a) states in pertinent part that the existing environmental setting will normally constitute the baseline physical conditions by which a lead agency will determine if an impact is significant.

Therefore, the environmental baseline for the Project constitutes the existing physical conditions as they are at the time that the environmental process commenced.

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ENVIRONMENTAL ANALYSIS CHECKLIST FORM

Initial Study No. PA 160056

Oak Grove Residential Project

ISSUES:	Potential Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
1. AESTHETICS. Except as provided in Public Resources Code Section 21099, would the project:				
a. Have a substantial adverse effect on a scenic vista?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c. In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage point). If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
d. Create a new source of substantial light or glare, which would adversely affect day or nighttime views in the area?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
2. AGRICULTURE AND FORESTRY RESOURCES. In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Dept. of Conservation as an optional model to use in assessing impacts or agriculture and farmland. In determining whether impacts to forest resources, including timberland, are significant environmental effects, lead agencies may refer to information compiled by California Department of Forestry and Fire Protection regarding the state's inventory of forest land, including the Forest and Range Assessment Project and the Forest Legacy Assessment project; and forest				

ISSUES:	Potential Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
carbon measurement methodology provided in Forest Protocols adopted by the California Air Resources Board.				
Would the project:				
a. Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b. Conflict with existing zoning for agricultural use, or a Williamson Act contract?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c. Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code section 12220(g)), timberland (as defined by Public Resources Code Section 4526), or timberland zoned Timberland Production (as defined by Government Code Section 51104(g))?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
d. Result in the loss of forest land or conversion of forest land to non-forest use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
e. Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion forest land to non-forest use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
3. AIR QUALITY. Where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to make the following determinations.				
Would the project:				
a. Conflict with or obstruct implementation of the applicable air quality plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

ISSUES:	Potential Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
c. Expose sensitive receptors to substantial pollutant concentrations?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
d. Result in other emissions (such as those leading to odors adversely affecting a substantial number of people?)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
4. BIOLOGICAL RESOURCES. Would the project:				
a. Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b. Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c. Have a substantial adverse effect on state or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
d. Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
e. Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
f. Conflict with provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

ISSUES:	Potential Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
5. CULTURAL RESOURCES. Would the project:				
a. Cause a substantial adverse change in the significance of a historical resource pursuant to §15064.5?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Cause a substantial adverse change in the significance of an archaeological resource pursuant to § 15064.5?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
c. Disturb any human remains, including those interred outside of formal cemeteries?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
6. ENERGY. Would the project:				
a. Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
7. GEOLOGY AND SOILS. Would the project:				
a. Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:				
i. Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
ii. Strong seismic ground shaking?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
iii. Seismic-related ground failure, including liquefaction?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
iv. Landslides?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

ISSUES:	Potential Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
b. Result in substantial soil erosion or the loss of topsoil?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
c. Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
d. Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
e. Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal system where sewers are not available for the disposal of waste water?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
f. Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
8. GREENHOUSE GAS EMISSIONS. Would the project:				
a. Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
9. HAZARDS AND HAZARDOUS MATERIALS. Would the project:				
a. Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

ISSUES:	Potential Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
c. Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
d. Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
e. For a project located within an airport land use plan or, where such plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
f. Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
g. Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
10. HYDROLOGY AND WATER QUALITY. Would the project:				
a. Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or ground water quality?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
c. Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:				

ISSUES:	Potential Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
i. Result in substantial erosion or siltation on- or off-site?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
ii. Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off site?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
iii. Create or contribute runoff water which would exceed the capacity of the existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
iv. Or impede or redirect flood flows?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
d. In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
e. Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
11. LAND USE AND PLANNING. Would the project:				
a. Physically divide an established community?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b. Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
12. MINERAL RESOURCES. Would the project:				
a. Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

ISSUES:	Potential Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
b. Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
13. NOISE. Would the project result in:				
a. Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Generation of excessive groundborne vibration or groundborne noise levels?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
c. For a project located within the vicinity of a private airstrip or an airport land use plan or, where such plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
14. POPULATION AND HOUSING. Would the project:				
a. Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

ISSUES:	Potential Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
15. PUBLIC SERVICES.				
a. Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:				
i. Fire protection?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
ii. Police protection?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
iii. Schools?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
iv. Parks?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
v. Other public facilities?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
16. RECREATION.				
a. Would the project increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
17. TRANSPORTATION. Would the project:				
a. Conflict with a program, plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle and pedestrian facilities?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Would the project conflict or be inconsistent with CEQA Guidelines section 15064.3, subdivision (b)?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
c. Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

ISSUES:	Potential Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
d. Result in inadequate emergency access?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
18. TRIBAL CULTURAL RESOURCES. Would the project cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:				
a. Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code section 5020.1(k), or	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. A resource determined by the lead agency, at its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision(c) of Public Resources Code Section 5024.1. In applying the criteria set forth in subdivision (c) of Public Resources Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
19. UTILITIES AND SERVICE SYSTEMS. Would the project:				
a. Require or result in the relocation or construction of new or expanded water, wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities or expansion of existing facilities, the construction or relocation of which could cause significant environmental effects?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

ISSUES:	Potential Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
c. Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
d. Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
e. Comply with federal, state and local management and reduction statutes and regulations related to solid waste?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
20. WILDFIRE. If located in or near state responsibility areas or lands classified as very high fire hazard severity zones, would the project:				
a. Substantially impair an adopted emergency response plan or emergency evacuation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b. Due to slope, prevailing winds, and other factors, exacerbate wildfire risks and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
c. Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines, or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
d. Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

ISSUES:	Potential Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
21. MANDATORY FINDINGS OF SIGNIFICANCE				
a. Does the project have the potential to substantially degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b. Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
c. Does project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

NOTE: All referenced and/or incorporated documents may be reviewed by appointment only, at the County of Orange, OC Public Works, Development Services/Planning, County Administration South Building, 601 N. Ross Street, Santa Ana, California, 92701 unless otherwise specified. An appointment can be made by contacting the CEQA Contact Person identified above.

ENVIRONMENTAL CHECKLIST FORM SUPPORTING DATA

1. Aesthetics

Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
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Except as provided in Public Resources Code Section 21099, would the project:				
(a) Have a substantial adverse effect on a scenic vista?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. A scenic vista is the view of an area that is visually or aesthetically pleasing from a certain vantage point. It is usually viewed from some distance away. Aesthetic components of a scenic vista include (1) scenic quality, (2) sensitivity level, and (3) view access. A scenic vista can be impacted in two ways: a development project can have visual impacts by either directly diminishing the scenic quality of the vista or by blocking the view corridors or “vista” of the scenic resource. Important factors in determining whether a proposed project would block scenic vistas include the Project’s proposed height, mass, and location relative to surrounding land uses and travel corridors.

Major Open Space Areas in the Specific Plan include Resource Preservation Areas, Scenic Areas, Golf Courses, the Thomas F. Riley Regional Park, and regional riding and hiking trails. Views from the Project site to the Major Open Space Areas are affected by distance, topography, vegetation, and existing development.

The Specific Plan defines Scenic Areas as:

An area set aside and usually restricted by easement for the purpose of providing an open space buffer or transition typically between a use such as residential and a Resource Preservation Area. Uses and structures are permitted on a limited basis in a Scenic Area (Section 1.3). (See also for reference: Resources Element of the Orange County General Plan).

The Specific Plan defines Resource Preservation Areas as:

An area set aside and usually restricted by easement for the purpose of providing a permanent open space backdrop, or sometimes open space buffer to minimize intrusion into and/or from surrounding properties. Grading in such areas and placement of structures other than for public utilities is generally prohibited (Section 1.3). (See also for reference: Resources Element of the Orange County General Plan).

The Natural Resources Component of the Resources Element of the Orange County General Plan defines Scenic Areas as:

Areas of natural resources such as ridgelines and hillsides (e.g., Saddleback Mountain the Santa Ana Mountains) and views of the ocean (e.g., views of Santa Catalina Island and views of the ocean from scenic vantage points along state highways and roadways).

The Project site is not located within a dedicated scenic easement.

The Project site is located within a developed area surrounded by development consisting of the following uses:

- Equestrian uses to the northeast, north, and northwest,
- Medium-density single-family residential uses to the northwest beyond the equestrian uses,
- Open space, community park & ride lot across Via Pajaro and the Four Pines Pastures property (formerly Maxwell Stables) to the east,
- Fairway Oaks residential condominiums to the west and southwest across Vista del Verde Road,
- An approximately 1.6-acre undeveloped site with an approved retail/commercial use⁹ on the site of the former General Store adjacent to the southerly site boundary and now known as the Coto de Caza General Store and Mercantile, which is anticipated to begin construction in Fall 2022 or soon thereafter, and
- Coto de Caza Golf Course to the southwest.

Distant, intermittent views of Scenic Areas and Scenic Preservation Areas may occur depending on the location of a viewer within the Project site boundaries. Major Open Space Areas (Exhibit 3, Coto de Caza Specific Plan) include the Thomas F. Riley Wilderness Park located approximately 3 miles south of the Project site along with regional riding and hiking trails along Oso Parkway and the Coto de Caza Golf Course approximately 0.12 mile west of the Project site. The nearest Scenic Area is approximately 0.25 mile northwest of the Project site and the nearest Resource Preservation Area is located approximately 0.65 mile northwest of the Project site. Due to the distance, intervening topography, vegetation, and development, intermittent views of these uses may occur. Intermittent views of the Santa Ana Mountains may occur depending on the location of a viewer within the Project site boundaries. In addition, the intervening topography, vegetation, and development scenic vistas outside the Project site would not be impacted. Moreover, the Project replaces existing development on the Project site.

The construction and operation of the proposed development would not affect a scenic vista and would result in less than significant impacts. No mitigation measures are either required or recommended.

The County General Plan includes a Scenic Highway Master Plan that designates certain local highways as scenic routes. With this designation, specific guidelines are given for enhancing the scenic amenities of these facilities. According to the Transportation Element (2012) of the County's General Plan, arterials in the County in the vicinity of the Project site subject to the County's Scenic Highway Master Plan include Antonio Parkway and Plano Trabuco Road. These designated local arterials are located approximately 1 mile west and 1.5 miles north of the Project site, respectively. The Project site is not visible from either of these designated local arterials. Therefore, neither the construction nor the operation of the Project would damage scenic resources from

⁹ Planning Application PA150020 approved the demolition and redevelopment of the existing General Store and the construction of a new 17,008 sf Coto de Caza General Store and Mercantile. Uses will include office space, retail and service commercial, and eating establishments.

County-designated scenic arterial roadways. Accordingly, no mitigation measures are either required or recommended.

1. Aesthetics	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Except as provided in Public Resources Code Section 21099, would the project:				
(b) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a State scenic highway?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. The Project site is located within a developed area surrounded by development consisting of former and planned commercial uses, the Coto de Caza Golf Course, the Coto Equestrian Preserve, and medium-density single-family residential uses. The California Department of Transportation’s (Caltrans) Landscape Architecture Program administers the Scenic Highway Program, contained in the State Streets and Highways Code, Sections 260–263. State highways are classified as either Eligible for Scenic Designation or Officially Designated. Within the County, there are three eligible (State Route 1 [SR-1], State Route 57 [SR-57], and SR-74) and one officially designated (State Route 91 [SR-91]) State scenic highways.¹⁰

The nearest State highway eligible for State scenic highway designation is SR-74, which is located approximately 4.5 miles southeast of the Project site, and the officially designated State scenic highway, SR-91, is located approximately 20 miles northwest of the Project site. The Project site is not visible from any of the eligible or officially designated State scenic highways classified by the Caltrans Scenic Highway Program in the County. Additionally, SR-241, located approximately 1 mile west of the Project site, is not eligible for, or officially designated as, a State scenic highway by the Caltrans Scenic Highway Program. Therefore, the Project does not have the potential to damage scenic resources from designated scenic highways. No mitigation measures are either required or recommended.

1. Aesthetics	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Except as provided in Public Resources Code Section 21099, would the project:				
(c) In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage point). If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

¹⁰ California Department of Transportation (Caltrans). California State Scenic Highway System Map, Orange County. Website: <https://dot.ca.gov/programs/design/lap-landscape-architecture-and-community-livability/lap-liv-i-scenic-highways> (accessed February 1, 2022).

No Impact. The Project site is located within the unincorporated community of Coto de Caza. According to the United States Census Bureau, Coto de Caza is located within the Mission Viejo—Lake Forest—San Clemente, CA Urbanized Area.¹¹ As described in *CEQA Guidelines* Section 15387 and defined by the United States Census Bureau, an “urbanized area” is a central city or a group of contiguous cities with a population of 50,000 or more people, together with adjacent densely populated areas having a population density of at least 1,000 people per square mile.¹² Therefore, Coto de Caza, including the Project site, is considered an urbanized area. As discussed above in Responses 1(a) and 1(b), the Project site is not located within or adjacent to either a Scenic Area or Resource Preservation Area. Although not explicitly stated, for purposes of this evaluation these two defined areas are presumed to provide a scenic quality.¹³ The Open Space regulations and restrictions in the Specific Plan apply only to Scenic Areas, Resource Preservation Areas, and Scenic Highway Combining Districts. Because the Project site is not located within or adjacent to either of these two areas and is not zoned Scenic Highway, the Open Space regulations would not apply and no conflicts would occur. Therefore, no impacts to scenic quality would occur during Project construction or operation. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
1. Aesthetics				
Except as provided in Public Resources Code Section 21099, would the project:				
(d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Glare is the result of improperly aimed or blocked lighting sources that are visible against a dark background such as the night sky but can also occur during daytime. Glare may also refer to the sensation experienced looking into an excessively bright light source that causes a reduction in the ability to see or causes discomfort. Glare generally does not result in illumination of off-site locations but results in a visible source of light viewable from a distance.

Construction activities associated with the proposed Project would occur only during daylight hours. Any construction-related illumination during evening and nighttime hours would be used for safety and security purposes only and would occur only for the duration required for the temporary construction process, which is estimated to be 13 months. Light resulting from construction activities would not substantially impact sensitive uses, substantially alter the character of surrounding uses, or interfere with the performance of off-site activities. In addition, construction activities are not anticipated to result in flat, shiny surfaces that would reflect sunlight or cause other natural glare. Minor glare from sunlight on construction equipment and vehicle windshields is not anticipated to impact visibility in the area because (1) relatively few construction vehicles and

¹¹ United States Census Bureau. 2010a. Mission Viejo—Lake Forest—San Clemente, CA Urbanized Area No. 57709. Website: https://www2.census.gov/geo/maps/dc10map/UAUC_RefMap/ua/ua57709_mission_viejo--lake_forest--san_clemente_ca/DC10UA57709_001.pdf (accessed August 22, 2021).

¹² United States Census Bureau. 2010b. Census Urban Area FAQs. Website: <https://www.census.gov/programs-surveys/geography/about/faq/2010-urban-area-faq.html> (accessed August 22, 2021).

¹³ The Coto de Caza Specific Plan does not define scenic quality. As described in Section I.B, *Setting*, of the Specific Plan, the Specific Plan area is characterized as containing significant natural features, including the Cañada Gobernadora Valley, riparian habitat, oak groves, wildlife corridors, and two major open space ridgelines, which occur on the eastern and western boundaries of the Specific Plan area.

pieces of construction equipment would be used on the Project site, and (2) the construction-site would be fenced and shielded from pedestrian and vehicular views. In addition, construction vehicles would not be operating at night and thus would not create nighttime sources of glare. Therefore, light and glare impacts related to Project construction would be considered less than significant and would not require mitigation.

Project implementation would create new lighting sources on the Project site associated with the residences and security lighting. However, the 13 low-density residential units would have lighting typical of residential structures and landscaping and would not create substantial light or glare that would impact day or nighttime views in the Project area. Private residential lighting would be designed consistent with the County's lighting standards and the specifications in Section III.4.7.h: *Lights* of the Specific Plan, which states that "all lights shall be designed and located so that direct light rays shall be confined to the premises" and would avoid the creation of intrusive lighting (i.e., light trespass) and glare within the immediate Project area and adjacent properties. If street lighting is included, it would be designed by an engineer consistent with Standard Plan No. 1411.

Furthermore, the proposed Project would be required to comply with County Standard Conditions AES-1 and AES-2, which require the Project Applicant to demonstrate and provide a field test to verify that all exterior lighting would be confined within the limits of the Project site. Therefore, with implementation of County Standard Conditions AES-1 and AES-2 and compliance with the regulations in Section 8: Sign Regulations of the Specific Plan, light and glare impacts related to Project operation would be considered less than significant. No mitigation measures are either required or recommended.

County Standard Conditions. The following County Standard Conditions are applicable to the Project:

- County Standard Condition AES-1** Prior to issuance of any Building Permit, the Project Applicant shall demonstrate that all exterior lighting has been designed and located so that all direct rays are confined to the property in a manner meeting the approval of the Manager, Permit Services.
- County Standard Condition AES-2** Prior to the approval of final inspection, the Project Applicant shall provide a letter from the electrical engineer, the licensed landscape architect, or the licensed professional designer that a field test has been performed after dark and the light rays are confined to the premises. The letter shall be submitted to the Manager, Inspection, for review and approval.

2. Agriculture and Forestry Resources

Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
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In determining whether impact to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Dept. of Conservation as an optional model to use in assessing impacts on agriculture and farmland. In determining whether impacts to forest resources, including timberland, are significant environmental effects, lead agencies may refer to information compiled by the California Department of Forestry and Fire Protection regarding the state’s inventory of forest land, including the Forest and Range Assessment project and the Forest Legacy Assessment project; and forest carbon measurement methodology provide in Forest Protocols adopted by the California Air Resources Board.

Would the project:

(a) Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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No Impact. The Project site was previously developed with commercial and equestrian uses. The Coto de Caza community is almost entirely urbanized, and as such, there are no agricultural zones within or nearby the Project site. The 2018 Orange County Important Farmland Map identifies the Project site and virtually all of the Specific Plan area as Urban and Built-Up Land or Other Land.¹⁴ Therefore, construction and operation of the Project would not result in any impacts to Prime Farmland, Unique Farmland, and Farmland of Statewide Importance. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
2. Agriculture and Forestry Resources				
Would the project:				
(b) Conflict with existing zoning for agricultural use or a Williamson Act contract?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. The Orange County Zoning Code map classifies the Project site as Specific Plan. The Specific Plan designates the Project site as PA 21 – Community Center/Commercial Uses. There are no agricultural use designations in the Specific Plan. As discussed in the Project Description section, the Project would amend the Specific Plan to designate the site as Low-Density Residential.

The Williamson Act was established to encourage the conservation of farmland and certain open space uses by way of lower property taxes to landowners of such property. As the Project site was previously utilized for commercial and open space-recreational uses, it is not subject to a Williamson Act contract. Additionally, the Specific Plan does not designate the Project site for

¹⁴ Department of Conservation, Division of Land Resource Protection. 2018. Orange County Important Farmland.

either agriculture or farmland. A review of *The California Land Conservation Act of 1965 2016-2017 Status Report*¹⁵ indicates that in 2014 and 2015, there were zero acres of the Project site in Williamson Act land enrollment. Therefore, construction and operation of the Project would have no impact on zoning designations for agricultural and farmland use or land currently under a Williamson Act contract. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
2. Agriculture and Forestry Resources				
Would the project:				
(c) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code section 12220(g)), timberland (as defined by Public Resources Code section 4526), or timberland zoned Timberland Production (as defined by Government Code section 51104(g))?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. The Project site is not zoned for, and does not contain, any forest land or timberland uses. Furthermore, there is no forest land or timberland subject to the Public Resources Code (PRC) within the vicinity of the Project site. According to the California Department of Fish and Wildlife Timberland Conservation Program, Orange County does not contain any private or public timberlands.¹⁶ Therefore, construction and operation of the Project would not result in impacts to forestland or timberland. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
2. Agriculture and Forestry Resources				
Would the project:				
(d) Result in the loss of forest land or conversion of forest land to non-forest use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. As stated previously, the Project site was previously disturbed and developed. As noted within Responses 2(b) and 2(c), above, the Project site is not currently zoned or used for forest land or timber land and is located within an urbanized area. Therefore, construction and operation of the Project would not result in impacts regarding the loss or conversion of forest land to a non-forest use. No mitigation measures are either required or recommended.

¹⁵ California Department of Conservation (DOC). 2016. *The California Land Conservation Act of 1965 2016-2017 Status Report*. Website: Williamson Act Status Report 2016-17 (ca.gov) (accessed November 11, 2019).

¹⁶ California Department of Fish and Wildlife (CDFW). 2019. *Timberland Conservation Program*. Website: <https://www.wildlife.ca.gov/Conservation/Timber> (accessed September 16, 2019).

2. Agriculture and Forestry Resources	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(e) Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non-forest use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. As stated previously, the Project would not convert farmland to a non-agricultural use. Likewise, the Project site would not contribute to environmental changes that could result in conversion of farmland to non-agricultural use in the vicinity of the Project nor in the Coto de Caza community, as no such uses exist in the vicinity of the Project or in the Coto de Caza community more broadly. Therefore, no direct or indirect impacts to farmland or forest land would occur due to Project construction or operation. No mitigation measures are either required or recommended.

3. Air Quality

Potentially Significant Impact Less than Significant with Mitigation Incorporated Less than Significant Impact No Impact

Where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to make the following determinations.				
Would the project:				
(a) Conflict with or obstruct implementation of the applicable air quality plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project site is located within the County of Orange, which is part of the South Coast Air Basin (Basin). The Basin includes all of Orange County and portions of Los Angeles, Riverside, and San Bernardino Counties. Air quality within the Basin is under the jurisdiction of the South Coast Air Quality Management District (SCAQMD). The SCAQMD adopted the *2016 Air Quality Management Plan* (2016 AQMP) in March 2017.

The main purpose of an AQMP is to describe air pollution control strategies to be taken by a city, county, or region classified as a nonattainment area. A nonattainment area is considered to have worse air quality than the standards set by the National Ambient Air Quality Standards (NAAQS) as defined in the federal Clean Air Act, and/or the California Ambient Air Quality Standards (CAAQS)), as defined by California Health and Safety Code Sections 39500–39961 and the implementing regulations for the California Air Resources Board in Title 17, Division 3 of the California Code of Regulations. The Basin is in nonattainment for the federal and State standards for ozone (O₃), and particulate matter less than 2.5 microns in diameter (PM_{2.5}). In addition, the Basin is in nonattainment for the State particulate matter less than 10 microns in diameter (PM₁₀) standard, and in attainment/maintenance for the federal PM₁₀, carbon monoxide (CO), and nitrogen dioxide (NO₂) standards.

Consistency with the 2016 AQMP for the Basin would be achieved if a project is consistent with the goals, objectives, and assumptions in the plan to achieve the federal and State air quality standards, respectively. Per the SCAQMD *CEQA Air Quality Handbook* (April 1993), there are two main indicators of a project’s consistency with the applicable AQMP: (Criterion 1) whether the project would increase the frequency or severity of existing air quality violations or cause or contribute to new violations, or delay timely attainment of air quality standards or the interim emission reductions specified in the 2016 AQMP; and (Criterion 2) whether the project would exceed the 2016 AQMP’s assumptions for the final year for the AQMP. The CEQA Air Quality Handbook indicates that consistency with AQMP growth assumptions must be analyzed for new or amended General Plan elements, Specific Plans, and significant projects. Significant projects include airports, electrical generating facilities, petroleum and gas refineries, designation of oil drilling districts, water ports, solid waste disposal sites, and offshore drilling facilities. For the Project to be consistent with the AQMP, the pollutants emitted from the Project should not exceed the SCAQMD daily emissions threshold or cause a significant impact on air quality. Additionally, if feasible mitigation measures are implemented and are shown to reduce the impact level from significant to less than significant, a project may be deemed consistent with the AQMP resulting in less than significant impacts.

Criterion 1 - Based on the relatively small scale of the Project emissions (refer to Response 3[b] below), which includes 13 single-family residential lots and related site improvements, the short-

term construction air emission impacts would have less than significant air emission impacts based on the SCAQMD regional and local thresholds of significance (see Table E in Response 3[b], below). Similarly, due to the relatively small scale of the Project, the long-term operational air emission impacts would not have any significant impacts based on the SCAQMD local and regional thresholds of significance (see Table F in Response 3[b], below). Therefore, the Project would not contribute to the exceedance of any air pollutant concentration standards and is consistent with the AQMP for Criterion 1.

Criterion 2 - As previously identified, the Project proposes the future development of residential uses within PA 21, which is designated for commercial uses; therefore, the Project would require a SPA to establish a low-density residential use. The SPA includes the transfer of 13 residential dwelling unit allocations from PA 2 to new PA 5.1 and does not result in an increase in the total number of residential units allowed within the Specific Plan. The Project would allow for the future development of 13 units on an approximately 5.1-acre site, which equates to a density of approximately 2.55 dwelling units per acre. After the approval of the SPA, the Project would be consistent with the Specific Plan.

The emphasis of this criterion is to ensure that the analyses conducted for the Project are based on the same forecasts as the AQMP. The 2016–2040 Regional Transportation Plan/Sustainable Communities Strategy prepared by the Southern California Association of Governments (SCAG) (2016) includes chapters on the challenges in a changing region; creating a plan for our future; and the road to greater mobility and sustainable growth. These chapters currently respond directly to federal and State requirements placed on SCAG. Local governments are required to use these as the basis of their plans for purposes of consistency with applicable regional plans under CEQA. For this Project, the County’s General Plan Land Use Plan defines the assumptions that are represented in the AQMP.

The Project would comply with and would be consistent with the Low-Density Residential land use identified by the Specific Plan upon approval of the SPA. Because the overall number of residential units within the Specific Plan would not increase, the Project would be consistent with the General Plan growth assumptions, which the 2016 AQMP relies on and would not conflict with the 2016 AQMP. Therefore, the Project would not exceed the AQMP assumptions for the Project and is consistent with the AQMP for Criterion 2. Additionally, the Project would not be considered a “significant project” as defined in the 2016 AQMP affecting air quality in the region. Furthermore, as discussed in Responses 3(b) through 3(c), emissions generated by the Project would be below emissions thresholds established in SCAQMD’s *Air Quality Significance Thresholds* (March 2015) and would result in less than significant air quality impacts. Therefore, construction and operation of the Project would be consistent with and would not conflict with or obstruct implementation of the 2016 AQMP. No mitigation measures are either required or recommended.

3. Air Quality	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(b) Result in cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. As previously identified, the Basin is in nonattainment for the federal and State standards for O₃ and PM_{2.5}. In addition, the Basin is in nonattainment for the State PM₁₀ standard and is in attainment/maintenance for the federal PM₁₀, CO, and NO₂ standards. The *CEQA Guidelines* indicate that a significant impact would occur if a project would result in a cumulatively considerable net increase of any criteria pollutants for which the project region is nonattainment under an applicable federal or state ambient air quality standard. Specific criteria for determining whether the potential air quality impacts of a project are significant are set forth in SCAQMD’s *Air Quality Significance Thresholds* (March 2015). Those criteria include emission thresholds, compliance with State and national air quality standards, and conformity with the existing State Implementation Plan (SIP) or consistency with the current AQMP. A summary of the specific criteria established by the SCAQMD for individual projects and individual pollutants is presented in Table D, *SCAQMD Significance Thresholds*, below. The discussion and analysis provided below are based on data included in the *CalEEMod Air Quality and Greenhouse Gas Emissions Modeling Output*, which is included in Appendix A-1 of this IS/MND.

Table D: SCAQMD Significance Thresholds

Air Pollutant	Construction Phase (lbs/day)	Operational Phase (lbs/day)
ROCs	75	55
CO	550	550
NO _x	100	55
SO _x	150	150
PM ₁₀	150	150
PM _{2.5}	55	55

Source: South Coast Air Quality Management District. *Air Quality Significance Thresholds* (March 2015).

CO = carbon monoxide
lbs/day = pounds per day
NO_x = nitrogen oxides
PM_{2.5} = particular matter less than 2.5 microns in size

PM₁₀ = particular matter less than 10 microns in size
ROCs = reactive organic compounds
SCAQMD = South Coast Air Quality Management District
SO_x = sulfur oxides

Any project in the Basin with emissions exceeding any of the mass daily emission significance thresholds (i.e., daily emissions for the total volume of emissions of a given pollutant), identified above in Table D, would be considered significant by the SCAQMD.

Construction Emissions. Air quality impacts could occur during grading and construction of the Project due to soil disturbance and equipment exhaust. Major sources of emissions during site grading, building construction, paving and architectural coatings include (1) exhaust emissions from construction vehicles, (2) equipment and fugitive dust generated by vehicles and equipment traveling over exposed surfaces, and (3) soil disturbances from grading and cement/asphalt paving. The following summarizes construction emissions and associated impacts of the Project.

Construction of the Project would include the following five phases: site preparation, grading, building construction, paving, and architectural coatings. The Project phasing would generally start with the grading of the Project site and continue with the construction of the Project. Construction activities would take approximately 13 months. Refer to Table A, *Construction Schedule*, in the Project Description section.¹⁷ Peak daily and annual emissions were analyzed using California Emissions Estimator Model (CalEEMod Version 2016.3.2). Project-specific information provided by the Project Applicant was used where available, including building details, construction schedule, materials, and grading requirements. The 8,550 cy of soil would be a total balanced cut and fill during grading (i.e., all of the soil removed/graded/cut will be used as part of the on-site and off-site improvements, with no soil import or export required); the following default equipment from CalEEMod was utilized in the analysis: excavators, graders, dozers, loaders, graders, cement and mortar mixers, backhoes, cranes, generator sets, forklifts, welders, compressors, paving equipment, pavers, and rollers.

Fugitive dust emissions would be substantially reduced by mandatory compliance with SCAQMD Rules 402 - Nuisance and 403 - Fugitive Dust, which are included in Appendix A-2 and A-3 of this IS/MND. Implementation of these rules, including measures such as on-site watering at least two times daily, was accounted for in the Project CalEEMod emission estimates.

Table E, *Peak Daily Construction Emissions*, presents the peak daily construction emissions based on the CalEEMod emission estimates. This table shows that construction equipment/vehicle emissions during construction periods would not exceed any of the SCAQMD daily emissions thresholds. Therefore, the air quality impacts related to construction activities would be less than significant. No mitigation measures are either required or recommended.

Table E: Peak Daily Construction Emissions

Peak Construction Emissions	Pollutant Emissions (lbs/day)					
	ROG	NO _x	CO	SO ₂	PM ₁₀ (total)	PM _{2.5} (total)
Site Preparation	3.96	40.54	21.70	0.04	9.29	5.81
Grading	2.35	24.77	16.31	0.03	3.88	2.43
Building Construction	1.92	17.54	16.75	0.03	1.02	0.92
Paving	1.16	11.16	15.01	0.02	0.74	0.57
Architectural Coatings	7.53	1.41	1.84	0.00	0.09	0.08
Highest Peak Daily Emissions	7.53	40.54	21.70	0.04	9.29	5.81
SCAQMD Construction Emissions Threshold	75.00	100.00	550.00	150.00	150.00	55.00
Exceed Significance?	No	No	No	No	No	No

Source: Compiled by LSA (May 2020).

Note: Column totals may not add up due to rounding.

CO = carbon monoxide

lbs/day = pounds per day

NO_x = nitrogen oxide

PM_{2.5} = particulate matter less than 2.5 microns in diameter

PM₁₀ = particulate matter less than 10 microns in diameter

ROG = reactive organic gases

SCAQMD = South Coast Air Quality Management District

SO₂ = sulfur dioxide

¹⁷ The CalEEMod analysis evaluated project construction emissions with a start date of June 2021 and a duration of 13 months. The proposed project's construction schedule has since been modified that project construction would begin June 2023 and would still occur over an 13 month duration. This minimal modification to the project construction schedule was reviewed by LSA and it was determined that the modified construction duration would not result in any new or more severe air quality or greenhouse gas impacts than what is described within.

Operational Emissions. Long-term air emission impacts are those impacts associated with any change in permanent use of the Project site by on-site stationary and off-site mobile sources that increase emissions. Stationary-source emissions include emissions associated with electricity consumption and natural gas usage. Mobile-source emissions result from vehicle trips associated with a project.

Based on the traffic analysis included in Section 17, Transportation, of this IS/MND, the Project would generate 123 average daily trips during Project operations. Peak daily operational emissions associated with the Project are shown in Table F, *Peak Daily Construction Emissions*.

Table F: Peak Daily Operational Emissions

Peak Operational Emissions	Pollutant Emissions (lbs/day)					
	ROCs	NO _x	CO	SO _x	PM ₁₀	PM _{2.5}
Area Sources	0.56	0.23	1.17	<0.01	0.02	0.02
Energy Sources	<0.01	0.08	0.04	<0.01	<0.01	<0.01
Mobile Sources	0.20	0.84	2.79	0.01	0.94	0.26
Total	0.76	1.15	4.00	0.01	0.96	0.28
SCAQMD Thresholds	55.00	55.00	550.00	150.00	150.00	55.00
Significant?	No	No	No	No	No	No

Source: Compiled by LSA (May 2020).

Notes: Column totals may not add up due to rounding. A representative amount of diesel-powered warehouse equipment (e.g., forklifts) was assumed.

CO = carbon monoxide

lbs/day = pounds per day

NO_x = nitrogen oxides

PM_{2.5} = particulate matter less than 2.5 microns in size

PM₁₀ = particulate matter less than 10 microns in size

ROCs = reactive organic compounds

SCAQMD = South Coast Air Quality Management District

SO_x = sulfur oxides

In addition, results shown in Table F, *Peak Daily Operational Emissions*, indicate that the increase of all criteria pollutants during the operational phase of the Project would not exceed the corresponding SCAQMD daily emission thresholds for any criteria pollutants. The projected emissions of criteria pollutants as a result of the Project are expected to be below the emissions thresholds established for the region in the 2016 AQMP. Therefore, there would be no cumulatively considerable net increase, and therefore less than significant impacts of the criteria pollutants that are in nonattainment status in the Basin during the long-term operations. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
3. Air Quality				
Would the project:				
(c) Expose sensitive receptors to substantial pollutant concentrations?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Sensitive receptors include residences, schools, hospitals, and similar uses that are sensitive to adverse air quality. As described in Response 3(b), the Project would not have a cumulatively considerable net increase of the criteria pollutants that are in nonattainment status in the Basin. Project implementation may expose surrounding sensitive receptors to airborne particulates, as well as a small quantity of construction equipment pollutants (i.e., usually diesel-fueled vehicles and equipment). The nearest sensitive receptors are the Fairway Oaks residential condominiums across Vista del Verde Road, located approximately 115 ft

(35 meters) to the southwest of the Project site. However, construction contractors would be required to implement measures to reduce or eliminate emissions by following the SCAQMD’s mandatory standard construction practices contained in Rules 402 and 403. Rule 402 requires implementation of dust suppression techniques to prevent fugitive dust from creating a nuisance off site. Rule 403 requires that fugitive dust be controlled with best available control measures so that the presence of such dust does not remain visible in the atmosphere beyond the property line of the emission source. Rules 402 and 403 are provided in Appendices A-2 and A-3, respectively.

SCAQMD has issued guidance on applying CalEEMod results to localized impacts analyses.¹⁸ The Project site is primarily surrounded by medium-density single-family residential uses to the northwest, the Coto Equestrian Preserve to the west and north, low-density residential uses to the northwest, condominiums to the southwest across Vista del Verde Road, and the former General Store proposed for redevelopment and now known as the Coto de Caza General Store and Mercantile anticipated to begin construction in Fall 2022 or soon thereafter. Residential uses are present in areas to the northwest and southwest of the Project site. As stated above, the sensitive receptors nearest to the Project are the Fairway Oaks residential condominiums across Vista del Verde Road located approximately 115 ft (35 meters) to the southwest of the Project site. Table G, *Construction Localized Emissions*, shows that the construction emission rates would not exceed the localized significance thresholds (LSTs) for the nearest sensitive receptors, or any other sensitive receptors in the vicinity of the Project site.

Table G: Construction Localized Emissions

Emissions Sources	Pollutant Emissions (lbs/day)			
	NO _x	CO	PM ₁₀	PM _{2.5}
On-Site Emissions	40.0	21.0	9.1	5.8
LST	194.0	1,923.0	22.0	9.2
Significant Emissions?	No	No	No	No

Source: South Coast Air Quality Management District *Thresholds for Construction and Operation with Gradual Conversion of NO_x to NO₂* (October 21, 2009); Compiled by LSA (May 2020).

Note: Source Receptor Area 21– Capistrano Valley, 5 acre, receptors at 35 meters.

CO = carbon monoxide

NO_x = nitrogen oxides

lbs/day = pounds per day

PM_{2.5} = particulate matter less than 2.5 microns in size

LST = localized significance threshold

PM₁₀ = particulate matter less than 10 microns in size

SCAQMD developed localized significance thresholds (LST) methodology that allows public agencies to determine whether a project may generate significant adverse localized air quality impacts. LSTs represent the maximum emissions from a project that will not cause or contribute to an exceedance of the most stringent applicable federal or State ambient air quality standard and are developed based on the ambient concentrations of that pollutant for each source receptor area. LST mass rate look-up tables are applicable to the following pollutants only: oxides of nitrogen (NO_x), carbon monoxide (CO), particulate matter less than 2.5 microns in aerodynamic diameter (PM_{2.5}) and particulate matter less than 10 microns in aerodynamic diameter (PM₁₀). LSTs include only on-site mobile emissions.

¹⁸ South Coast Air Quality Management District (SCAQMD). Fact Sheet for Applying CalEEMod to Localized Significance Thresholds. Website: <http://www.aqmd.gov/docs/default-source/ceqa/handbook/localized-significance-thresholds/calmod-guidance.pdf> (accessed September 2019).

Table H, *Operational Localized Emissions*, shows that the operational emission rates would not exceed the LSTs for sensitive receptors in the vicinity of the Project site. Therefore, the proposed operational activity would not result in a locally significant air quality impact.

Table H: Operational Localized Emissions

Emissions Sources	Pollutant Emissions (lbs/day)			
	NO _x	CO	PM ₁₀	PM _{2.5}
On-Site Emissions	0.27	1.31	0.07	0.04
LST	194.00	1,923.00	5.40	2.40
Significant Emissions?	No	No	No	No

Source: South Coast Air Quality Management District *Thresholds for Construction and Operation with Gradual Conversion of NO_x to NO₂* (October 21, 2009); compiled by LSA (May 2020).

Note: Source Receptor Area 21– Capistrano Valley, 5 acre, receptors at 35 meters.

CO = carbon monoxide

NO_x = nitrogen oxides

lbs/day = pounds per day

PM_{2.5} = particulate matter less than 2.5 microns in size

LST = local significance threshold

PM₁₀ = particulate matter less than 10 microns in size

The Project’s on-site emissions would be below the SCAQMD’s LSTs for construction and operations. Therefore, with mandatory compliance with SCAQMD’s Rules, sensitive receptors would not be exposed to substantial pollutant concentrations during construction and operation of the Project, and potential short-term impacts would be considered less than significant. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
3. Air Quality				
Would the project:				
(d) Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. SCAQMD’s *CEQA Air Quality Handbook* (SCAQMD 1993) identifies various secondary significance criteria related to odorous air contaminants. Substantial odor-generating sources include land uses such as agricultural activities, livestock feedlots, wastewater treatment facilities, solid waste landfills and transfer stations, food processing and manufacturing facilities, and heavy manufacturing uses. The Project is not identified as a land use that would produce significant odor impacts.

Transient odors may emanate from the operation of diesel-powered construction equipment during construction of the Project. However, these odors would be limited to the construction period and would disperse quickly; therefore, these odors would be considered a less than significant impact and not require mitigation. The Project is typical of residential developments that do not propose any uses or activities that would result in potentially significant odor impacts. Therefore, less than significant impacts related to odors would result from the Project during the short-term construction phase and long-term operations phase. No mitigation measures are either required or recommended.

4. Biological Resources

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Discussion:

A literature review was conducted to assist in determining the existence or potential occurrence of sensitive plant and animal species on the Project site or in the Project vicinity. Database records for the *Cañada Gobernadora Santiago Peak, El Toro, Alberhill, San Juan Capistrano, Sitton Peak, Dana Point, and San Clemente, California*, United States Geologic Survey (USGS) 7.5-minute quadrangles were reviewed on September 13, 2019, using the California Department of Fish and Wildlife’s (CDFW) California Natural Diversity Data Base (CNDDDB), the California Native Plant Society’s (CNPS) *Electronic Inventory of Rare and Endangered Vascular Plants of California* (Version 7), and the United States Fish and Wildlife Service (USFWS) Information Planning and Conservation System (IPaC) database.

In addition, a field survey of the project site and immediately surrounding areas was conducted on September 13, 2019, by two qualified LSA biologists. Notes were taken on general site conditions, vegetation, potential jurisdictional waters of the United States (if any), and suitability of habitat for various sensitive elements. All observed plant and animal species were noted.

A full discussion of the biological resources assessment can be found in Appendix B, *Biological Resources Technical Memorandum of Findings* (LSA, May 2020 and revised April 2022).

Impact Analysis

Less than Significant with Mitigation Incorporated. The Project site is located within an urbanized area of the County and encompasses a maintenance building/hay barn, two round pen enclosures, and various utility apparatuses. Results of the field survey indicated that mature California coast live oak (*Quercus agrifolia*) trees are located on the eastern and central portions of the site. Several mature western sycamore (*Platanus racemosa*) trees are scattered throughout the site. California coast live oak and western sycamore were the only native vegetation observed on-site. The remaining vegetation consists of scattered ornamental landscape trees and shrubs.

Sensitive Species. The CNDDDB literature record search identified 99 special-interest species with the potential to occur within the Project area. In total, 19 Federal/State listed species were identified as potentially present in the Project vicinity. However, all 19 of the Federal/State listed species are considered absent from the Project site due to a lack of suitable habitat on the site, or because the Project site is located outside the known range of the species.

Additionally, 80 other non-listed sensitive species were identified in the CNDDDB literature record search as being potentially present in the Project vicinity. Of these 80 sensitive species, 74 are considered absent from the Project site due to a lack of suitable habitat on the Project site, or because the Project site is located outside the known range of the species. Of the 6 sensitive species identified as having a potential for occurrence, one has a moderate to high probability of occurrence. Three sensitive species have a moderate potential for occurrence, and two are considered to have a low probability for occurrence. The species identified as having a moderate to high probability for occurrence are bats known to occur in the area and a bird species associated with mature oak and other large trees present on the Project site.

The six non-listed sensitive species identified as having the potential to occur at the Project site are:

- Pallid bat (*Antrozous pallidus*) – moderate to high potential;
- Western mastiff bat (*Eumops perotis californicus*) – moderate potential;
- Pocketed free-tailed bat (*Nyctinomops femorosaccus*) – moderate potential;
- Western red bat (*Lasiurus blossevillii*) – moderate potential;
- Mexican long-tonged bat (*Choeronycteris mexicana*) – low potential; and
- White-tailed kite (*Elanus leucurus*) – low potential.

Due to the potential presence of the six non-listed sensitive species listed above, impacts to these species could occur during the construction phase from grading, equipment movement, material staging, site preparation, and construction of the dwellings. These potential impacts can be avoided with implementation of Mitigation Measures BIO-1 and BIO-2, which mandate the preparation of site surveys and compliance with the Migratory Bird Treaty Act (MBTA) to avoid potentially significant impacts to roosting bats and nesting birds on the site. These measures were developed to minimize, mitigate, and avoid potential impacts to these species. Therefore, with implementation of Mitigation Measures BIO-1 and BIO-2 incorporated into the Project, impacts to such species would be less than significant.

Mitigation Measures. The following Mitigation Measures are required for the Project:

Mitigation Measure BIO-1 Preconstruction Nesting Bird Surveys. The trees that are present on-site may provide nesting habitat for migratory birds protected under the Migratory Bird Treaty Act and the California Fish and Game Code. When possible, vegetation clearing should be restricted to outside the active breeding season (February 1 through August 31) for those sensitive bird species present or potentially occurring within the study area or directly adjacent to the study area. However, some of these birds may start nesting as early as January or as late as September in certain years. Therefore, if vegetation is scheduled to be cleared during these extended breeding periods (i.e., January through September), or if it becomes absolutely necessary to clear vegetation during the active breeding season (February 1 through August 31), a qualified biologist shall conduct clearance surveys for active bird nesting prior to any clearing of vegetation. This is necessary to definitively

ascertain whether or not any raptors or other migratory birds are actively nesting in the Project area. The location of any active raptor or migratory bird nests would be mapped by the qualified biologist and reported immediately to the construction manager. All construction activities in close proximity to active nests, as determined by the qualified biologist, would need to be delayed, or otherwise modified, as necessary to prevent nest failure caused by construction activities.

A qualified biological monitor shall be present during all site-clearing and grading activities to flush mobile wildlife species and to ensure that there are no impacts to any areas to be protected.

Mitigation Measure BIO-2

Preconstruction Bat Surveys. Project grading and construction activities shall occur outside the active bat roosting season (April 1–August 31), if feasible. Should such activities occur during the roosting season (April 1–August 31), the County of Orange Planning Manager, or designee, shall verify prior to issuance of Grading Permits, that the Project Applicant has retained a qualified biologist to conduct a preconstruction bat survey no more than 3 days prior to the tree removal/relocation on the Project site to verify the absence of bats on-site. If active roosting bats are observed in existing trees on the Project site, the relocation of trees containing roosts shall occur under the supervision of a qualified bat biologist to prevent potential mortality to roosting bats on-site. The Orange County Planning Manager, or designee, shall verify that a preconstruction bat survey has been conducted by a qualified bat biologist and, if the removal of trees with roosting bats is required, shall verify that the removal of on-site trees containing roosting bats has occurred under the supervision of the qualified bat biologist.

4. Biological Resources	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. In its existing condition, the Project site and immediately surrounding areas where the off-site improvements would be constructed is partially developed with a maintenance building/hay barn, two round pen enclosures, and various utility apparatuses with scattered trees and ornamental vegetation. The IPaC literature record search identified 19 species that are proposed, candidate, threatened or endangered species and are managed by the USFWS under the federal Endangered Species Act. None of these 19 species were observed during the field survey of the project site and

immediately surrounding areas conducted by LSA biologists on September 13, 2019 and are considered absent from the Project site and immediately surrounding areas due to a lack of suitable habitat, or because the Project site and immediately surrounding areas are located outside the known range of the species. The field survey also determined that there is no riparian habitat or other sensitive natural communities as identified in local or regional plans, policies, or regulations, or by the CDFW or the USFWS present on the Project site or immediately surrounding areas. Therefore, construction and operation of the Project would not have an impact on any riparian habitat or other sensitive natural community. No mitigation measures are either required or recommended.

4. Biological Resources	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(c) Have a substantial adverse effect on state or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. The United States Army Corps of Engineers (Corps) regulates discharges of dredged or fill material into waters of the United States. These waters include wetlands and non-wetland bodies of water that meet specific criteria set forth in the implementing regulations for the federal Clean Water Act (CWA). The Corps’ regulatory jurisdiction pursuant to Section 404 of the CWA is founded on a connection, or nexus, between the water body in question and interstate commerce. This connection may be direct (through a tributary system linking a stream channel with traditional navigable waters used in interstate or foreign commerce) or may be indirect (through a nexus identified in the Corps regulations). To be considered a jurisdictional wetland under Section 404, an area must possess three wetland characteristics: hydrophytic vegetation, hydric soils, and wetland hydrology. Each characteristic has a specific set of criteria that must be satisfied for that particular wetland characteristic to apply.

The CDFW, under Section 1602 of the California Fish and Game Code, regulates alterations to lakes, rivers, and streams (defined by the presence of a channel bed and banks, and at least an intermittent flow of water) where fish or wildlife resources may be adversely affected. The Regional Water Quality Control Board (RWQCB) is responsible for the administration of Section 401 of the CWA, which pertains to water quality. Traditionally, the areas subject to jurisdiction of the RWQCB coincide with those of the Corps (i.e., waters of the U.S. including any wetlands). The RWQCB can also assert authority over “waters of the State” pursuant to the Porter-Cologne Water Quality Control Act, and the State wetland definition enacted in 2020 includes features that lack vegetation.

Waters of the United States is a threshold term in the CWA and establishes the scope of federal jurisdiction including Water Quality Standards, Total Minimum Daily Loads, and navigable waters. Defined more broadly than waters of the United States, waters of the State mean any surface water or groundwater, including saline waters, within the boundaries of the State. Therefore, RWQCB jurisdiction under the California Water Code is broadly construed to include all waters within the State’s boundaries, whether private or public, including waters in both natural and artificial channels.

The Project site is located within an urbanized area of the County. Based on the site reconnaissance conducted by LSA on September 13, 2019, there are no waters present on the Project site that would require compliance with Sections 404 and 401 of the CWA or Section 1602 of the California Fish and Game Code; therefore, a formal delineation of jurisdictional waters is not required for the Project site. The existing stormwater retention basin located at the northeast corner of the Project limits does not exhibit the three wetland characteristics described above to be considered a jurisdictional wetland under Section 404 of the CWA based on the evaluation performed during the site survey. In addition, the constructed, isolated basin is less than one acre in size and is currently used and maintained for stormwater retention, and therefore does not meet the definition of a water of the State. The existing detention basin is not an engineered facility and was not designed to retain a specific volume of stormwater runoff but serve to reduce runoff velocity leaving the site. Construction and operation of the Project would have no impact on State or federally protected wetlands. No mitigation measures are either required or recommended.

4. Biological Resources	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact with Mitigation Incorporated. The Project site is located in an urbanized area of the County that is developed with commercial, open space, equestrian, and residential uses associated with the Specific Plan. The Project would allow for the future development of 13 residential units in an area surrounded by existing medium-density single-family residential uses, commercial, and equestrian uses. Trees that are present on-site may provide nesting habitat for native resident and migratory bird species and/or birds of prey protected under the federal MBTA of 1918 (16 United States Code [USC] 703--711). Any activity that results in a “take” of covered birds and/or birds of prey is prohibited unless authorized by the USFWS. “Take” under the MBTA is defined by the USFWS to mean “pursue, hunt, shoot, wound, kill, trap, capture, or collect,” or to attempt to do any of these actions. Vegetation removal and grading activities have the potential to directly wound or kill nesting birds. In addition, construction-related activities have the potential to indirectly affect nesting birds outside of the direct ground disturbance areas through increased noise and vibration, which could disrupt movement, feeding, and sheltering activities. It is important to note that there are no provisions for allowing the take of migratory birds that are unintentionally killed or injured. When the nesting birds are present on a specific property, a take must be avoided and the Project Applicant will be required to reduce or eliminate disturbances at the active nesting territories or during the nesting season, which typically takes place from February 1 through August 31. Compliance with Mitigation Measure BIO-1 requires that the Project Applicant avoid disturbances near potential nesting habitat during nesting season. Additionally, compliance with Mitigation Measure BIO-2 would ensure that adverse impacts to roosting bats are avoided. Implementation of Mitigation Measures BIO-1 and BIO-2 (refer to Response 4(a) above) would reduce potential impacts to nesting birds and roosting bats to a less than significant level.

Additionally, all birds are protected under Sections 3503 and 3503.5 of the California Fish and Game Code. Under this section, it is unlawful to take, possess, or needlessly destroy any bird of prey or the nests or eggs of any kind of bird species except as otherwise provided in the California Fish and Game Code and the applicable implementing regulations. Disturbance of any active bird nest during the breeding season is prohibited by the California Fish and Game Code. Therefore, if possible, any vegetation removal should be conducted outside the avian nesting period (February 1 through August 31). If vegetation removal is to occur during the avian nesting period, a qualified biologist shall conduct nesting bird surveys prior to vegetation removal to ensure compliance with the MBTA and the California Fish and Game Code, as outlined in Mitigation Measure BIO-1. Implementation of this mitigation measure would reduce potential impacts to nesting birds to a less than significant level.

The Specific Plan identifies a wildlife movement corridor connecting the two ridgelines on the eastern and western sides of the Cañada Gobernadora valley, approximately 0.5 mile south of the Project site. The Project site itself is situated in a depressed, valley-like portion of Coto de Caza that has been developed with roadways, asphalt, parking lots, and residential neighborhoods. The area immediately surrounding the Project site lacks topographic features used by migratory wildlife, such as streamside terraces and open slopes. The Project site does not serve as a wildlife corridor because it is surrounded by urban development and is well north of the wildlife movement corridor identified in the Specific Plan. Therefore, Project construction and operation would not impact migratory wildlife corridor movements. No mitigation measures are either required or recommended.

Mitigation Measures. Refer to Mitigation Measure BIO-1, above, in Response 4(a).

4. Biological Resources	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. As previously stated, there are scattered mature California coast live oak (*Quercus agrifolia*) present on the Project site with several mature western sycamore (*Platanus racemosa*) trees also scattered throughout the Project site. California coast live oak and western sycamore were the only native vegetation observed on-site according to the site reconnaissance conducted by LSA on September 13, 2019. A full discussion of the biological resources assessment can be found in Appendix B, *Biological Resources Technical Memorandum of Findings* (LSA, May 2020 and revised April 2022).

Major Open Space Areas (Exhibit 3, Coto de Caza Specific Plan) include the Thomas F. Riley Wilderness Park located approximately 3 miles south of the Project site along with regional riding and hiking trails along Oso Parkway and the Coto de Caza Golf Course approximately 0.12 mile west of the Project site. The nearest Scenic Area is approximately 0.25 mile northwest of the

Project site and the nearest Resource Preservation Area is located approximately 0.65 mile northwest of the Project site. The Specific Plan discusses objectives to meet the General Plan¹⁹ and states a focus of dealing sensitively with natural resources in the planning and development process. Due to the Project site's distance from these Major Open Space Areas, Project implementation would not result in any physical impacts and also would be consistent with the implicit natural resources implementation policy of the Specific Plan.

Coto de Caza, Ltd., has prepared Oak Tree Preservation Guidelines for homeowners that are optional and would be implemented through an HOA.

The Natural Resources Component of the Resources Element (2005) of the County's General Plan calls for the protection of oak resources, in particular oak woodland areas. The on-site oaks are not considered a Major Oak Grove²⁰ or considered an oak woodland,²¹ nor is the site identified in the Orange County Southern Subregion Habitat Conservation Plan (HCP) as an oak woodland area. As further discussed in Response 4(f) below, Project implementation would not conflict with the applicable HCP. Therefore, because the Project would not conflict with any local policies or ordinances protecting defined oak woodland areas or oak groves, impacts to these biological resources during Project construction and operation would be less than significant. No mitigation measures are either required or recommended.

Due to proximity to the oak tree driplines during the construction phase, the proposed Project would be required to comply with County Standard Condition BIO-1, which requires the Project Applicant to demonstrate and provide a plan for protection of on-site oak trees and the off-site oak tree located within the equestrian trail easement during the construction phase of the proposed Project. No such protections are necessary for the Western sycamore.

County Standard Conditions. The following County Standard Condition is applicable to the Project:

County Standard Condition BIO-1 Oak Tree Preservation Plan. Prior to the issuance of any Grading Permits or recordation of a subdivision map which creates building sites, whichever occurs first, the Project Applicant shall obtain the approval of the Manager of Subdivision and Grading at OC Public Works, of an oak tree preservation plan for the construction phase of the Project that addresses the following construction phases: site preparation, grading, and paving.

¹⁹ Coto de Caza Specific Plan, General Plan/Specific Plan Comparison Appendix.

²⁰ Coto de Caza Specific Plan, Section 6.B.

²¹ Woodland (woodland habitats) consists of a multilayered vegetation with a canopy that is 20-80 percent tree cover. Coast live oak woodland is dominated by *Quercus agrifolia* with associated shrubs such as *Quercus berberidifolia*, *Rhamnus ilicifolia*, *Rhamnus californica*, *Heteromeles arbutifolia*, *Ribes* spp., *Sambucus mexicana*, *Symphoricarpos* spp., and *Toxicodendron diversilobum*. The herbaceous layer is composed of *Solidago californica*, *Elymus glaucus*, *Elymus condensatus*, *Melica* spp., *Stellaria* spp., *Claytonia* spp., *Bromus diandrus*, *Marah* spp., *Solanum* spp., *Phacelia* spp., and *Eucrypta crisantha*.

4. Biological Resources	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project site is located within the community of Coto de Caza, which itself is located within an area regulated by the Orange County Southern Subregion Habitat Conservation Plan (HCP). Coast live oaks are a covered species under the Orange County Southern Subregion HCP. Specifically, the Orange County Southern Subregion HCP accounts for the conservation, monitoring, and management of 69 percent of coast live oak communities within a Habitat Reserve established by the Orange County Southern Subregion HCP planning area and the management and mitigation of another 14 percent preserved through Save Our Species. The preservation of 83 percent of the live oak communities within the Orange County Southern Subregion HCP planning area is intended to offset and mitigate the anticipated future loss of the remaining 17 percent of the coast live oaks that would be impacted as a result of planned future development within the Orange County Southern Subregion HCP planning area.

The Project would be consistent with the Orange County Southern Subregion HCP as it would allow for the existing on-site oak trees to remain on the Project site. The Orange County Southern Subregion HCP also identifies the coast live oak as a species that serves as potential habitat for the pallid bat. Because pallid bat habitat, and live oaks more generally, would be preserved, future development facilitated by the Project would be consistent with the Orange County Southern Subregion HCP, resulting in less than significant impacts. No mitigation measures are either required or recommended.

In addition to establishing goals and implementation strategies aimed at protecting certain species within the Orange County Southern Subregion HCP planning area, the Orange County Southern Subregion HCP also establishes “Protected and Designated General Plan Open Space” areas. Specifically, this plan includes a designation of “Coto de Caza Open Space,” which encompasses areas within the Coto de Caza community that are targeted for the preservation of open space. The Project site is not within the designated Coto de Caza Open Space area (the nearest such area is located along Cañada Gobernadora immediately southeast of the Project site on the other side of Via Pajaro).

As depicted on Figure 13, Protected and Designated Open Space Assembled Prior to Completion of the Orange County Southern Subregion HCP, the Project site is not located within an area targeted for the preservation of open space. There are three open space areas that are part of the Orange County Southern Subregion HCP Habitat Reserve near the Project site: Chiquita Canyon Conservation Area (approximately 0.4 mile west), Thomas Riley Wilderness Park (approximately 2.4 miles southwest), and Caspers Wilderness Park (approximately 3.2 miles southeast). No other goals or provisions of the Orange County Southern Subregion HCP apply to or conflict with the Project. Therefore, construction and operation of the Project would not conflict with the Orange County Southern Subregion HCP’s goal of preserving open space within the Coto de Caza area or applicable goals or provisions, and no mitigation measures are either required or recommended.

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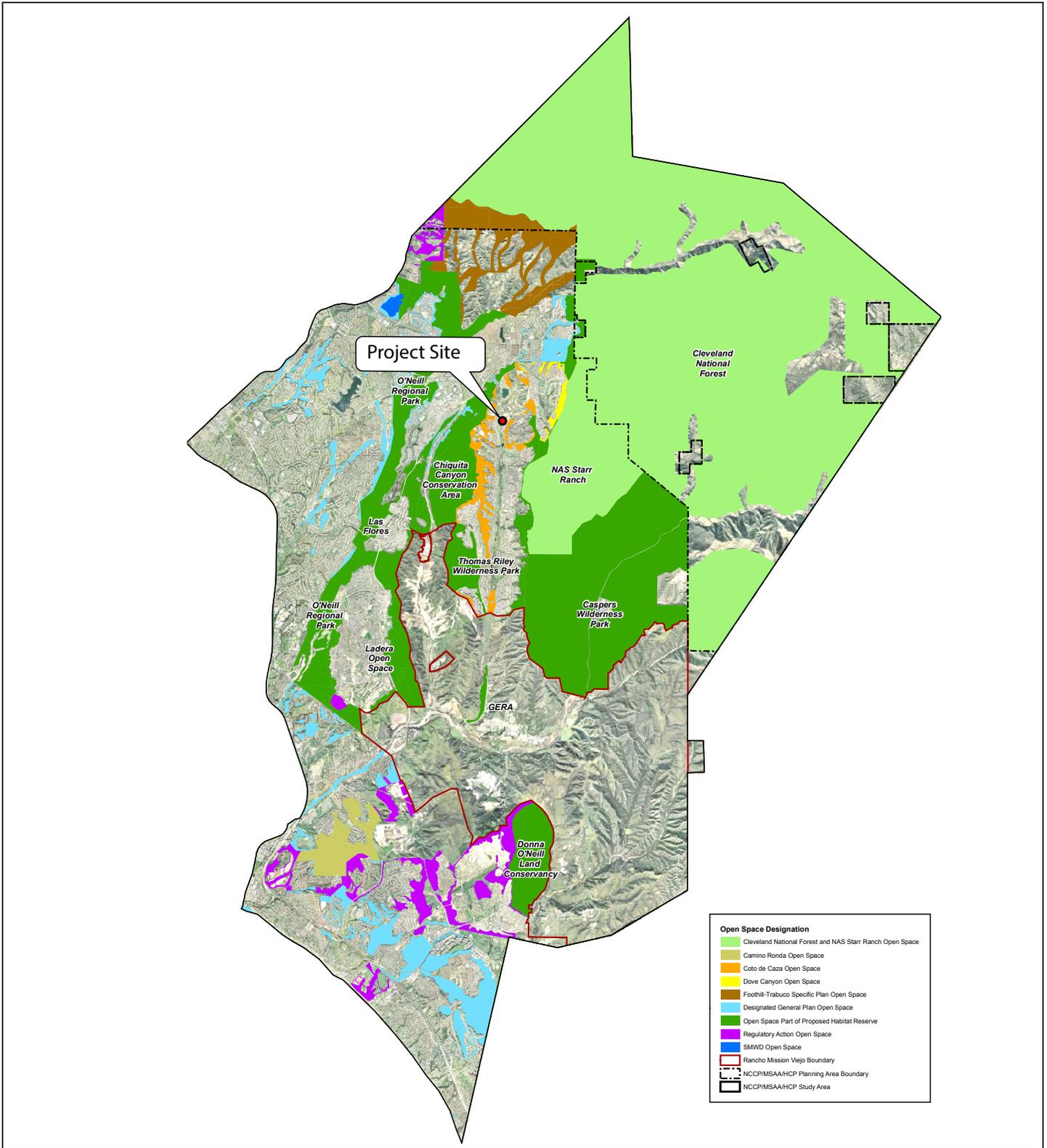
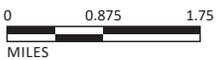


FIGURE 13

LSA



SOURCE: EDAW, 2005

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Oak Grove Residential

Protected and Designated Open Space Assembled Prior to
Completion of the Orange County Southern Subregion HCP

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5. Cultural Resources

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(a) Cause a substantial adverse change in the significance of a historical resources pursuant to §15064.5?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. CEQA defines a “historical resource” as a resource that meets one or more of the following criteria: (1) is listed in, or determined eligible for listing in, the California Register of Historical Resources; (2) is listed in a local register of historical resources as defined in PRC Section 5020.1(k); (3) is identified as significant in a historical resource survey meeting the requirements of PRC Section 5024.1(g); or (4) is determined to be a historical resource by a project’s lead agency (PRC Section 21084.1 and *CEQA Guidelines* Section 15064.5(a)). Implementation of the Project would not cause a substantial adverse change in the significance of a historical resource as defined in Section 15064.5 of the *CEQA Guidelines*.

At the time when it was surveyed for cultural resources, the Project site included the abandoned Merryhill School. Initially, the western portion of the Project site was developed with the Coto de Caza Conference Center in the 1960s, which was closed in the 1980s; and various other uses, including a church, have occupied the site. The Merryhill School buildings were constructed between 1968 and 1970 as a conference center before being converted into a private school in 1994. The school was closed in 2008 due to enrollment issues. The buildings associated with the school were modified over the years, damaged in a structural fire in 2015, and ultimately demolished by the Applicant in May 2022, pursuant to demolition permits issued by the County. The adjacent Coto Equestrian Preserve was used to host the 1984 Olympic Games modern equestrian pentathlon event where United States competitors won silver and bronze medals. The Coto Equestrian Preserve has also been used as an evacuation center for horses during wildfires and other disasters. The barn structure was demolished in 2016.

A full discussion of the cultural resources assessment can be found in Appendix C, *Cultural Resources Survey and Memorandum of Findings* (LSA, September 2019 and revised October 2022) and *Cultural Resources Memorandum of Findings* (LSA, March 2016). As discussed in the *Cultural Resources Memorandum of Findings*, a records search was conducted on February 22, 2016, at the South Central Coastal Information Center (SCCIC) of the California Historical Resources Information System (CHRIS), at California State University, Fullerton, which included the Project site and a 0.25-mile radius around the site. The records search included a review of all recorded historic and prehistoric archaeological sites within the search area and a review of known cultural resource survey and excavation reports. Additionally, the National Register of Historic Places, the California Register of Historical Resources, California Historical Landmarks, and California Points of Historical Interest as identified in the Office of Historic Preservation (OHP) Directory were examined. The records search did not identify any previously recorded prehistoric or historic resources within the Project site or within the 0.25-mile buffer. As discussed in the *Cultural Resources Survey*, a field survey was conducted by an LSA archaeologist on September 12, 2019. Notes were taken on general site conditions, soil conditions, and structures on the Project site. No cultural resources were observed during the survey. Similar to the records search, the field survey also failed to identify any historic sites within the Project site or the 0.25-mile buffer.

According to Section II.C.4: Natural Resources of the Specific Plan, cultural resources (including historic resources) within the Cañada Gobernadora Valley have already been discovered, identified, recovered, and given to appropriate agencies. Additionally, no previous structures on the Project site have been identified as historic resources by local,²² State, or federal agencies. Further, as discussed in the *Cultural Resources Survey*, the records search conducted for the Project area did not identify any previously recorded prehistoric or historic resources in the Project area, and the field survey also failed to identify any historic sites within the Project site or surrounding 0.25-mile buffer. Due to the absence of any identified or identifiable historic resources, no historic resources are present on the Project site. Therefore, construction and operation of the Project would not cause a substantial adverse change in the significance of a historical resource. No mitigation measures are either required or recommended.

5. Cultural Resources	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(b) Cause a substantial adverse change in the significance of an archaeological resources pursuant to §15064.5?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. A full discussion of the cultural resources assessment can be found in Appendix C, *Cultural Resources Survey and Memorandum of Findings* (LSA, September 2019 and revised October 2022) and *Cultural Resources Memorandum of Findings* (LSA, March 2016). The results of the records search indicate that the Project site and adjacent Coto Equestrian Preserve have been previously surveyed. According to the records search results, there are no previously recorded cultural resources within the boundaries of the Project site and the OHP Directory listed no properties within or near the Project site. Only one previously recorded site was documented near the Project site, but beyond the 0.25-mile buffer surrounding the Project site. That single, identified resource is P-30-562 and contained eight ground and flaked stone tools on a knoll northeast of the equestrian preserve, but beyond the 0.25-mile buffer surrounding the Project site.²³

In addition, Final EIR 401 contains a thorough assessment of potential impacts to archaeological and paleontological resources. A total of 24 archaeological sites and numerous isolated artifacts were identified within Coto de Caza. None of those previously identified archaeological sites are located on the Project site or within the surrounding 0.25-mile buffer. The Project site is not located within the County’s General Plan Archaeological Sensitivity areas as an area known for containing archaeological resources.

Although Project implementation would require cut and fill of soils, significant impacts to cultural resources would not result because there are no known or expected cultural resources on the Project site or within the surrounding 0.25-mile buffer area. Several mitigation measures were identified in

²² County of Orange, OC Parks, Historic Sites. Website: <http://ocparks.com/historic> (accessed September 21, 2016). Preserve Orange County. Website: [Preserve Orange County Map \(preserveoc.org\)](http://preserveoc.org) (accessed April 25, 2022).

²³ Leonard, N. 1974. University of California Archaeological Site Survey Record for Site 30-000562. On file, South Central Coastal Information Center, California State University, Fullerton.

Final EIR 401 to address potential impacts to cultural resources, including grading observation pursuant to the County's standard conditions. In accordance with the findings adopted by the Orange County Board of Supervisors for the Specific Plan, future development within the area is subject to the standard conditions imposed by the County, which include observation by a qualified archaeologist, as indicated below, to address any unexpected cultural resources that could be encountered during Project construction. Therefore, with implementation of County Standard Condition CUL-1, less than significant impacts to cultural resources would occur during Project construction and operation. No mitigation measures are either required or recommended.

County Standard Conditions. The following County Standard Condition is applicable to the Project:

County Standard Condition CUL-1 Archaeological Grading Observation and Salvage. Prior to the issuance of any Grading Permit, the Project Applicant shall provide written evidence to the Manager, Subdivision and Grading, that the Project Applicant has retained a County-certified archaeologist, to observe grading activities and salvage and catalogue archaeological resources as necessary. The archaeologist shall be present at the pre-grade conference, shall establish procedures for archaeological resource surveillance, and shall establish, in cooperation with the Project Applicant, procedures for temporarily halting or redirecting work to permit the sampling, identification, and evaluation of the artifacts as appropriate. If the archaeological resources are found to be significant, the archaeological observer shall determine appropriate actions, in cooperation with the Project Applicant, for exploration and/or salvage.

Prior to the release of the grading bond, the Project Applicant shall obtain approval of the archaeologist's follow-up report from the Manager, Orange County Permit Services. The report shall include the period of inspection, an analysis of any artifacts found and the present repository of the artifacts. The Project Applicant shall prepare excavated material to the point of identification. The Project Applicant shall offer excavated finds for curatorial purposes to the County of Orange, or its designee, on a first refusal basis. These actions, as well as final mitigation and disposition of the resources, shall be subject to the approval of the Manager, Orange County Permit Services. The Project Applicant shall pay curatorial fees if an applicable fee program has been adopted by the Board of Supervisors, and such fee program is in effect at the time of presentation of the materials to the County of Orange or its designee, all in a manner meeting the approval of the Manager, Orange County Permit Services.

5. Cultural Resources	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(c) Disturb any human remains, including those interred outside of formal cemeteries?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. As previously mentioned, the records search conducted at the SCCIC revealed no cultural resources documented in the Project site, and no cultural resources or indicia were observed during the pedestrian survey of the Project area. Therefore, compliance with Regulatory Requirement CUL-1 ensures that potential impacts related to unknown remains would be less than significant. No mitigation measures are either required or recommended.

Regulatory Requirements: The following regulatory requirements are applicable to the Project:

Regulatory Requirement CUL-1 The Project would be required to comply with the applicable provisions of the California Health and Safety Code Section 7050.5, which requires that no further disturbance occur in the event of a discovery or recognition of any human remains on-site and that the County Coroner be notified immediately. If the remains are determined to be of Native American descent, the County Coroner will notify the Native American Heritage Commission (NAHC), which will determine and notify a Most Likely Descendant (MLD) and potentially inspect the site of the discovery. Upon completion of the assessment, consulting archaeologists would prepare a report documenting the methods and results regarding the treatment of the remains.

6. Energy

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(a) Result in a potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources during project construction or operation?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Discussion:

The Project would increase the demand for electricity, natural gas, and gasoline. The discussion and analysis provided below are based on data included in the *CalEEMod Air Quality and Greenhouse Gas Emissions Modeling Output*, which is included in Appendix A-1 of this IS/MND.

Less than Significant Impact.

Construction Energy Use. The estimated construction schedule assumes that the Project would be built over approximately 13 months. The Project construction would involve site preparation, grading, building construction, paving, and architectural coating.

Energy would be consumed during construction and operation of the Project. Construction would require energy for the manufacture and transportation of building materials, preparation of the site for grading activities, building construction, paving, and architectural coating. Petroleum fuels (e.g., diesel and gasoline) would be the primary sources of energy for these activities. However, energy usage on the Project site during construction would be temporary in nature and only utilize the energy sources required to complete the construction; no energy usage would be used for any other purposes. As a result, energy usage would not be wasteful, inefficient, or unnecessary. Therefore, construction energy impacts would be less than significant, and no mitigation is required.

Operational Energy Use. The Project includes the future development of 13 single-family residential units on the Project site. During Project operation, electricity would be the main form of energy consumed on the site. Electricity would be used for building heating and cooling, lighting, and water heating. The Project will include rooftop photovoltaic (PV) solar energy panels on homes as required under the 2019 Building Energy Efficiency Standards. When accounting for the electricity generated by the solar PV system, single-family homes would use 53 percent less energy compared to homes built to the 2016 standards (which is used as an electricity control measure in version 2016.3.2 of the CalEEMod model). Table I, *Estimated Annual Energy Use of the Proposed Project*, presents the energy use of the Project.

Table I: Estimated Annual Energy Use of the Proposed Project

Land Use	Electricity Use (kWh per year)	Natural Gas Use (Btu per year)	Gasoline (gallons per year)
13 Single Family Units	104,241	335,464	181,490

Source: California Emissions Estimator Model (CalEEMod). Compiled by LSA (May 2020).
Btu = British thermal units
kWh = kilowatt hours

As shown in Table I, *Estimated Annual Energy Use of the Proposed Project*, proposed uses on the site would use a total of 104,241 kilowatt hours (kWh) of electricity per year. The Project would use 335,464 British thermal units (Btu) of natural gas use on an annual basis. In addition, the Project would result in energy usage associated with motor vehicle gasoline to fuel project-related trips. The Project would result in 124 net new daily trips and would have an annual total of vehicle miles traveled (VMT) of 419,670 based on the modeling performed with CalEEMod. Using the 2015 fuel economy estimate of 22 miles per gallon (mpg), the Project would result in the use of approximately 19,075 gallons of gasoline per year.²⁴

The State of California provides a minimum standard for building design and construction standards through Title 24 of the California Code of Regulations (CCR), known as the California Building Code (CBC). The CBC is updated every 3 years, and the current 2019 CBC went into effect in January 2020. Compliance with Title 24 is mandatory at the time new building permits are issued by local governments. The California Building Standards Commission (CBSC) adopted Part 11 of the Title 24 Building Energy Efficiency Standards (also referred to as the California Green Building Standards Code, or CalGreen) in 2010 as part of the State's efforts to reduce GHG emissions and reducing energy consumption from residential and non-residential buildings. CalGreen covers the following five categories: (1) planning and design, (2) energy efficiency, (3) water efficiency and conservation, (4) material conservation and resource efficiency, and (5) indoor environmental quality. The County has adopted both the CBC and CalGreen as part of Chapter 14, Building and Building Regulations, of the County of Orange Codified Ordinances. The projected energy use of the Project is representative of a worst-case scenario because the estimates do not account for energy efficiency measures that would be incorporated into the Project. The Project would comply with the CalGreen Code requirements and Title 24 efficiency standards (including the installation of the rooftop PV solar energy panels), which would further improve the energy efficiency of the Project.

Electricity is provided through a complex grid of power plants and transmission lines. In 2018, California's in-state electric generation totaled 194,842 gigawatt-hours (GWh); the State's total system electric generation, which includes net imported electricity, totaled 285,488 GWh.²⁵ Population growth is the primary source of increased energy consumption in the State; due to population projections, annual electricity use would increase by approximately 1 percent per year through 2030.²⁶ The Project's net electricity usage would total less than 0.01 percent²⁷ of electricity generated in the State in 2018, which would not represent a substantial demand on available electricity resources.

The average fuel economy for light-duty vehicles (autos, pickups, vans, and SUVs) in the United States has steadily increased from about 14.9 mpg in 1980 to 22.0 mpg in 2015.²⁸ Federal fuel economy standards have changed substantially since the Energy Independence and Security Act was passed in 2007, which originally mandated a national fuel economy standard of 35 mpg by the

²⁴ 419,670 VMT per year/22 mpg = 19,075 gallons of gasoline per year

²⁵ California Energy Commission (CEC). 2018 Total System Electric Generation. Website: 2018 Total System Electric Generation (ca.gov) (accessed December 2021).

²⁶ California Energy Commission. California Energy Demand 2018-2030 Revised Forecast. Website: 2019 IEPR Workshops, Notices and Documents (ca.gov) (accessed December 2021).

²⁷ Calculation: 0.10 GWh (Project) / 194,842 GWh (generated in State in 2018) = < 0.01 percent.

²⁸ U.S. Department of Transportation. "Table 4-23: Average Fuel Efficiency of U.S. Light Duty Vehicles." Website: https://www.bts.gov/archive/publications/national_transportation_statistics/table_04_23/ (accessed September 2019).

year 2020 and would be applicable to cars and light trucks of Model Years 2011 through 2020.²⁹ As stated previously, implementation of the Project would increase the project-related annual gasoline demand by 19,075 gallons. However, new automobiles purchased by residences driving to and from the Project site would be subject to fuel economy and efficiency standards applied throughout the State. As such, the fuel efficiency of vehicles associated with the Project site would increase throughout the life of the Project. Therefore, implementation of the Project would not result in a substantial increase in transportation-related energy uses.

In summary, construction and operation of the Project would not result in a potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources. Consumption of energy resources as a result of implementation of the Project would be comparable to other residential developments in the County. Impacts would be less than significant. No mitigation measures are either required or recommended.

6. Energy	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(b) Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Refer to Response 6(a) above. As previously stated, the Project would be required to comply with CalGreen, which includes provisions related to house insulation and rooftop PV solar energy panels aimed at minimizing energy consumption. The Project would also be consistent with Goal 1 in the Energy Resources Component of the Orange County General Plan Resources Element. Therefore, the Project would be consistent with applicable plans related to renewable energy and energy efficiency. Impacts during Project construction and operation would be less than significant. No mitigation measures are either required or recommended.

²⁹ U.S. Department of Energy. “Energy Independence & Security Act of 2007.” Website: <https://www.afdc.energy.gov/laws/eisa> (accessed September 2019).

7. Geology and Soils

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(a) Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:				
(i) Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project site is in a seismically active area. There are, however, no known active or potentially active faults or fault traces on the Project site or in the immediate vicinity of the Project. The Project site is not located within a currently designated Alquist-Priolo Earthquake Fault Zone. According to the Specific Plan, two known local fault traces cross the Specific Plan area near the eastern border³⁰; however, these fault traces are considered inactive. According to the County’s General Plan Safety Element (2005), the closest fault line, the Willard fault within the Temecula section of the Elsinore fault zone, is approximately 10 miles northeast of the Project site and the nearest active fault is the Whittier Fault, located approximately 12 miles to the northeast of the Project site. The Whittier fault, a westward continuation of the Elsinore Fault, which trends along the northeast side of the Santa Ana Mountains, is considered moderately active. Additionally, the Project site is within the vicinity of two pre-Quaternary faults, the Mission Viejo Fault and the Cristianitos Fault.³¹ However, these faults are more than 1.6 million years old and are considered inactive. Therefore, the Project would not directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death from the rupture of a known earthquake fault as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map, and impacts during Project construction and operation would be less than significant. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
7. Geology and Soils				
Would the project:				
(a)(ii) Strong seismic ground shaking?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Although there are no known active faults crossing the Project site, the Project site, as is common throughout Southern California, is in a seismically active region. As discussed above, the nearest active fault is the Whittier Fault, which is considered moderately active. Most recorded shocks along the Elsinore Fault line range from 4.0 to 5.0 magnitude.

³⁰ The Coto de Caza Specific Plan does not specifically identify the exact location in relation to the eastern border.

³¹ California Department of Conservation. 2015. Fault Activity Map of California. Website: <http://maps.conservacion.ca.gov/cgs/fam/> (accessed September 16, 2019).

Although the Whittier Fault is the closest known active fault to the Project site, there is speculation that the San Joaquin Hills Blind Thrust (SJHBT) is located approximately 5 miles from the Project site. The precise location of the SJHBT has not been confirmed, and it is not included on any Alquist-Priolo Earthquake Fault Zone map. The SJHBT is estimated to be capable of generating a maximum earthquake magnitude of 6.6 and peak ground acceleration of 0.36g.³²

Earthquake-generated ground shaking is the most pervasive and critical earthquake factor in the County and Southern California region. Ground shaking is the earthquake effect that results in most of the damage. There are no known active faults on or in the vicinity of the Project site, and therefore, the potential for ground rupture is low. However, because the subject property is located within 12 miles from the Whittier Fault, the Project site is subject to potential impacts related to ground shaking in the event of an earthquake along the Whittier Fault. All future structures will be constructed in compliance with the most current CBC and designed to comply with seismic standards. Furthermore, the Project would be required to prepare a site-specific geotechnical report to analyze on-site geologic and seismic conditions and potential geologic and seismic impacts of the Project, consistent with the County Standard Condition GEO-1 of the County’s Standard Conditions of Approval Manual. Adherence with CBC requirements and recommendations outlined in the site-specific geologic report, construction and operation of the Project would result in less than significant impacts related to strong seismic ground shaking. No mitigation measures are either required or recommended.

County Standard Condition. The following County Standard Condition is applicable to the Project:

County Standard Condition GEO-1 Geology Report. Prior to the issuance of a Grading Permit, the Project Applicant shall submit a final geotechnical report to the Manager, Subdivision and Grading, for approval. The report shall include the information required to address seismic and geologic hazards and be in the form as required by the OC Grading Manual and OC Grading and Excavation Code.

7. Geology and Soils	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(a)(iii) Seismic-related ground failure, including liquefaction?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Liquefaction most commonly occurs when three conditions are present simultaneously: (1) high groundwater; (2) relatively loose, cohesionless (sandy) soil; and (3) earthquake-generated seismic waves. The presence of these conditions has the potential to result in a loss of shear strength and ground settlement, causing the soil to behave as a fluid for a short period of time.

³² Peak ground acceleration can be expressed as “g” (g-force), or the acceleration due to Earth’s gravity.

According to the County’s General Plan Safety Element (2005) Figure IX-12, the Project site is located within an area with low liquefaction potential. Although impacts related to liquefaction would be less than significant because the potential for liquefaction is low, the Project would be designed in compliance with the most current CBC to ensure that structures comply with seismic standards. Furthermore, the Project would adhere to recommendations outlined in the site-specific geologic report, which include adhering to the requirements of Special Publication 117A “Guidelines for Evaluating and Mitigation Seismic Hazards in California” (California Geologic Survey 2008), as required by County Standard Condition GEO-1. Therefore, impacts during Project construction and operation are less than significant. No mitigation measures are either required or recommended.

County Standard Condition. Refer to County Standard Condition GEO-1, above, in Response 7(a)(ii).

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
7. Geology and Soils				
Would the project:				
(a)(iv) Landslides?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Landslides are most common where slopes are steep, soils are weak, and groundwater is present. According to the County’s General Plan Seismic Safety Element (2005) and the Specific Plan (1995), the Project site does not lie within an area with a high potential for landslides and on-site slide areas do not pose constraints to future development. The Project site is relatively level, and no soils would be imported or exported to create an even grade for redevelopment. Because the Project does not require any significant grading activities, and no new slopes would be created minimizing the already low potential for landslides to occur, impacts related to landslides during Project construction and operation would be less than significant. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
7. Geology and Soils				
Would the project:				
(b) Result in substantial soil erosion or the loss of topsoil?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project site contains a maintenance building/hay barn, two round pen enclosures, various utility apparatuses, and exposed soil. During construction activities, there would be an increased potential for soil erosion. However, since the Project site is level, soil erosion would be controlled with the stormwater conveyance facilities incorporated into the Project design. Refer to the Stormwater Conveyance discussion in the Project Description section. Furthermore, the exposure of soils during construction would be short term and subject to requirements established by the National Pollutant Discharge Elimination Systems (NPDES) (refer to County Standard Condition HYD-1, in Response 10(a), Hydrology and Water Quality, below) to avoid and minimize any potential impacts to water quality. Once developed, the Project would result in an increase in the impervious area on-site (from approximately 1.0 acre [20 percent] to 3.1

acres [60 percent]). Future Project implementation would not increase the volume of runoff from the Project site because the Project would include perimeter drainage devices and landscaped pervious surfaces intended to capture stormwater runoff, including an underground infiltration reservoir (refer to the discussion in Section 10, Hydrology and Water Quality, for more information regarding stormwater runoff). The combined increase in impervious surfaces and increase in landscaped surfaces will anchor soil and prevent erosion during the operational phase of the Project. Therefore, potential impacts due to soil erosion and loss of topsoil during Project construction and operation would be less than significant. No mitigation measures are either required or recommended.

County Standard Condition. Refer to County Standard Condition HYD-1 in Response 10(a), below.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
7. Geology and Soils				
Would the project:				
(c) Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The site is level and does not contain any slopes, as discussed in Response 7(a)(iv), above. Liquefaction impacts were determined to be less than significant and did not require mitigation (refer to Response 7(a)(iii) above). Potential impacts related to unstable soil, on- or off-site landslides, lateral spreading, subsidence, liquefaction, or collapse will be minimized by grading slopes with a mixture of compacted sand, silt, and clay soils, which are relatively resistant to erosion. Furthermore, development proposed as part of the Project would be required to comply with recommendations and measures contained in the site-specific geology report to be prepared as required by County Standard Condition GEO-1 and would also be required to comply with the 2019 CBC, which has provisions relating to seismic safety. Therefore, impacts related to landslide, lateral spreading, subsidence, liquefaction, and collapse during Project construction and operation would be less than significant. No mitigation measures are either required or recommended.

County Standard Condition. Refer to County Standard Condition GEO-1 in Response 7(a)(i), above.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
7. Geology and Soils				
Would the project:				
(d) Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Expansive soils are characterized by their ability to undergo substantial volume changes (shrink or swell) due to variations in moisture content as a result of precipitation, landscape irrigation, utility leakage, roof drainage, perched groundwater, drought, or other factors.

According to the Specific Plan (1995), the overall geologic structure of Coto de Caza is relatively free of major constraints and the soil characteristics are generally favorable for most forms of development. Due to the site’s former development of the Merryhill School and equestrian facilities, on-site soils largely consist of non-native soils that may have the potential for expansion. Any soils moved on-site will be compacted as recommended by the geotechnical study and in accordance with County Building Codes, as required by County Standard Condition GEO-1. Therefore, with adherence to these standards, impacts related to the potential for expansive soils on the Project site during construction and operation are less than significant. No mitigation measures are either required or recommended.

County Standard Condition. Refer to County Standard Condition GEO-1 in Response 7(a)(i), above.

7. Geology and Soils	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(e) Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. The Project would not use septic tanks or alternative wastewater disposal systems. Further, Coto de Caza is currently served by an existing sewer system, and has no need for septic tanks or other alternative wastewater systems. The Project, similar to the previous Merryhill School use, also proposes to connect to the existing sanitary sewer and wastewater facilities, including a new connection to the existing sewer line underlying Vista del Verde. Therefore, no impacts related to the use of a septic tank or alternative system would occur during Project construction and operation. No mitigation measures are either required or recommended.

7. Geology and Soils	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(f) Directly or indirectly destroy a unique paleontological resource or site of unique geologic feature?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. A locality search of the paleontological records maintained at the Natural History Museum of Los Angeles County (LACM) was conducted in March 2016, with findings included in the *Paleontological Resources Assessment* (memorandum revised August 2021) and provided in Appendix D of this IS/MND. According to the LACM locality search, there

are no known fossil localities within the boundaries of the Project site. According to geologic mapping, the Project area is underlain by Young Axial Channel Deposits, which have low paleontological sensitivity from the surface to a depth of 10 ft and high sensitivity below that depth. The closest locality is LACM 4119, which was found in an unnamed Pleistocene geologic unit near Jeronimo Open Space, which is located southwest of the Project area. This locality produced a fossil specimen of bison from a depth of 20 ft below the surface. The next closest locality from similar deposits is LACM 1215, also located southwest of the Project area near the intersection of Crown Valley Parkway and Interstate 5. This locality yielded fossil teeth of sharks (Chondrichthyes) and mammals (Mammalia). Although not mapped, Artificial Fill is likely also present at the surface of the Project site due to previous development of the Merryhill School and equestrian facilities associated with the Coto Equestrian Preserve. Artificial Fill has no paleontological sensitivity.

Pedestrian field surveys of the Project site were conducted by an LSA Senior Cultural Resources Manager on March 1, 2016 and on September 12, 2019. The field surveys involved linear transects over the Project area to document and collect any paleontological resources that may have been present as well as to note the sediments at the surface. According to the 2016 field survey, approximately 20 percent of the Project site contained exposed ground that could be surveyed. The Project site appeared to be 100 percent disturbed due to previous grading from development of the former Merryhill School, parking areas, and previous equestrian facilities. The sediments observed consist primarily of a brown sandy loam alluvium with a few rounded cobbles and boulders scattered about. The observed sediments are consistent with the Young Axial Channel Deposits that are mapped in the Project area. The 2019 field survey revealed similar conditions. During this survey, ground visibility ranged from 0-70 percent in leaf-covered areas and exceeded 90 percent in open areas. The sediments observed consisted of silt loam, with little rock or gravel. Discarded and fragmented wood, concrete, and bits of metal and plastic indicated that the area once contained a built-environment. No paleontological resources were observed during the 2016 or the 2019 field survey.

As previously stated, no significant paleontological resources were identified directly within the Project area during the locality search or field survey. However, the results of the locality search and literature review indicate that the Project area contains Holocene to late Pleistocene Axial Channel Deposits, which have low paleontological sensitivity from the surface to a depth of 10 ft and high paleontological sensitivity below that depth. Because excavation during the course of the Project is not expected to exceed a depth of 7 ft, it will not reach the deposits with high paleontological sensitivity. In the unlikely event that fossil remains are encountered, adherence to County Standard Conditions A06 and A07 would be required. These measures include paleontological monitoring, collection of observed resources, preservation, stabilization and identification of collected resources, curation of resources into a museum repository, and preparation of a monitoring report of findings. If Project plans change to include more substantial excavation that extends below a depth of 10 ft or additional areas, future mitigation measures may be required. The County provides regulations for protection, assessment, and mitigation of fossil resources within unincorporated areas of the County in its Standard Conditions of Approval GEO-2 and GEO-3. Therefore, impacts to paleontological resources or unique geological features during Project construction and operation would be less than significant. No mitigation measures are either required or recommended.

County Standard Conditions. In the event excavation or grading exceeds a depth of 10 ft below ground surface, the following County Standard Conditions are applicable to the Project:

County Standard Condition GEO-2 Paleontological Pregrade Salvage. Prior to the issuance of any Grading Permit, the Project Applicant shall obtain approval from Manager, HBP/Coastal and Historical Facilities, of a report of the pre-grade paleontological salvage operation. The Project Applicant shall retain a County-certified paleontologist to conduct pregrade salvage excavation and prepare a report of the exposed resources. The report shall include methodology, an analysis of artifacts found, a catalogue of artifacts, and their present repository. The Project Applicant shall prepare excavated materials to the point of identification. The Project Applicant shall offer excavated finds for curatorial purposes to the County of Orange, or its designee, on a first refusal basis. The Project Applicant shall pay curatorial fees if an applicable fee program has been adopted by the Board of Supervisors, and such fee program is in effect at the time of presentation of the materials to the County of Orange or its designee, all in a manner meeting the approval of the Manager, HBP/Coastal and Historical Facilities.

County Standard Condition GEO-3 Paleontological Observance and Salvage. Prior to the issuance of any Grading Permit, the Project Applicant shall provide written evidence to the Manager, Subdivision and Grading, that the Project Applicant has retained a County certified paleontologist to observe grading activities and salvage and catalogue fossils as necessary. The paleontologist shall be present at the pre-grade conference, shall establish procedures for paleontological resource surveillance, and shall establish, in cooperation with the Project Applicant, procedures for temporarily halting or redirecting work to permit sampling, identification, and evaluation of the fossils. If the paleontological resources are found to be significant, the paleontologist shall determine appropriate actions, in cooperation with the Project Applicant, which ensure proper exploration and/or salvage.

Prior to the release of the grading bond, the Project Applicant shall submit the paleontologist's follow up report for approval by the Manager, HBP/Coastal and Historical Facilities. The report shall include the period of inspection, a catalogue and analysis of the fossils found, and the present repository of the fossils. The Project Applicant shall prepare excavated material to the point of identification. The Project Applicant shall offer excavated finds for curatorial purposes to the County of Orange, or its designee, on a first refusal basis. These actions, as well

as final mitigation and disposition of the resources, shall be subject to approval by the HBP/Coastal and Historical Facilities. The Project Applicant shall pay curatorial fees if an applicable fee program has been adopted by the Board of Supervisors, and such fee program is in effect at the time of presentation of the materials to the County of Orange or its designee, all in a manner meeting the approval of the Manager, HBP/Coastal and Historical Facilities.

8. Greenhouse Gas Emissions

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(a) Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Discussion:

Global climate change describes alterations in weather features (e.g., temperature, wind patterns, precipitation, and storms) that occur across the Earth as a whole. Global temperatures are modulated by naturally occurring components in the atmosphere (e.g., water vapor, carbon dioxide [CO₂], methane [CH₄], and nitrous dioxide [N₂O]) that capture heat radiated from the Earth’s surface, which in turn warms the atmosphere. This natural phenomenon is known as the “greenhouse effect.” Despite the fact that this is a naturally occurring phenomenon, excessive human-generated greenhouse gas (GHG)³³ emissions can and are altering the global climate. The principal GHGs of concern contributing to the greenhouse effect are CO₂, CH₄, N₂O, hydrofluorocarbons (HFCs), perfluorocarbons (PFCs), and sulfur hexafluoride (SF₆). Water vapor is the largest naturally occurring GHG; however, it is not identified as an anthropogenic constituent of concern. The discussion and analysis provided below are based on data included in the *CalEEMod Air Quality and Greenhouse Gas Emissions Modeling Output*, which is included in Appendix A-1 of this IS/MND.

Neither the CEQA statutes, the California Office of Planning and Research (OPR) guidelines, or the *CEQA Guidelines* currently prescribe specific quantitative thresholds of significance or a particular methodology for conducting an impact analysis related to GHG effects on global climate. Rather, as with most environmental topics, significance criteria are left to the judgment and discretion of the lead agency.

Currently, there is no Statewide GHG emissions threshold that has been used to determine the potential GHG emissions impacts of a project. Thresholds and methodology are still being developed and revised by air quality districts in the State. Therefore, this environmental issue remains unsettled and must be evaluated on a case-by-case basis until the South Coast Air Quality Management District (SCAQMD) adopts significance thresholds and GHG emissions impact methodology. In the absence of a Climate Action Plan for the County, SCAQMD thresholds, when adopted, would apply to future development within the County.

To provide guidance to local lead agencies on determining significance for GHG emissions in their CEQA documents, SCAQMD convened a GHG CEQA Significance Threshold Working Group (Working Group).³⁴ This Working Group proposed a tiered approach for evaluating GHG

³³ The principal GHGs of concern contributing to the greenhouse effect are CO₂, CH₄, N₂O, HFCs, PFCs, and SF₆. Water vapor is the largest naturally occurring GHG; however, it is not identified as an anthropogenic constituent of concern.

³⁴ SCAQMD. *Greenhouse Gases (GHG) CEQA Significance Thresholds*. Website: <http://www.aqmd.gov/docs/default-source/ceqa/handbook/scaqmd-air-quality-significance-thresholds.pdf?sfvrsn=2> (accessed September 2019).

emissions for development projects for which SCAQMD is not the lead agency. In the absence of any further guidance from SCAQMD since this proposal in 2008, these draft interim proposed GHG emissions thresholds are used in this analysis. The applicable tier for this Project is Tier 3; if GHG emissions are less than 3,000 metric tons (MT) of carbon dioxide equivalents (CO₂e) per year, Project-level and cumulative GHG emissions are considered less than significant (refer to Figure 14, *Tiered Decision Approach to GHG Methodology and Significance Thresholds*). CO₂e is the shorthand for carbon dioxide equivalents. It is the standard unit in carbon accounting to quantify GHG emissions, emissions reductions, and carbon credits.

Individual GHGs have varying global warming potentials and atmospheric lifetimes. Because it is not possible to tie specific GHG emissions by an individual project to actual changes in climate, this evaluation focuses on the Project's emissions of GHGs as a whole in terms of CO₂e, or the global warming potential of the total project GHG emissions. CO₂e is a consistent methodology for comparing GHG emissions because it normalizes various GHGs to the same metric. GHG emissions are typically measured in terms of MT of "CO₂ equivalents" (CO₂e). Therefore, for the purpose of this technical analysis, the concept of CO₂e is used to describe how much global climate change a given type and amount of GHG may cause, using the functionally equivalent amount or concentration of CO₂ as the reference. The GHG emissions estimates were calculated using CalEEMod Version 2016.3.2.

The 2019 Building Energy Efficiency Standards, which were adopted on May 9, 2018, became effective on January 1, 2020. The 2019 standards move towards cutting energy use in new homes by more than 50 percent and require installation of solar photovoltaic systems for single-family homes and multi-family buildings of 3 stories and less. Four key areas the 2019 standards focus on include: (1) smart residential photovoltaic systems; (2) updated thermal envelope standards (preventing heat transfer from the interior to exterior and vice versa); (3) residential and non-residential ventilation requirements; (4) and non-residential lighting requirements.³⁵ Under the 2019 standards, non-residential buildings will be 30 percent more energy efficient compared to the 2016 standards while single-family homes will be 7 percent more energy efficient.³⁶ When accounting for the electricity generated by the solar photovoltaic system, single-family homes would use 53 percent less energy compared to homes built to the 2016 standards.

Less than Significant Impact. Construction and operation of the Project would generate GHG emissions, with the majority occurring during the Project's operations.

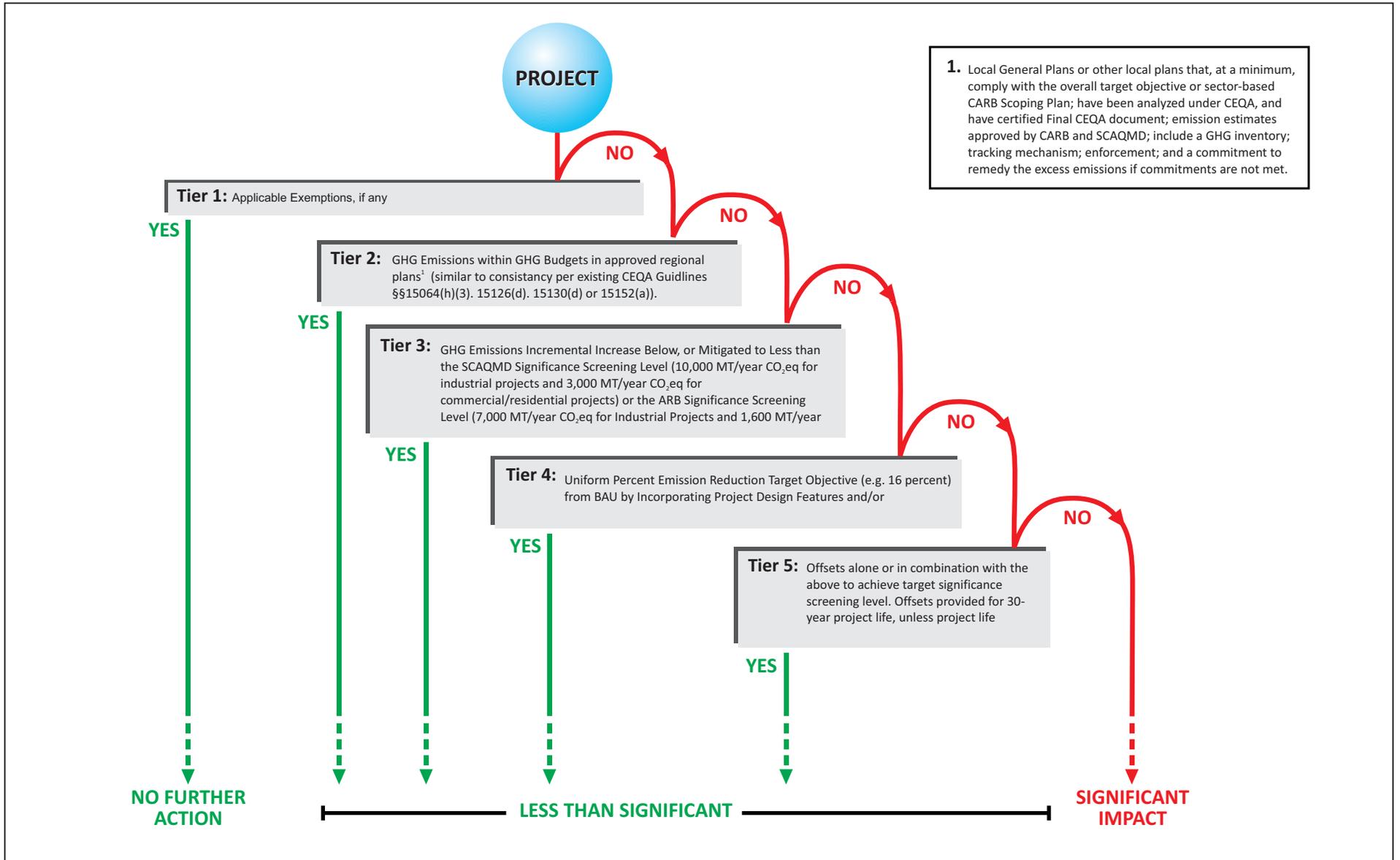
Overall, the following activities associated with the Project could directly or indirectly contribute to the generation of GHG emissions:

- **Construction Activities:** GHGs would be emitted through the operation of construction equipment and from worker and supply vendor vehicles, each of which typically uses fossil-based fuels to operate. The combustion of fossil-based fuels creates GHGs such as CO₂, CH₄, and N₂O.

³⁵ California Energy Commission (CEC). 2018b. News Release: Energy Commission Adopts Standards Requiring Solar Systems for New Homes, First in Nation. Energy Commission Adopts Standards Requiring Solar Systems for New Homes, First in Nation (ca.gov) (accessed September 2019).

³⁶ CEC. 2018a. 2019 Building Energy Efficiency Standards Frequently Asked Questions. 2019 Energy Code FAQs (ca.gov) (accessed September 2019).

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- **Gas, Electricity and Water Use:** Natural gas use results in the emission of two GHGs: CH₄ (the major component of natural gas) and CO₂ (from the combustion of natural gas). Electricity use can result in GHG production if the electricity is generated by combusting fossil fuel. California's water conveyance system is energy-intensive, involving the consumption of both electricity and natural gas.³⁷
- **Solid Waste Disposal:** Solid waste (e.g., green waste, trash from receptacles, and construction waste) generated by the Project could contribute to GHG emissions in a variety of ways. Landfilling and other methods of disposal use energy for transporting and managing the waste, resulting in the production of additional GHGs to varying degrees. Landfilling, the most common waste management practice, results in the release of CH₄ from the anaerobic decomposition of organic materials. CH₄ is 25 times more potent a GHG than CO₂. However, landfill methane (CH₄) can also be a source of energy. In addition, many materials in landfills do not decompose fully, and the carbon that remains is sequestered in the landfill and not released into the atmosphere; in other words, the carbon trapped in the landfill does not contribute to GHG emissions.
- **Motor Vehicle Use:** Transportation associated with the Project (trips to and from the Project) would result in GHG emissions from the combustion of fossil fuels in daily automobile trips.

Construction GHG Emissions. GHG emissions associated with the Project would occur over the short term from construction activities, consisting primarily of emissions from equipment and vehicle exhaust. The calculation presented below includes construction emissions in terms of CO₂ and annual CO₂e GHG emissions from increased energy consumption, water usage, and solid waste disposal during the construction phase.

GHG emissions generated by the Project during the construction phase would predominantly consist of CO₂. In comparison to criteria air pollutants such as O₃ and PM₁₀, CO₂ emissions persist in the atmosphere for a substantially longer time. While emissions of other GHGs, such as CH₄, are important with respect to global climate change, emission levels of other GHGs are less dependent on the land use and circulation patterns associated with the proposed land use development Project than are levels of CO₂.

Construction activities produce combustion emissions from various sources such as demolition, site preparation, grading, building construction, architectural coatings, paving, on-site construction vehicles, equipment hauling materials to and from the site, and motor vehicles transporting the construction crew. Off-road construction equipment consists of rubber tired dozers, tractors, backhoes, excavators, graders, cranes, forklifts, generators, welders, paving equipment, rollers, and air compressors. Construction personnel trips are estimated at 54 daily trips. Exhaust emissions from on-site construction activities would vary daily as construction activity levels change. Table J, *Project Construction Greenhouse Gas Emissions*, presents the annual construction emissions based on the CalEEMod (version 2016.3.2) emission estimates using the default input assumptions. Results indicate that Project implementation would generate a total of 345.77 MT of CO₂e during the construction period. Per SCAQMD guidance, due to the long-term nature of the GHGs in the atmosphere, instead of determining significance of construction emissions alone, the total

³⁷ California Air Resources Board (ARB). 2010. *Economic Sectors Portal*. Website: California Greenhouse Gas Emissions for 2000 to 2017. Trends of Emissions and Other Indicators. (accessed April 2018).

Table J: Project Construction Greenhouse Gas Emissions

Construction Emissions	Pollutant Emissions (MT/yr)			
	CO ₂	CH ₄	N ₂ O	CO ₂ e
Site Preparation 2022	17.57	<0.01	0	17.71
Grading 2022	27.48	<0.01	0	27.70
Building Construction 2022	148.05	0.04	0	148.93
Building Construction 2023	126.48	0.03	0	127.22
Paving 2023	21.40	<0.01	0	21.56
Architectural Coatings 2023	2.65	<0.01	0	2.65
Total Project Emissions	343.63	0.09	0	345.77
Amortized Emissions	11.45	<0.01	0	11.53

Source: Compiled by LSA (May 2020).

Note: Numbers in table may not appear to add up correctly due to rounding of numbers.

CH₄ = methane
 CO₂ = carbon dioxide
 CO₂e = carbon dioxide equivalent
 MT/yr = metric tons per year
 N₂O = nitrous oxide

construction emissions are amortized over 30 years (the estimated life of the Project) and included in the operations analysis. Amortized over 30 years, the total construction emissions would generate approximately 11.53 MT of CO₂e per year.

Operational Building Energy Title 24, Part 6. The Project would be required to comply with 2019 Title 24 standards because the building construction phase would commence after January 1, 2020 and incorporate energy efficient features into the Project. This analysis would quantify the increased energy efficiency and corresponding GHG emissions savings associated with the more stringent 2019 Title 24 standards, which results in a conservative assessment of GHG emission savings because the 2019 Title 24 standards have been documented to reduce energy usage (e.g., for lighting and solar panels) and associated GHG emissions. Once rooftop solar electricity generation is factored in, residential dwelling units (including low-rise apartments) built under the 2019 Energy Standards will use an estimated 53 percent less energy than those under the 2016 Energy Standards. These measures were applied in the CalEEMod version 2016.3.2 for the Project.

Operational GHG Emissions. Long-term operation of the Project would generate GHG emissions from area and mobile sources and indirect emissions from stationary sources associated with energy consumption. Project-specific energy utilization rates for electricity and natural gas were entered into CalEEMod using the default input assumptions. Operational and Construction GHG emissions, as shown in Table K, *Long Term Operational Greenhouse Gas Emissions*, were calculated using CalEEMod (Version 2016.3.2). Based on SCAQMD guidance, construction emissions were amortized over 30 years (a typical project lifetime) and added to the total Project operational emissions. Mobile-source emissions of GHGs would include Project-generated vehicle trips. Area-source emissions would be associated with activities including landscaping and maintenance of proposed land uses, natural gas for heating, and other sources. Increases in stationary-source emissions would also occur at off-site utility providers as a result of demand for electricity, natural gas, and water from the Project.

Table K: Long Term Operational Greenhouse Gas Emissions

Operational Emissions	Pollutant Emissions (MT/yr)					
	Bio-CO ₂	NBio-CO ₂	Total CO ₂	CH ₄	N ₂ O	CO ₂ e
Proposed Project						
Construction Emissions Amortized over 30 Years	0	11.45	11.45	<0.01	0	11.53
Operational Emissions						
Area	0	3.34	3.34	<0.01	<0.01	3.36
Energy	0	51.12	51.12	<0.01	<0.01	51.34
Mobile	0	163.12	163.12	<0.01	0	163.29
Waste	3.08	0	3.08	0.18	0	7.63
Water	0.27	5.40	5.67	0.03	<0.01	6.58
Total Project Emissions	3.35	234.43	237.78	0.21	0	243.72
SCAQMD Tier 3 Threshold						3,000
Significant?						No

Source: Compiled by LSA (May 2020).

Note: Column totals may not add up due to rounding.

Bio-CO₂ = biologically generated CO₂

CH₄ = methane

CO₂ = carbon dioxide

CO₂e = carbon dioxide equivalent

MT/yr = metric tons per year

N₂O = nitrous oxide

NBio-CO₂ = non-biologically generated CO₂

SCAQMD = South Coast Air Quality Management District

As shown in Table K, *Long Term Operational Greenhouse Gas Emissions*, the Project would generate 244 MT (rounded) of CO₂e per year. The Project’s emissions are less than the SCAQMD Tier 3 threshold of 3,000 MT of CO₂e per year that applies to residential projects, thus, Project-level and cumulative GHG emissions are less than significant. No mitigation measures are either required or recommended.

8. Greenhouse Gas Emissions	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(b) Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The County has not adopted a Climate Action Plan regarding GHG emissions within its jurisdictional boundaries. Applicable plans adopted for the purpose of reducing GHG emissions and used in this analysis include the California Air Resources Board (ARB) 2017 Climate Change Scoping Plan Update, the Southern California Association of Governments (SCAG) 2016-2040 Regional Transportation Plan/Sustainable Community Strategy (RTP/SCS), and SCAQMD greenhouse gas goals and policies related to climate change.

In 2008, the California Air Resources Board (ARB) approved a *Climate Change Scoping Plan* as required by Assembly Bill (AB) 32. The *Climate Change Scoping Plan* proposed a “comprehensive set of actions designed to reduce overall carbon GHG emissions in California, improve our environment, reduce our dependence on oil, diversify our energy sources, save energy, create new jobs, and enhance public health.” The *Climate Change Scoping Plan* (2008) has a range of GHG

reduction actions, which include direct regulations, alternative compliance mechanisms, monetary and non-monetary incentives, voluntary actions, market-based mechanisms (e.g., a cap-and-trade system), and an AB 32 implementation fee to fund the program. In November 2017, ARB released an *Update to the Climate Change Scoping Plan* (2017 Update). In the 2017 Update, nine key focus areas were identified: energy, transportation, agriculture, water, waste management, natural and working lands, short-lived climate pollutants, green buildings, and the cap-and-trade program. The Project's compliance with Title 24 energy use requirements makes the Project consistent with AB 32 and the 2017 Update.

In April 2016, the Regional Council of SCAG adopted the 2016–2040 RTP/SCS. The Project would support and be consistent with relevant and applicable GHG emission reduction strategies in SCAG's *Sustainable Communities Strategy*. These strategies, which are not significance thresholds, include utilizing infill opportunities to conserve natural resources and farmlands and investing in biking and walking infrastructure.

While SCAQMD does not have an adopted threshold for assessing the significance of GHG emissions, the draft screening value for residential use is 3,000 MT of CO₂e per year. As discussed in Response 8(a) above, the Project would result in operational and amortized construction GHG emissions of 244 MT of CO₂e per year that are well below the suggested threshold of 3,000 MT of CO₂e per year. As a result, the Project would be consistent with SCAQMD's adopted plans and policies, which were determined by SCAQMD to be consistent with California's State-level plans, policies, and regulations related to GHGs. These State-level plans, policies, and regulations, described above, include ARB's 2008 *Climate Change Scoping Plan* and 2017 Update, AB 32, and Title 24 regulations. Therefore, the Project is also consistent with most applicable plans, policies, or regulations adopted for the purpose of reducing the GHG emissions. Less than significant impacts would result from the Project. No mitigation measures are either required or recommended.

9. Hazards and Hazardous Materials

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(a) Create a significant hazard to the public or the environment through the routine transport, use or disposal of hazardous materials?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project includes the future development of 13 low-density residential dwelling units, including a new internal private street. The average size of each residential lot would be approximately 13,900 sf. Construction activities associated with the Project would involve the use of limited amounts of potentially hazardous materials, including but not limited to, solvents, paints, fuels, oils, and transmission fluids. However, all materials used during construction would be contained, stored, and handled in compliance with applicable standards and regulations established by the Department of Toxic Substances Control (DTSC), the United States Environmental Protection Agency (EPA), and the Occupational Safety and Health Administration (OSHA). In addition, the County of Orange requires projects to notify the Orange County Fire Authority (OCFA) Fire Chief of all hazardous, flammable, and combustible liquids, solids, or gases to be used on-site and to implement standard BMPs for hazardous materials storage and use during construction (refer to County Standard Condition of Approval FPR11). No manufacturing, industrial, or other operations utilizing large amounts of hazardous materials would occur within the Project site either during construction or during the operational phase. Project operation would involve only the use of common materials associated with residential uses (i.e., cleaning products, fertilizers, pesticides, herbicides, etc.) that could be potentially hazardous if handled improperly or ingested. However, these products are not considered acutely hazardous and are not generally considered unsafe. All storage, handling, and disposal of hazardous materials during Project construction and operation would comply with applicable standards and regulations. The residential uses would not generate significant amounts of any hazardous materials. Therefore, the Project would have a less than significant impact associated with the routine transport, use, or disposal of hazardous materials during Project construction and operation. No mitigation measures are either required or recommended.

County Standard Condition. The following County Standard Condition is applicable to the Project:

County Standard Condition FPR11 Hazardous Materials. A. Prior to the issuance of a Grading or Building Permit, the Project Applicant shall submit to the Orange County Fire Authority (OCFA) Fire Chief a list of all hazardous, flammable, and combustible liquids, solids, or gases to be stored, used, or handled on-site. These materials shall be classified according to the Uniform Fire Code and a document submitted to the OCFA Fire Chief with a summary sheet listing the totals for storage and use for each hazard class. Please contact the Orange County Fire Authority at (714) 744-0499 or visit the Orange County Fire Authority website to obtain a copy of the “Guidelines for Completing Chemical Classification Packets.”

B. Prior to the issuance of a Building Permit, the Project Applicant shall complete and submit to the OCFA Fire Chief a copy of a “Hazardous Materials Disclosure Chemical Inventory and Business Emergency Plan” packet. Please contact the Orange County Fire Authority Hazardous Materials Services at (714) 744-0463 to obtain a copy of the packet.

9. Hazards and Hazardous Materials	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(b) Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. As stated in Response 9(a), construction of the Project would involve the use of potentially hazardous materials typically used in construction of residential structures and related site improvements, including but not limited to, solvents, paints, fuels, oils, and transmission fluids. All storage, handling, and disposal of hazardous materials during Project construction would comply with applicable standards and regulations regarding the transportation, handling, and storage of hazardous materials. Therefore, less than significant impacts related to the foreseeable upset or accident condition related to the release of hazardous materials would result during Project construction. No mitigation is required.

Long-term Project operation would involve limited use of hazardous materials typical of residential uses, such as custodial products, pesticides, and other landscaping materials. All storage, handling, and disposal of hazardous materials used during Project construction and operation would comply with applicable standards and regulations. Therefore, operation of the Project would result in a less than significant impact with respect to a hazard to the public or the environment through a reasonably foreseeable upset or accident condition related to the release of hazardous materials. No mitigation is required or recommended.

9. Hazards and Hazardous Materials	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(c) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. Tijeras Creek Elementary School and Arroyo Vista Middle School are the closest schools to the Project site, located approximately 1.1 and 1.8 miles, respectively, west of the Project

site, outside of the Coto de Caza community. There are no existing or planned schools within one-quarter mile of the Project site. Therefore, because the Project does not involve activities that would result in the emission or handling of hazardous materials or acutely hazardous substances within one-quarter mile of any school, no impacts related to this issue would occur during Project construction or operation. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
9. Hazards and Hazardous Materials				
Would the project:				
(d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 67962.5 and, as a result, would it create a significant hazard to the public or the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. According to the EnviroStor and GeoTracker databases,³⁸ the Project site is not located on a federal superfund site, State response site, voluntary cleanup site, school cleanup site, corrective action site, or tiered permit site. The area of the Project is also not located on a hazardous materials site pursuant to Government Code Section 65962.5. As a result, no hazards related to this issue would occur during Project construction or operation, and no impact would occur. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
9. Hazards and Hazardous Materials				
Would the project:				
(e) For a project located within an airport land use plan, or where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. The Project is not located within 2 miles of a public airport or a public use airport and is not within an airport land use plan. The nearest airport facility, John Wayne Airport, is located approximately 16.6 miles northwest of the Project site. Operations at John Wayne Airport will not pose a safety hazard or excessive noise for people residing or working in the Project area due to the distance from the Project site. In addition to John Wayne Airport, the Mission Hospital Regional Medical Center, which contains a heliport, is located approximately 6.4 miles southwest, and the Corona Municipal Airport is located approximately 19 miles north of the Project site. Neither of the airports nor the heliport would pose a safety hazard or excessive noise for people residing or

³⁸ California Department of Toxic Substances Control, EnviroStor, Website: <https://www.envirostor.dtsc.ca.gov/public/map/?myaddress=23359+via+pajaro>, (accessed March 26, 2020) and State Water Resources Control Board, Website <https://geotracker.waterboards.ca.gov/map/?CMD=runreport&myaddress=coto+de+caza>, (accessed March 26, 2020).

working in the Project area due to the distance from the Project site. Therefore, no hazardous impacts related to the site’s proximity to the airport or heliport facility, or any airport land use plan would occur during Project construction or operation. No mitigation measures are either required or recommended.

9. Hazards and Hazardous Materials	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(f) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project includes a new ingress/egress access road to the future residential development off Vista del Verde and does not include any other permanent changes to any other public or private roadways that would interfere with the evacuation routes or shelters identified by the County of Orange in the Emergency Response Plan. During the construction phase, a 45-day partial lane closure of the Vista del Verde northbound lane would be required for the construction of wastewater infrastructure improvements, with the southbound lane remaining open during the partial lane closure. Refer to the discussion under Roadway Access in the Project Description section of this document for additional information. Coto de Caza does not have an adopted emergency evacuation plan or pre-designated evacuation routes.

The County provides emergency services through a contract with the OCFA. Emergency response services include fire protection and suppression, inspection services, paramedic emergency medical aid, hazardous materials protection and response, and a variety of public services. The OCFA has a comprehensive Emergency Command Center, which includes the necessary elements to respond quickly and effectively to all types of emergencies and disasters. The OCFA has also adopted and implements the Orange County Fire Authority Strategic Plan 2010-2015, which outlines guiding principles, strategic goals, and objectives to enhance public safety and meet the needs of its member agencies through education, prevention, and emergency response. The Strategic Plan establishes the emergency organization, tasks, and general procedures, and provides for coordination of planning efforts of the various emergency staff and resources.

The Project consists of the future development of 13 additional residential units within PA 5.1 (following approval of the SPA and the TTM), a currently developed residential area near other residential neighborhoods within Coto de Caza. No changes to existing public roadways are proposed. The new driveway connection to the Project site’s internal private street would occur on an equestrian trail easement within the public right-of-way. As a result, Project implementation would not physically interfere with the County’s emergency planning program or the OCFA ingress/egress access to and from the Project site. In the event of an emergency, the Orange County Sheriff’s Department (OCSD) would be responsible for evacuating neighborhoods. Evacuations would be decided within the Incident Command Structure in consultation with the OCFA, OCSD, public works, and local government liaisons to establish when and where they would occur. Under the Ready Set Go Program instituted in Orange County, citizens are encouraged to evacuate prior to an evacuation recommendation, advisory or order. The Project would be required to be reviewed by OCFA and the County of Orange Building Department to ensure that building construction meets

the minimum standards for fire safety as defined in the County Building Codes and County Fire Codes.

Therefore, impacts would be less than significant as a result of Project construction or operation. No mitigation measures are either required or recommended. Refer also to Section 20(a) below for a discussion of emergency evacuation plans relating to wildfires.

9. Hazards and Hazardous Materials	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(g) Expose people or structures, either directly or indirectly, to a significant risk of loss, injury of death involving wildland fires?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project site is located within a designated “Very High Fire Hazard Severity Zone (VHFHSZ)” area as identified on the Fire Hazard Severity Zone Map in the County’s General Plan Safety Element (2005) (for further discussion, refer to Section 20, Wildfire, Response 20[b] of this IS/MND). In addition, Lot 9 on the easterly portion of the Project site is located with the 100’ C/D Fuel Modification Zone, which is a strip of land where native or ornamental vegetation has been controlled, trimmed, or removed to reduce fire hazards. The Project site is located within a developed area within the existing community of Coto de Caza and contains a remnant structure from previous development and limited vegetation. The Project would be required to design, construct, and maintain structures in compliance with local, regional, and State requirements.

The Project would be required to adhere to County Standard of Approval FPR01 requiring the Project Applicant to provide evidence of an on-site fire hydrant system to the OCFA Fire Chief to ensure adequate fire flow for use by OCFA in the event of an on-site fire. The Project would also be required to demonstrate evidence of adequate fire flow (County Standard of Approval FPR02), shall include automatic fire sprinklers in all on-site structures (County Standard of Approval FPR03), shall note that the Project site is located within a VHFHSZ on all maps (County Standard of Approval FPR07), shall complete a Fuel Modification Plan under the supervision of the OCFA Fire Chief (County Standard of Approval FPR08), shall submit a letter stating that water for fire-fighting purposes and all-weather fire protection access roads will be in place and operational before any combustible material is placed on-site (County Standard of Approval FPR10), and shall provide a list of all hazardous, flammable, and combustible liquids, solids, or gases to be stored, used or handled on-site, and complete and submit a Hazardous Materials Disclosure Chemical Inventory and Business Emergency Plan packet (County Standard of Approval FPR11). The Project would also include the provision of a private street that would provide ingress/egress access for emergency vehicles in the event of a fire and would connect to the larger circulation system to ensure the adequate provision of emergency access to the Project site.

The Project also includes a wildfire wall barrier (comprised of a glass fence added to the top of the wall) adjacent to Lot 9 to extend the wall to 6 ft above the rear yard and a maximum of 12 ft above Via Pajaro. Compliance with County Standard Conditions FPR01, FPR02, FPR03, FPR07, FPR08, FPR10, and FPR11 would ensure that construction and operation of the Project would not directly or indirectly expose people or structures to significant risk, loss, injury, or death from wildland fires. Therefore, impacts would be less than significant. No mitigation measures are either required or recommended.

County Standard Conditions. The following County Standard Conditions are applicable to the Project:

- County Standard Condition FPR01 Fire Hydrants.** A. Prior to the recordation of a subdivision map, the issuance of any Grading Permits or the issuance of a Building Permit, whichever occurs first, the Project Applicant shall submit a fire hydrant location plan to the Orange County Fire Authority (OCFA) Fire Chief for review and approval.
- B. Prior to the issuance of a Building Permit, the Project Applicant shall submit evidence of the on-site fire hydrant system to the OCFA Fire Chief and indicate whether it is public or private. If the system is private, it shall be reviewed and approved by the OCFA Fire Chief prior to Building Permit issuance, and the Project Applicant shall make provisions for the repair and maintenance of the system in a manner meeting the approval of the OCFA Fire Chief.
- C. Prior to the issuance of any certificate of use and occupancy, all fire hydrants shall have a blue reflective pavement marker indicating the hydrant location on the street as approved by the OCFA Fire Chief, and must be maintained in good condition by the property owner.
- County Standard Condition FPR02 Water Availability.** Prior to the recordation of a subdivision map, the issuance of any Grading Permits or the issuance of a Building Permit, whichever occurs first, the Project Applicant shall provide evidence of adequate fire flow. The “Orange County Fire Authority Water Availability for Fire Protection” form shall be signed by the applicable water district and submitted to the OCFA Fire Chief for approval. If sufficient water to meet fire flow requirements is not available, an automatic fire-extinguishing system may be required in each structure affected.
- County Standard Condition FPR03 Automatic Fire Sprinklers.** A. Prior to the recordation of a subdivision map, a note shall be placed on the map stating that all residential structures exceeding 5,500

square feet (per amendment) and all structures exceeding fire department access requirements shall be protected by an automatic fire sprinkler system in a manner meeting the approval of the OCFA Fire Chief.

B. Prior to the issuance of a Building Permit, the Project Applicant shall submit plans for any required automatic fire sprinkler system in any structure to the OCFA Fire Chief for review and approval. Please contact the Orange County Fire Authority at (714) 744-0499 for additional information.

C. Prior to the issuance of a certificate of use and occupancy, this system shall be operational in a manner meeting the approval of the OCFA Fire Chief.

County Standard Condition FPR07 Fire Hazard Notification. A. State Responsibility Areas. Prior to the recordation of a subdivision map, the subdivider shall place a note on the map meeting the approval of the OCFA Fire Chief that the property is in a “(High/Very High) Fire Hazard Area” due to wildland exposure based on State Responsibility Areas maps.

B. Special Fire Protection Area (SFPA) Notification. Prior to the recordation of any final tract map, the subdivider shall place a note on the map meeting the approval of the OCFA Fire Chief that the property is in a “Special Fire Protection Area” and must meet all requirements for development within the area or file for an exclusion with the OCFA Fire Chief.

C. Prior to the issuance of a Building Permit, the Project Applicant shall place a note on the map meeting the approval of the OCFA Fire Chief that all requirements for development and construction within a “Special Fire Protection Area,” including increased street widths, Class A roof assemblies, and fire sprinklers, etc., will be met. Please contact the Orange County Fire Authority at (714) 744-0499 or visit the Orange County Fire Authority website to obtain a copy of the “Guidelines for Development within Special Fire Protection Areas and Instructions for Request for Exclusion from SFPA.”

D. Prior to recordation of any final tract map, the subdivider shall place a note on the map meeting the approval of the OCFA Fire Chief that the property is “Conditionally Excluded” from a “Special Fire Protection

Area” and must meet all conditions of exclusion as required by the Fire Chief.

County Standard Condition FPR08

Fuel Modification. A. Prior to the recordation of a subdivision map or the issuance of a preliminary Grading Permit, the Project Applicant shall obtain approval from the OCFA Fire Chief in consultation with the Manager, Subdivision and Grading Services, for a conceptual fuel modification plan and program. Please contact the Orange County Fire Authority at (714) 744-0499 or visit the Orange County Fire Authority website to obtain a copy of the “Guidelines for Fuel Modification Plans and Maintenance.”

B. Prior to the issuance of a precise Grading Permit, the Project Applicant shall obtain approval from the OCFA Fire Chief in consultation with the Manager, Subdivision and Grading Services, for a precise fuel modification plan and program. The plan shall indicate the proposed means of modifying vegetation to reduce the risk to structures. Please contact the Orange County Fire Authority at (714) 744-0499 or visit the Orange County Fire Authority website to obtain a copy of the “Guidelines for Fuel Modification Plans and Maintenance.”

C. Prior to the issuance of a Building Permit, the developer, under the supervision of the OCFA Fire Chief, shall have completed the portion of the approved fuel modification plan determined to be necessary before the introduction of any combustible materials into the Project area. Approval shall be subject to an on-site inspection.

D. Prior to the issuance of any certificate of use and occupancy, the fuel modification shall be installed and completed under the supervision of the OCFA Fire Chief with an approved plant palette. The Declaration of Covenants, Conditions, and Restrictions (CC&Rs) or other approved documents shall contain provisions for maintaining the fuel modification zones, including the removal of all dead and dying vegetation. The fuel modification zones shall be subject to triennial inspections.

E. Lot 9 on the Project site is located within the OCFA 100 ft fuel modification zone and will require extra measures to create a barrier between this lot and the natural woodland open space east of the Project site across Via Pajaro. A wildfire ember barrier which includes a glass fence shall be added to the top of the wall at this single

location to extend the wall to 6 ft above the rear yard and a maximum of 12 ft above Via Pajaro.

County Standard Condition FPR10

Combustible Construction Letter. Prior to the issuance of a Building Permit for combustible construction, the builder shall submit a letter on company letterhead stating that water for fire-fighting purposes and all-weather fire protection access roads shall be in place and operational before any combustible material is placed on-site. Building permits will not be issued without Orange County Fire Authority approval obtained as a result of an on-site inspection. Please contact the Orange County Fire Authority at (714) 744-0499 to obtain a copy of the standard combustible construction letter.

County Standard Condition FPR11

Hazardous Materials. A. Prior to the issuance of a Grading or Building Permit, the Project Applicant shall submit to the OCFA Fire Chief a list of all hazardous, flammable, and combustible liquids, solids, or gases to be stored, used, or handled on-site. These materials shall be classified according to the Uniform Fire Code and a document submitted to the OCFA Fire Chief with a summary sheet listing the totals for storage and use for each hazard class. Please contact the Orange County Fire Authority at (714) 744-0499 or visit the Orange County Fire Authority website to obtain a copy of the “Guidelines for Completing Chemical Classification Packets.”

B. Prior to the issuance of a Building Permit, the Project Applicant shall complete and submit to the OCFA Fire Chief a copy of a “Hazardous Materials Disclosure Chemical Inventory and Business Emergency Plan” packet. Please contact the Orange County Fire Authority Hazardous Materials Services at (714) 744-0463 to obtain a copy of the packet.

10. Hydrology and Water Quality

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(a) Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Discussion:

The following section is based on the analysis in the *Conceptual Water Quality Management Plan* (CWQMP; March 2022) (Appendix E-1), the *Oak Grove Master Drainage Plan* (October 8, 2018) (Appendix E-2), and the *Conceptual Drainage Plan* (October 12, 2020) prepared by Land Strategies, LLC. A proposed underground infiltration reservoir would be located off site northeast of the Project site, westward of and outside of the Flood Zone boundary. On-site runoff would be conveyed to a proposed on-site concrete open swale between Lots 8 and 9 via curb and gutter along the perimeter of the internal private roadway. The proposed concrete open swale would route stormwater flows into a proposed off-site underground infiltration reservoir to mitigate stormwater volumes and velocities (refer to Figure 10, *Drainage Plan*). The underground infiltration reservoir would then discharge into the Cañada Gobernadora watershed through a proposed underground connection to the existing stormwater outfall currently underlying the Via Pajaro right-of-way. The proposed underground infiltration reservoir would meet the South Orange County hydromodification requirements, would be approximately 600 to 1,000 sf in size, and would be designed to capture the 85th percentile of runoff associated with a 24-hour storm event.³⁹

Runoff north and northeast of the Project site (that originally drained southeast across the Project site) would be conveyed off site via a proposed 5 ft wide concrete-lined drainage channel into a proposed concrete open swale located northeast of the Project’s underground infiltration reservoir. The collected off-site runoff from the concrete open swale would flow through a proposed culvert into an existing below grade stormwater trunk line within the Via Pajaro right-of-way before being discharged into the Cañada Gobernadora watershed east of the Project site. Runoff west of the Project site would be conveyed to Vista del Verde via a proposed 3 ft wide concrete drain, which borders the western portion of the Project site. Runoff that is conveyed to Vista del Verde would eventually drain into existing catch basins (similar to existing conditions), prior to discharging into the Cañada Gobernadora watershed near the Project’s easterly property boundary.

Less than Significant Impact. Construction activities would include the installation of the proposed off-site concrete open swale and underground infiltration reservoir, and construction of a new on-site internal private street to serve the 13 single-family lots. In the proposed condition, two off-site stormwater features would be located along the northern boundary of the Project site and to the northeast of the Project site.

Pollutants of concern during construction include sediments, trash, petroleum products, concrete waste (dry and wet), sanitary waste, and chemicals. During construction activities, excavated soil would be exposed and there would be an increased potential for soil erosion compared to existing

³⁹ Underground infiltration reservoir details as described in the CWQMP, dated March 2022.

conditions. During construction, the total disturbed area would be approximately 5.6 acres. In addition, chemicals, liquid products, petroleum products (such as paints, solvents, and fuels), and concrete-related waste may be spilled or leaked and have the potential to be transported via storm runoff into downstream receiving waters.

As specified in County Standard Condition HYD-1, the Project would comply with the requirements of the applicable National Pollutant Discharge Elimination System (NPDES) Permit (General Construction Permit NPDES No. CAS000002; Order No. 2009-0009-DWQ as amended by Orders No. 2010-0014-DWQ and 2012-0006-DWQ) for general construction (Construction General Permit). The Construction General Permit requires preparation and implementation of a Storm Water Pollution Prevention Plan (SWPPP). As part of the SWPPP, the Project Applicant shall identify Construction Best Management Practices (BMPs) to address water quality impacts associated with construction. Construction BMPs would include, but not be limited to, erosion control and sediment control BMPs designed to minimize erosion and retain sediment on-site and good housekeeping BMPs to prevent spills, leaks, and discharge of construction debris and waste into receiving waters. The SWPPP would be developed, and construction BMPs selected and implemented, to target pollutants of concern during construction.

Operational phase BMPs would consist of Hydrologic Source Controls, Infiltration, Hydromodification Controls, Non-Structural Source Controls, and Structural Source Controls. Hydrologic Source Control examples include impervious area dispersion and street trees. Infiltration examples include a subsurface infiltration gallery. Hydromodification controls include an underground infiltration reservoir. Non-Structural Source Control examples include BMP maintenance, activity restrictions, and property education. Structural Source Control examples include use of efficient irrigation systems.

The construction BMPs would be designed to retain sediment and other pollutants on-site so they would not reach receiving waters. Expected pollutants of concern during operation of the proposed residential development include bacteria and viruses, nutrients, pesticides, sediments, trash and debris, oxygen-demanding substances, and oil and grease. Prior to the demolition of the former Merryhill School buildings, impervious surface area on the 5.1-acre Project site (remnant foundations and parking lots) totaled approximately 1.0 acre. Future development of the private street and 13 residential lots would result in an approximate impervious surface area of 3.1 acres and a pervious surface area of 2.0 acres (refer to Table L, *Pervious and Impervious Surfaces on the Project Site*). Overall, it is estimated that post-development conditions would result in an increase of 2.1 acres of impervious area. An increase in impervious surface area would increase runoff from the Project site during storm events and increase pollutant loading to downstream receiving waters. However, as specified in the CWQMP prepared for the Project, the Project would include operational BMPs to target pollutants of concern in stormwater runoff from the entire Project site. Proposed Hydrologic Source Control BMPs include impervious area dispersion and street trees. Proposed Non-Structural Source Control BMPs include education for property owners, tenants, and occupants, activity restrictions, and BMP maintenance. Proposed Structural Source Control BMPs include use of efficient irrigation systems and landscape design, water conservation, smart controllers, and source control. Finally, proposed Hydromodification BMPs include an underground infiltration reservoir located to the northeast of the Project site, which would capture and treat runoff before it enters the public storm drain system and eventually the natural stream west of Via Pajaro. As specified in County Standard Condition HYD-2, a Final WQMP detailing BMPs in the proposed condition will be prepared based on the final plans and submitted to the County for review and approval.

Table L: Pervious and Impervious Surfaces on the Project Site

	Pervious Surfaces		Impervious Surfaces	
	Area (acres)	Percentage	Area (acres)	Percentage
Pre-Project Conditions	4.1	80%	1.0	20%
Post-Project Conditions	2.0	40%	3.1	60%

Source: Oak Grove Conceptual Water Quality Management Plan, Land Strategies, LLC (March 2022).

As required by the Final WQMP, the Project would require implementation of BMPs to target pollutants of concern in stormwater runoff from the Project site.

The maximum depth of excavation for the Project would be 7 ft below ground surface. According to the CWQMP prepared for the Project, shallow groundwater would not occur on the Project site. As the Project will not involve major excavation of any substantial depth, excavation activities would not have the potential to encounter groundwater and groundwater dewatering would not be required during construction.

Infiltration of stormwater can have the potential to affect groundwater quality in areas of shallow groundwater. Pollutants in stormwater are generally removed by soil through absorption as water infiltrates. Therefore, in areas of deep groundwater, there is more absorption potential and, as a result, less potential for pollutants to reach groundwater that would otherwise result if excavations breached into the groundwater. It is not expected that any stormwater that may infiltrate during construction or operation would affect groundwater quality because there is not a direct path for pollutants to reach groundwater. Additionally, as the Project will not involve major excavation of any substantial depth, excavation activities would not have the potential to encounter groundwater. Project construction and operation would not violate any water quality standards or waste discharge requirements or substantially degrade groundwater quality.

Project compliance with all applicable permits and associated regulations, including County Standard Conditions HYD-1 and HYD-2, would ensure that the Project would result in less than significant impacts related to potential violations with water quality standards or waste discharge requirements or the degradation of surface or groundwater quality. No mitigation measures are either required or recommended.

County Standard Conditions. The following County Standard Conditions are applicable to the Project:

County Standard Condition HYD-1 Construction General Permit. Prior to issuance of a Grading Permit, the Project Applicant shall obtain coverage under the *State Water Resources Control Board National Pollutant Discharge Elimination System General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities* (Order No. 2009-0009-DWQ, Permit No. CAS000002 as amended by Orders No. 2010-0014-DWQ and 2012-0006-DWQ) (Construction General Permit). This shall include submission of Permit Registration Documents (PRDs), including a Notice of Intent (NOI) for coverage under the

permit to the State Water Resources Control Board (SWRCB). The Project Applicant shall provide the Waste Discharge Identification Number to the Manager, Orange County Permit Services, to demonstrate proof of coverage under the Construction General Permit. A Storm Water Pollution Prevention Plan (SWPPP) shall be prepared and implemented for the Project in compliance with the requirements of the Construction General Permit. The SWPPP shall identify construction best management practices (BMPs) to be implemented to ensure that the potential for soil erosion and sedimentation is minimized and to control the discharge of pollutants in stormwater runoff as a result of construction activities.

County Standard Condition HYD-2 Final Water Quality Management Plan. Prior to the issuance of any Grading or Building Permits, the Project Applicant shall submit a Final Water Quality Management Plan (WQMP) to the Director of the County of Orange Public Works Department, or designee, for review and approval. The Final WQMP shall be prepared consistent with the Orange County Municipal Separate Storm Sewer System (MS4) Permit, the Model WQMP, the Hydromodification Management Plan, and the Technical Guidance Document. The Final WQMP shall specify BMPs to be incorporated into the design of the Project. The BMPs shall include operational BMPs that target pollutants of concern in stormwater runoff and reduce stormwater runoff discharged from the Project site to mimic predevelopment conditions.

10. Hydrology and Water Quality	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(b) Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. According to the CWQMP prepared for the Project, shallow groundwater does not occur on the Project site. Therefore, groundwater dewatering would not be required during excavation activities. As stated above, the amount of impervious area would increase upon Project implementation (from approximately 1.0 acre [20 percent] to 3.1 acres [60 percent]). However, the Project site is not identified as a groundwater recharge basin. Additionally, Project operation would not require groundwater extraction because domestic water supply would be provided by the Santa Margarita Water District and would not require groundwater extraction. Therefore, impacts related to depletion of groundwater supplies or interference with groundwater recharge would be less than significant. No mitigation measures are either required or recommended.

10. Hydrology and Water Quality	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:				
(i) Result in substantial erosion or siltation on-or off-site?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Construction of the Project will result in grading and landform alteration on the 5.1-acre site, which will expose on-site soils that could be subject to the effects associated with wind and water erosion unless adequate measures are taken to limit the transport of soils in surface water from the site to downstream locations. As discussed above in Response 10(a) and specified in County Standard Condition HYD-1, the Project Applicant will be required to prepare a SWPPP that will identify specific measures (i.e., Erosion Control and Sediment Control BMPs) to address erosion and siltation resulting from grading and construction.

According to the CWQMP prepared for the Project, stormwater runoff from the Project site discharges to Cañada Gobernadora, a natural creek that is susceptible to hydromodification impacts.⁴⁰ The proposed off-site underground infiltration reservoir would reduce stormwater runoff discharged from the Project site to mimic predevelopment conditions so that the Project would not result in hydromodification impacts to downstream receiving waters, including the Cañada Gobernadora. Additionally, as specified in County Standard Condition HYD-2, the Final WQMP shall specify BMPs to be incorporated into the design of the Project in the proposed condition, which will target pollutants of concern in stormwater runoff and reduce stormwater runoff discharged from the Project site. As such, operation of the Project would not result in significant on- or off-site erosion, including the existing off-site erosion from the equestrian center immediately adjacent to the Project site.

With implementation of the construction BMPs and the underground infiltration reservoir, as specified in County Standard Conditions HYD-1 and HYD-2, construction and operation impacts related to the alteration of the existing drainage pattern on the Project site in a manner that would result in substantial erosion or siltation would be less than significant. No mitigation measures are either required or recommended.

County Standard Conditions. Refer to County Standard Conditions HYD-1 and HYD-2 in Response 10(a), above.

⁴⁰ Hydromodification is defined as hydrologic changes resulting from increased runoff from increases in impervious surfaces. Hydromodification impacts can include changes in downstream erosion and sedimentation.

10. Hydrology and Water Quality	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(c)(ii) Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. During construction, soil would be disturbed and compacted, and drainage patterns would be temporarily altered, which can increase the volume and velocity of stormwater runoff and increase the potential for localized flooding compared to existing conditions. As discussed in Response 10(a), above, and specified in County Standard Condition HYD-1, the Construction General Permit requires preparation of a SWPPP and implementation of construction BMPs to control and direct surface runoff on-site. By controlling and directing surface runoff on-site, the BMPs will direct additional runoff into the existing storm drain system and eventually to the Cañada Gobernadora watershed so that on-site or off-site flooding would not occur.

As discussed in Response 10(c)(i), above, runoff from the Project site currently discharges into an existing drain system in Via Pajaro that discharges into the Cañada Gobernadora east of Via Pajaro (Figure 10, *Drainage Plan*). From there, runoff discharges into the Cañada Gobernadora watershed, which joins downstream with San Juan Creek and ultimately discharges to the Pacific Ocean.

As discussed previously, Project implementation would result in an increase in the impervious surface area on the Project site (from approximately 1.0 acre [20 percent] to 3.1 acres [60 percent]). The increase in impervious surface area would increase the runoff from the Project during a storm event. Following Project implementation, stormwater runoff would sheet flow through pervious landscaped areas before being conveyed into the curb and gutter within Lot A.

A proposed on-site concrete open swale located at the northeast end of the Project site would convey runoff from the Project site into the proposed off-site underground infiltration reservoir. The underground infiltration reservoir would subsequently discharge into the Cañada Gobernadora watershed through a proposed connection to the existing storm drain within Via Pajaro. This culvert would mimic the predeveloped condition to mitigate for increases in runoff into the Cañada Gobernadora watershed. The proposed BMPs and on-site storm drain facilities would be sized to accommodate stormwater runoff from the Project site and from the adjacent Coto Equestrian Preserve so that on-site flooding would not occur. The BMP and storm drain sizing requirements are documented in the *Conceptual Water Quality Management Plan and Master Drainage Plan* prepared for the Project both of which are included in Appendix E-1 and E-2, respectively. As specified in County Standard Condition HYD-3, a Final Drainage Report will be prepared based on the final plans and submitted to the County for review and approval. As specified in County Standard Condition HYD-2, the underground infiltration reservoir would reduce stormwater runoff discharged from the Project to mimic predevelopment conditions; therefore, off-site flooding would not occur. With implementation of the construction BMPs and the proposed underground infiltration reservoir as specified in County Standard Conditions HYD-1 and HYD-2, implementation of the Project would result in less than significant impacts related to the increase in rate or amount of surface runoff in a manner which would not result in flooding on-site or off site. No mitigation measures are either required or recommended.

Off-site drainage improvements constructed adjacent to the north and northeast of the Project’s boundary would convey runoff around the site to the existing storm drain along Via Pajaro. No change in off-site hydrology would occur with these off-site improvements and as such they would not result in any potential flooding impacts.

County Standard Condition. The following County Standard Condition is applicable to the Project:

County Standard Condition HYD-3 Final Drainage Report. Prior to the issuance of any Grading or Building Permits, the Project Applicant shall submit a Final Drainage Report to the Director of the County of Orange Public Works Department, or designee, for review and approval. The Final Drainage Report shall be prepared consistent with the Orange County Hydrology Manual. The Final WQMP shall specify the sizing requirements for the BMPs and drainage improvements to be incorporated into the design of the Project.

10. Hydrology and Water Quality	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(c) (iii) 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. During construction, soil would be disturbed and compacted, which can increase the volume and velocity of stormwater runoff and increase erosion and sedimentation. In addition, construction-related pollutants such as liquid and petroleum products and concrete-related waste could be spilled, leaked, or transported via storm runoff into adjacent drainages and into downstream receiving waters. As discussed in Response 10(a), above, and specified in County Standard Condition HYD-1, the Construction General Permit requires preparation of a SWPPP and implementation of BMPs to control stormwater runoff, including the discharge of pollutants.

Project implementation would alter the drainage patterns that currently occur on the Project site. As previously described, runoff from the individual lots would generally flow to the southeast towards the internal private roadway and be collected in the proposed underground infiltration reservoir located off site adjacent to the northeastern portion of the Project site. Additionally, the underground infiltration reservoir will mimic predevelopment conditions. Furthermore, as specified in County Standard Condition HYD-2, a Final WQMP will be prepared based on the final plans and submitted to the County for review and approval. As required by the Final WQMP, the Project would require implementation of BMPs to target pollutants of concern in stormwater runoff from the Project site. With implementation of operational BMPs, as outlined in the Project CWQMP, operational impacts related to exceeding the capacity of, and providing additional sources of polluted runoff to, stormwater drainage systems would be reduced to less than significant levels. No mitigation measures are either required or recommended.

The proposed off-site underground infiltration reservoir and concrete open swale for the Coto Equestrian Preserve would be constructed adjacent to the northeast of the Project’s boundary, respectively. The underground infiltration reservoir would convey runoff around the site to a proposed storm drain connection and would ultimately connect to the existing storm drain along Via Pajaro. No change in run-off volume or velocity would occur with these off-site improvements and as such, they would not result in the exceedance of the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff.

County Standard Conditions. Refer to County Standard Conditions HYD-1 and HYD-2, above in Response 10(a).

10. Hydrology and Water Quality	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(c)(iv) Impede or redirect flood flows?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Less than Significant with Mitigation Incorporated. According to Federal Emergency Management Agency (FEMA) Flood Insurance Rate Map (FIRM) No. 06059C0452J, portions of the Project site are located within a Special Flood Hazard Area (SFHA) designated as Flood Zone AE. Areas within Flood Zone AE are subject to a 1-percent chance of annual flooding. Flood Zone AE overlies the northeast corner of the Project site and overlies the easterly half of Lot 9. Similarly, the Flood Zone boundary overlies the proposed off-site concrete open swale that would be located northeast of the Project site. Therefore, the Project may result in potential impacts associated with flood hazards.

Residential structures placed in flood hazard areas must have the lowest habitable floor, including basements, elevated to at least one foot above the base flood elevation. The base flood elevation determined for the Project site is 833 ft. Although Flood Zone AE overlies a portion of Lot 9, the final pad elevation for the structure on Lot 9 will be at 835 ft, which is two feet higher than the base flood elevation. The Project would also be required to obtain an Elevation Certificate, as outlined in Mitigation Measure HYD-1. The Elevation Certificate is part of the National Flood Insurance Program (NFIP) and is used to provide elevation information necessary to ensure compliance with community floodplain management ordinances, to determine the proper insurance premium rate. The Project Applicant shall submit technical or scientific data as part of their application to FEMA for a Letter of Map Revision based on Fill (LOMR-F). The off-site open concrete swale northeast of the Project site would be depressed into the floodplain; therefore, it would not obstruct or impede floodwater flows or raise the upstream base flood elevation.

As specified in County Standard Condition HYD-4, the Project would be required to obtain a Conditional Letter of Map Revision (CLOMR) prior to the issuance of Grading or Building Permits within the floodplain area, including but not limited to Lot 9 and a LOMR-F to adjust the floodplain boundaries pursuant to the approved Project plan prior to approval of a final map from FEMA. A CLOMR is FEMA’s comment on a proposed Project that would, upon construction, affect the hydrologic or hydraulic characteristics of a floodplain and thus result in the modification of the existing floodplain or floodway or the base flood elevation. A CLOMR does not revise an effective Flood Insurance Rate Map (FIRM); instead, it indicates whether the Project, if built as proposed, would be recognized by FEMA. An LOMR is FEMA’s modification to an effective FIRM. The

CLOMR and LOMR would ensure that the FEMA FIRM reflects the changes to the floodplain that would result from Project implementation. It should be noted that FEMA issued a notice on July 31, 2020, that they are suspending processing Applications of Letters of Map Revision based on fill (LOMR-Fs) and Conditional Letters of Map Revision based on fill (CLOMR-Fs) in Orange County, starting August 14, 2020. However, projects can be processed through the County subject to the submission of a Site Development Permit, revised plans and exhibits, and necessary documents to provide evidence that ensures today's requirements can be met in compliance with the Zoning Code (Section 7-9-42, *FP "Floodplain" Overlay District*) without LOMR/CLOMR-Fs. With implementation of Mitigation Measure HYD-1 and County Standard Condition HYD-4, potential impacts related to impeding or redirecting flood flows during construction and operation of the Project would be reduced to a less than significant level.

County Standard Condition. The following County Standard Condition is applicable to the Project:

County Standard Condition HYD-4 Letter of Map Revision. Prior to the approval of the final map, the Project Applicant shall obtain an approved Letter of Map Revision (LOMR) from the Federal Emergency Management Agency (FEMA) to adjust the floodplain boundaries pursuant to the approved Project plan. No Grading or Building Permits shall be issued in the floodplain area within the Project area, including but not limited to Lot 9, prior to approval of a Conditional Letter of Map Revision (CLOMR) or other approval granted by FEMA. Grading and Building Permits, for portions of the Project not in the floodplain area, may be issued prior to an approved CLOMR for the Project after review by staff and upon approval by the Director, OC Public Works, if the Project Applicant can demonstrate: (1) those portion(s) of the Project proposed for Grading and Building Permits can be constructed without alteration of the floodplain and altering off-site storm water runoff; (2) the Project is in compliance with the adopted CEQA documentation; and (3) Project approvals have been secured. The owners of any buildings subsequently constructed on portions of the Project site within the floodplain may be subject to the Federal Mandatory Flood Insurance purchase requirement until a LOMR or Elevation Certificate is issued.

Mitigation Measure. The following Mitigation Measure is required for the Project:

Mitigation Measure HYD-1 Flood Hazard Certification. Prior to issuance of any Certificates of Occupancy, the Project Applicant shall obtain certification from a registered professional engineer or surveyor that the constructed structures on Lot 9 comply with the requirements of Section 7-9-42, *FP "Floodplain Overlay District"* of Orange County's Codified Ordinances. The certification shall be a Federal Emergency Management Agency (FEMA) Elevation Certificate for the residence located on Lot 9. The certification shall verify

that the elevation of the first floor of the completed building, or of any habitable space, is located at least one foot above the base flood elevation for the 100-year floodplain. In addition, the certification shall verify that the on-site structure would not impede or increase the 100-year flood elevations. The certification shall be submitted to and verified by the Director, OC Public Works.

10. Hydrology and Water Quality	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(d) In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Less than Significant with Mitigation Incorporated. As discussed above in Response 10(c)(iv), a portion of the Project is located in a Special Flood Hazard Area: Zone AE. Although Flood Zone AE overlies a portion of Lot 9, the pad elevation for the structure will be at an elevation at least two feet higher than the base flood elevation. The Project would also be required to obtain an Elevation Certificate, as outlined in Mitigation Measure HYD-1, which would result in the entire Project site being outside of Flood Zone AE. The Project would introduce new land uses (residential) on the Project site, which would change the potential on-site pollutants compared to existing conditions. However, as discussed in Response 9(a), BMPs would be implemented to target and reduce pollutants of concern on the Project site. In addition, as discussed in Section 9, Hazards and Hazardous Materials, hazardous substances associated with the proposed residential use would be limited in both amount and use. The materials used on-site would be contained, stored, and used in accordance with manufacturers’ instructions and handled in compliance with applicable standards and regulations. Adherence to Mitigation Measure HYD-1 and with implementation of construction and operational BMPs, impacts would be reduced to a less than significant level.

The nearest dam to the Project site is Santiago Creek Dam, located approximately 14 miles to the northwest. However, the Project site is not within the inundation zone of Santiago Creek Dam. No dams or levees exist in in the Project area that could inundate the Project site, which is located in the higher elevations of the Specific Plan area. Therefore, impacts related to the release of pollutants in the event of inundation from flooding are considered less than significant, and no mitigation is required.

Tsunamis are ocean waves generated by tectonic displacement of the sea floor associated with shallow earthquakes, sea floor landslides, rock falls, and exploding volcanic islands. Tsunamis can have wavelengths of up to 120 miles and travel as fast as 500 miles per hour across hundreds of miles of deep ocean. Upon reaching shallow coastal waters, the waves can reach up to 50 ft in height causing great devastation to near-shore structures. The Project site is located approximately 13 miles northeast from the Pacific Ocean shoreline and is not located within a tsunami inundation area.⁴¹ Therefore, the Project site is not subject to inundation from tsunamis and there is no risk of

⁴¹ California Department of Conservation. Website: Tsunami Hazard Area for Orange County (ca.gov) (accessed December 13, 2021).

release of pollutants due to inundation from tsunami. No mitigation measures are either required or recommended.

Seiches occur when seismic ground shaking induces standing waves (seiches) inside water retention facilities (e.g., reservoirs and lakes). Such waves can cause retention structures to fail and flood downstream properties. Because there are no large lakes, reservoirs, or other water retention facilities in the vicinity of the Project site, the Project site is not at risk of inundation from seiche. Therefore, the Project site is not subject to inundation from seiche waves and there is no risk of release of pollutants due to inundation from seiche. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
10. Hydrology and Water Quality				
Would the project:				
(e) Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project is within the jurisdiction of the San Diego Regional Water Quality Control Board (RWQCB). The San Diego RWQCB adopted a Water Quality Control Plan (i.e., Basin Plan) (September 1994, with amendments effective on or before May 2016), which designated beneficial uses for all surface and groundwater within their jurisdiction and established the water quality objectives and standards necessary to protect those beneficial uses. As summarized below, the Project would comply with the applicable NPDES permits and implement construction and operational BMPs to reduce pollutants of concern in stormwater runoff.

As discussed previously in Response 9(a), Hazards and Hazardous Materials, during construction activities, excavated soil would be exposed and there would be an increased potential for soil erosion compared to existing conditions. During construction, the total disturbed area would be approximately 5.6 acres. In addition, chemicals, liquid products, petroleum products (such as paints, solvents, and fuels), and concrete-related waste may be spilled or leaked and have the potential to be transported via storm runoff into downstream receiving waters. As specified in County Standard Condition HYD-1, the Project would be required to comply with the requirements set forth by the Construction General Permit, which requires preparation of a SWPPP and implementation of construction BMPs to control stormwater runoff and discharge of pollutants.

As discussed previously in Response 9(a), the primary pollutants of concern during Project operations include bacteria and viruses, nutrients, pesticides, sediments, trash and debris, oxygen-demanding substances, and oil and grease. As specified in County Standard Condition HYD-2, a Final WQMP will detail the operational BMPs, such as the proposed underground infiltration reservoir, that would be implemented to treat stormwater runoff and reduce impacts to water quality during operation.

The Project would comply with the applicable NPDES permits, which requires preparation of a SWPPP, preparation of a Final WQMP, and implementation of construction and operational BMPs to reduce pollutants of concern in stormwater runoff. As such, the Project would not result in water quality impacts that would conflict with San Diego RWQCB's Water Quality Control Plan (Basin

Plan). Impacts related to conflict with a water quality control plan would be less than significant. No mitigation measures are either required or recommended.

The Sustainable Groundwater Management Act (SGMA) was enacted in September 2014. SGMA requires governments and water agencies of high and medium priority basins to halt overdraft of groundwater basins. SGMA requires the formation of local groundwater sustainability agencies (GSAs), who are required to adopt Groundwater Sustainability Plans to manage the sustainability of the groundwater basins. The Project site is located within the San Juan Valley Groundwater Basin, which is managed by the San Juan Basin Authority, which is comprised of the City of San Juan Capistrano, the Moulton Niguel Water District, the Santa Margarita Water District, and the South Coast Water District. The San Juan Valley Groundwater Basin is identified by the Department of Water Resources as a low priority basin; therefore, development of a Groundwater Sustainability Plan is not required. Because there is not an adopted Groundwater Sustainability Plan applicable to the groundwater basin within the Project area, the Project would not conflict with or obstruct the implementation of a sustainable groundwater management plan. Therefore, a less than significant impact would occur related to conflict or obstruction of water quality control plans or sustainable groundwater management plans. No mitigation measures are either required or recommended.

11. Land Use and Planning

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
a) Physically divide an established community?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. The Project site is located within an urbanized area of Coto de Caza, a gated community within unincorporated the County of Orange. The Project site is currently developed with a 3,453-sf maintenance building/hay barn, two round pen enclosures, and various utility apparatuses including a small operative electrical structure that retains the existing Southern California Edison transformer and Capacitor. The Project would allow the future development of the Project site with new residential uses, consistent with existing residential uses directly east and west of the Project site. Although these nearby residential dwelling units are located within the vicinity of the Project site, none of these residential areas would be encroached upon or divided by Project development. In addition, the Project site is currently surrounded by medium-density single-family residential and commercial development and would not disturb or alter access to any existing adjacent uses. Therefore, the Project would not physically divide an established community and no impacts during Project construction or operation would occur. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
11. Land Use and Planning				
Would the project:				
b) Cause a significant environmental impact due a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project site is not located within a historic district or within the California Coastal Zone.

County of Orange General Plan. The Project site is located within the unincorporated area of Orange County, and as such, is regulated by the County’s General Plan. As indicated on the County’s General Plan Land Use Map (2015), the Project site is designated as Suburban Residential (1B). The Project would allow for the future development of 13 units on an approximately 5.1-acre site, which equates to a density of approximately 2.6 dwelling units per acre. Therefore, because the Project would allow for the future development of residential uses on the site, the Project would be consistent with the land use designation on the site, which allows for residential uses at a density of 0.5 to 18 dwelling units per acre.

Because the Project proposes the future development of residential uses within PA 21, which is designated for commercial uses, the Project would require a Specific Plan Amendment (SPA) to rezone 5.1 acres within PA 21 to a new planning area, PA 5.1. PA 5.1 would allow for Low-Density Residential uses. Low-Density Residential site development standards call for a density range of 1 to 3 dwelling units per acre (du/acre). After the approval of the SPA, the Project would

be consistent with the Specific Plan. Therefore, a less than significant impact would occur during Project construction and operation. No mitigation measures are either required or recommended.

Although the Project would be developed at a higher density (1 to 3 du/acre) than other low-density residential development within PA 5 (Tract 11986 is built at 0.52 du/acre with an average lot size of 77,350 sf, and Tract 12017 is built at 0.44 du/acre with an average lot size of 94,100 sf), the Project is generally consistent with the surrounding medium-density residential developments and uses within PA 4 (Tract 11991 and Tract 12033 are built at 1.93 du/acre with an average lot size of 16,200 sf, and Tract 13081 is built at 2.33 du/acre with an average lot size of 13,600 sf), and it would not diminish the scenic views of the Project area and would likewise not block or impede surrounding views.

Coto de Caza Specific Plan. While the Project site is located within the boundaries of the County's General Plan, due to its location in the community of Coto de Caza, the guiding land use and zoning document is the Specific Plan. The Specific Plan was adopted on June 6, 1995, for the purpose of regulating growth and development within the Coto de Caza community. The Specific Plan includes texts, maps, and exhibits identifying the distribution, location, and extent of existing and proposed land uses within the Specific Plan area. Land uses allowed within the Specific Plan area include residential (mixed densities), open space, commercial, community facilities and recreation uses, however, it is important to note that the community of Coto de Caza is largely envisioned as a residential community with complementary land uses dispersed throughout the Specific Plan area.⁴²

The Specific Plan also establishes standards and criteria unique to each of the 24 Planning Areas within Coto de Caza. The Project site is located within PA 21, which is identified as Community Center Commercial. PA 21 encompasses a total of 36 acres, of which 35 are designated for open space. The Merryhill School site is included in the open space acreage within PA 21. The Project would result in the loss of 5 acres of open space in PA 21.

Because the Project proposes the future development of residential uses within a PA designated for commercial uses, the Project would require a SPA. The SPA would result in the creation of a new PA (PA 5.1) to encompass the 5.1-acre Project site currently located within a portion of PA 21. PA 5.1 would be designated as Low-Density Residential, similar to PA 4 and generally consistent with the surrounding residential development described above. The SPA would also amend the existing Statistical Table (refer to Exhibit 8, *Statistical Table*, of the Specific Plan) to rezone 5.1 acres in PA 5.1, to allocate 13 unallocated residential dwelling units to PA 5.1 from PA 2, which currently has 14 unallocated units available to transfer, and to adjust the Open Space area in PA 21 from 35 acres to a total of 30 acres (refer to Table B, *Statistical Comparison - 2021 Draft Update*). Following approval of the SPA, a less than significant impact related to applicable land use plans, policies, or regulations to the Project for the purpose of avoiding or mitigating an environmental effect would occur during Project construction and operation. No mitigation measures are either required or recommended.

⁴² Coto de Caza Specific Plan, Section C, *Plan Proposal* (1995).

12. Mineral Resources

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. According to the Specific Plan (1995), there are no known mineral resources within the Project site. According to the Orange County General Plan Resources Element, there are no known aggregate resources within the Project vicinity. The closest mineral resource areas are in Trabuco Canyon and San Juan Creek, which are located 3 miles northeast and 6.5 miles south of the Project site, respectively.⁴³ Therefore, Project construction and operation would not result in impacts related to the loss of availability of a known mineral resource that would be of value to region and residents of the State. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
12. Mineral Resources				
Would the project:				
(b) Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. The Project site is not located within an area known to contain locally important mineral resources. Therefore, no impacts related to the loss of availability of a locally important mineral resource recovery site as delineated on a local general plan, specific plan, or other land use plan would occur as a result of Project construction or operation. No mitigation measures are either required or recommended.

⁴³ Orange County General Plan. 2013. Resources Element. OC Public Works, OC Development Services. Website: <https://ocds.ocpublicworks.com/service-areas/oc-development-services/planning-development/codes-and-regulations/general-plan> (accessed September 16, 2019).

13. Noise

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project result in:				
(a) Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Discussion:

A project will normally have a significant effect on the environment related to noise if it would substantially increase the ambient noise levels for adjoining areas or conflict with the adopted environmental plans and goals of the community in which it is located. The applicable noise standards governing the Project site are the criteria in the County Noise Element of the General Plan and its Noise Ordinance. Noise impacts can be described in three categories. The first is audible impacts that refer to increases in noise levels noticeable to humans. Audible increases in noise levels generally refer to a change of 3 decibels (dB) or greater since this level has been found to be barely perceptible in exterior environments. The second category, potentially audible, refers to a change in the noise level between 1 and 3 dB. This range of noise levels has been found to be noticeable only in laboratory environments. The last category is changes in noise level of less than 1 dB, which are inaudible to the human ear. Only audible changes in existing ambient or background noise levels are considered potentially significant.

For the purpose of this analysis, the Project creates a significant noise impact if the project-related noise increase at an existing sensitive receptor is greater than 3 dB and the resulting noise level is greater than the standards cited below or if the project-related increase in noise is greater than 5 A-weighted decibels (dBA), yet the resulting noise levels are within the applicable land use compatibility standards for sensitive use.

Existing Noise Environment. Certain land uses that are considered more sensitive to noise than others are identified as sensitive receptors. Examples of these include residential areas, educational facilities, hospitals, childcare facilities, and senior housing. The Project site is located in a suburban area with a mix of residential, commercial, and open space/recreation uses. Specifically, single-family residential uses are located adjacent to the west and southwest of the Project site.

The primary existing noise sources contributing to ambient noise in the Project area are traffic associated with Vista del Verde and Via Pajaro and other noise from motor vehicles generated by engine vibrations, the interaction between the tires and the road, and vehicle exhaust systems.

Thresholds of Significance. A project will normally have a significant effect on the environment related to noise if it will substantially increase the ambient noise levels for adjoining areas or conflict with adopted environmental plans and goals of the community in which it is located. The applicable noise standards governing the Project site are the criteria in the County’s Noise Element of the General Plan and its Noise Control Ordinance.

Noise Element of the General Plan. The Noise Element of the County of Orange General Plan has developed noise standards for mobile noise sources. The County specifies outdoor and indoor noise limits for residential uses, places of worship, educational facilities, hospitals, hotels/motels, and commercial and other land uses. The noise standard for exterior living areas is 65 dBA CNEL. The County prohibits new residential land uses within the 65 dBA CNEL contour from any noise sources, including highways. The indoor noise standard is 45 dBA CNEL, which is consistent with the standard in the California Noise Insulation Standard. The County also enforces building sound transmission and indoor fresh air ventilation requirements specified in Chapter 35 of the Uniform Building Code.

Outdoor living area is a term used by the County to define spaces that are associated with residential land uses typically used for passive recreational activities or other noise-sensitive uses. Such spaces include backyards, balconies, patio areas, barbecue areas, jacuzzi areas, etc., associated with residential uses; outdoor patient recovery or resting areas associated with hospitals, convalescent hospitals, or rest homes; outdoor areas associated with places of worship that have a significant role in services or other noise-sensitive activities; and outdoor school facilities routinely used for educational purposes that may be adversely impacted by noise. Outdoor areas usually not included in this definition are the following: front yard areas, driveways, greenbelts, maintenance areas at hospitals that are not used for patient activities; outdoor areas associated with places of worship and principally used for short-term social gatherings; and outdoor areas associated with school facilities that are not typically associated with educational uses prone to adverse noise impacts (for example, school play yard areas). The County does not specify an outdoor noise standard for non-outdoor living areas.

The County's Standard Conditions of Approval require that all residential noise-sensitive structures be sound attenuated against the combined impact of all present and projected noise from exterior noise sources (including aircraft and highway noise) to meet the interior noise criteria as specified in the Noise Element and Land Use/Noise Compatibility Manual (which is 45 dBA CNEL interior).

Noise Control Ordinance. The County's Standard Conditions of Approval require that all construction vehicles or equipment, fixed or mobile, operated within 1,000 ft of a dwelling shall be equipped with properly operating and maintained mufflers. All operations shall comply with Orange County Codified Ordinance Division 6 (Noise Control). Stockpiling and/or vehicle staging areas shall be located as far as practicable from dwellings. As specified in the Orange County Codified Ordinance Division 6 (Noise Control), construction activities are generally restricted to the hours between 7:00 a.m. and 8:00 p.m. from Monday through Saturday. No construction activity is permitted on Sundays and federal holidays. Construction noise during the allowed construction time periods are exempt from the noise level provisions in the Noise Control Ordinance.

The County's Noise Control Ordinance states that exterior noise levels at residential properties within Noise Zone 1 shall not exceed the basic noise standard of 55 dBA between the hours of 7:00 a.m. and 10:00 p.m. and shall not exceed 50 dBA between the hours of 10:00 p.m. and 7:00 a.m., plus the following limits:

- Basic noise level for a cumulative period of not more than 30 minutes in any 1 hour (L_{50}); or
- Basic noise level plus 5 dBA for a cumulative period of not more than 15 minutes in any 1 hour (L_{25}); or

- Basic noise level plus 10 dBA for a cumulative period of not more than 5 minutes in any 1 hour (L_8); or
- Basic noise level plus 15 dBA for a cumulative period of not more than 1 minutes in any 1 hour (L_2); or
- Basic noise level plus 20 dBA for any period of time (L_{max}).

The basic interior noise standard for residential uses is set as 45 dBA between 10:00 p.m. and 7:00 a.m. and 55 dBA between 7:00 a.m. and 10:00 p.m., plus the following limits:

- Basic noise level for a cumulative period of not more than 5 minutes in any 1 hour (L_8); or
- Basic noise level plus 5 dBA for a cumulative period of not more than 1 minutes in any 1 hour (L_2); or
- Basic noise level plus 10 dBA for any period of time (L_{max}).

In the event that the ambient noise level exceeds any of the above noise limits, the cumulative period applicable to that category shall be increased to reflect that ambient noise level. It shall be unlawful for any person at any location within the unincorporated area of the County to create any noise or to allow the creation of any noise that causes the noise level to exceed the residential noise standards stated above. Each of the noise limits above shall be reduced 5 dBA for noise consisting of impact noise, simple tone noise, speech, music, or any combination thereof.

Federal Transit Noise Control Ordinance. Because the County has not adopted construction noise level limits, construction noise was assessed using criteria from the Federal Transit Administration's (FTA) *Transit Noise and Vibration Impact Assessment Manual* (FTA 2018). The FTA's General Assessment Construction Noise Criteria is based on the composite noise levels of the two noisiest pieces of equipment per construction phase and has a daytime noise level standard of 90 dBA L_{eq} (equivalent continuous sound level measured in A-weighted decibels) for residential uses.

Less than Significant Impact.

Short-Term Construction Noise Impacts. Short-term noise impacts would occur during future grading, site preparation, and building construction activities. Construction-related short-term noise levels would be higher than existing ambient noise levels in the Project area at the present time but would no longer occur once construction of the Project is completed.

Two types of short-term noise impacts could occur during construction of the Project. First, construction crew commutes and the transport of construction equipment and materials to the site for the Project would incrementally increase noise levels on access roads leading to the site. Based on typical construction equipment, there is a potential for a relatively high single-event noise exposure at a maximum level of 86 dBA L_{max} (maximum instantaneous noise level measured in A-weighted decibels) with trucks passing at 50 ft. However, the heavy equipment required for grading and construction activities would be moved on-site just one time and would remain on-site for the duration of each construction phase. This one-time trip, when heavy construction equipment is moved on and off site, would not add to the daily traffic noise in the vicinity of the Project site. The total number of daily vehicle trips would be minimal when compared to existing traffic volumes on the affected streets, and the long-term noise level change associated with these trips would not be perceptible. Therefore, equipment transport noise and construction-related worker

commute impacts would be short term and would not result in a significant off-site noise impact. No mitigation measures are either required or recommended.

The second type of short-term noise impact is related to noise generated during grading, site preparation, and building construction. Construction is performed in discrete steps, each of which has its own mix of equipment, and consequently its own noise characteristics. These various sequential phases would change the character of the noise generated on-site. Therefore, the noise levels vary as construction progresses. Table M, *Typical Construction Equipment Maximum Noise Levels (L_{max})*, lists maximum noise levels recommended for noise impact assessments for typical construction equipment based on a distance of 50 ft between the equipment and a noise receptor. Typical maximum noise levels range up to 94 dBA at 50 ft during the noisiest construction phases. The site preparation phase, which includes excavation and grading of the site, tends to generate the highest noise levels because the noisiest construction equipment is earthmoving equipment. Earthmoving equipment includes excavating machinery such as back fillers, bulldozers, draglines, and front loaders. Typical operating cycles for these types of construction equipment may involve one or two minutes of full-power operation followed by three or four minutes at lower power settings.

Table M: Typical Construction Equipment Noise Levels

Equipment Description	Acoustical Usage Factor (%)	Maximum Noise Level (L _{max}) at 50 Feet ¹
Compressor	40	80
Cranes	16	85
Dozers	40	85
Drill Rig	20	84
Flat Bed Trucks	40	84
Forklift	20	85
Front-end Loaders	40	80
Generator	50	82
Man-lift	20	85
Impact Pile Driver	20	95
Rollers	20	85
Water Truck	40	84
Welder	40	73

Source: Roadway Construction Noise Model (FHWA 2006).

Note: Noise levels reported in this table are rounded to the nearest whole number.

¹ Maximum noise levels were developed based on Specification 721.560 from the Central Artery/Tunnel program to be consistent with the City of Boston's Noise Code for the "Big Dig" project.

FHWA = Federal Highway Administration

L_{max} = maximum instantaneous sound level

In addition to the reference maximum noise level, the usage factor provided in Table M, *Typical Construction Equipment Maximum Noise Levels (L_{max})*, is used to calculate the hourly noise level impact for each piece of equipment based on the following equation:

$$L_{eq}(equip) = E.L. + 10 \log(U.F.) - 20 \log\left(\frac{D}{50}\right)$$

- where: $L_{eq}(equip)$ = L_{eq} at a receiver resulting from the operation of a single piece of equipment over a specified time period.
 E.L. = noise emission level of the particular piece of equipment at a reference distance of 50 ft.
 U.F. = usage factor that accounts for the fraction of time that the equipment is in use over the specified period of time.
 D = distance from the receiver to the piece of equipment.

Each piece of construction equipment operates as an individual point source. Using the following equation, a composite noise level can be calculated when multiple sources of noise operate simultaneously:

$$Leq (composite) = 10 * \log_{10} \left(\sum_{1}^n 10^{\frac{Ln}{10}} \right)$$

Using the equations from the methodology above, the reference information in Table M, *Typical Construction Equipment Maximum Noise Levels (L_{max})*, and assuming the operation of the two loudest pieces of equipment, the composite construction noise level was calculated to be 84 dBA L_{eq} at a distance of 50 ft.

Once composite noise levels are calculated, reference noise levels can then be adjusted for distance using the following equation:

$$Leq (at distance X) = Leq (at 50 feet) - 20 * \log_{10} \left(\frac{X}{50} \right)$$

In general, this equation shows that doubling the distance would decrease noise levels by 6 dBA while halving the distance would increase noise levels by 6 dBA.

It is expected that composite noise levels during construction at the nearest off-site residential land uses to the south, approximately 115 ft away, would reach 76.8 dBA L_{eq} during the site preparation phase when construction is at the Project site boundary. During an average condition, noise levels would be less than 76.8 dBA L_{eq} .

As stated above, noise impacts associated with construction activities are regulated by the County's Noise Control Ordinance. The proposed Project will be required to comply with the construction hours specified in Section 4-6-7(e) of the County's Noise Control Ordinance, which states that construction activities are allowed between 7:00 a.m. and 7:00 p.m., Monday through Saturday. No construction is permitted outside of these hours or on Sundays and specified federal holidays: New Year's Day, Memorial Day, Independence Day, Labor Day, Thanksgiving Day, and Christmas Day.

As it relates to off-site uses, construction-related noise impacts would remain below the 90 dBA L_{eq} 1-hour construction noise level criteria as established by the FTA for residential land uses, and therefore would be considered less than significant. In order to minimize construction noise levels generated to the extent feasible, County Standard Condition NOI-1 would be implemented, which would require Project construction to be limited to the hours specified in the County's Noise Ordinance.

County Standard Condition. The following County Standard Condition is applicable to the Project:

County Standard Condition NOI-1 Construction Noise. Construction shall be limited to the hours of 7:00 a.m. to 7:00 p.m. Monday through Friday and on federal holidays and 9:00 a.m. to 6:00 p.m. on Saturday. In accordance with County standards, no construction activities are permitted outside of these hours and no construction is permitted on Sundays without a special work permit.

The following measures shall be implemented to reduce potential construction noise impacts on nearby sensitive receptors:

- During all site excavation and grading, the Project contractors shall equip all construction equipment, fixed or mobile, with properly operating and maintained mufflers consistent with manufacturers' standards.
- The Project contractor shall place all stationary construction equipment so that emitted noise is directed away from sensitive receptors nearest the Project site.
- The construction contractor shall locate equipment staging in areas that will create the greatest distance between construction-related noise sources and noise-sensitive receptors nearest the Project site during all Project construction.

Operational Noise Impacts. As discussed below in Response 17(a) in Section 17, Transportation, the increase in traffic associated with the Project would be minimal, generating only 10 a.m. peak-hour and 13 p.m. peak-hour trips. Audible noises are increases in noise levels noticeable to humans and generally refer to a change of 3.0 dB or greater, because this level has been found to be barely perceptible in exterior environments. Potentially audible refers to a change in the noise level between 1.0 and 3.0 dB, which is noticeable only in laboratory environments. Changes in noise levels of less than 1.0 dB are inaudible to the human ear.

In order for traffic noise sources to result in a change of 3.0 dB or greater, traffic volumes must double. As such, project-related increases in traffic noise levels along Vista del Verde and Via Pajaro and would not be perceptible by the human ear and the Project would not generate a substantial permanent increase in ambient noise levels because project-related trips would not double the existing volumes on roadways. Therefore, project-related traffic noise on off-site land uses would be less than significant. No mitigation measures are either required or recommended.

In addition to generating minimal traffic-related noise, the Project would result in less than significant noise levels associated with the long-term operations of the development. The Project would allow for the future development of 13 residential uses, which are uses not typically

associated with high levels of operational noise. In addition, the existing residential uses are consistent with the surrounding existing land uses and would not result in land use conflicts related to noise (e.g., airport-related uses, industrial uses, etc.).

The ambient noise environment on the Project site is from predominately traffic noise from local roadways because there are no active uses on the Project site. To ensure that the ambient noise environment would be compatible, and that interior noise levels would meet the noise standards established by the County, the Project would be required to prepare a site-specific acoustical analysis, as required in County Standard Condition NOI-2. With adherence to County Standard Condition NOI-2, noise impacts would be less than significant. No mitigation measures are either required or recommended.

County Standard Condition. The following County Standard Condition is applicable to the Project:

County Standard Condition NOI-2 Acoustical Study. Prior to the issuance of any Building Permits, the Project Applicant shall submit an acoustical analysis report describing the acoustical design features of the structures required to satisfy the exterior and interior noise standards to the Manager of Building Permits Services for approval, along with satisfactory evidence which indicates that the sound attenuation measures specified in the approved acoustical report have been incorporated into the design of the Project.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
13. Noise				
Would the project result in:				
(b) Generation of excessive groundborne vibration or groundborne noise levels?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Construction of the Project would involve site preparation, and construction activities which would not involve the use of construction equipment that would result in substantial ground-borne vibration or ground-borne noise on properties adjacent to the Project site. No pile driving, blasting, or significant grading activities are proposed. Furthermore, long-term Project operations associated with residential uses would not generate substantial ground-borne noise and vibration. Off-road construction equipment consists of rubber tired dozers, tractors, backhoes, excavators, graders, cranes, forklifts, generators, welders, paving equipment, rollers, and air compressors. Therefore, the Project would not result in the generation of excessive ground-borne noise and vibration. Impacts during Project construction and operation are considered less than significant. No mitigation measures are either required or recommended.

13. Noise	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(c) For a project located within the vicinity of a private air strip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. John Wayne Airport is the closest airport to the Project site and is located 16.6 miles northwest of the Project site and beyond the 65 dBA noise contour. In addition to this airport, the Mission Hospital Regional Medical Center, which contains a heliport, is located approximately 6.4 miles southwest of the Project site, and the Corona Municipal Airport is located approximately 19 miles north of the Project site and will not pose a safety hazard or excessive noise for people residing or working in the Project area due to the distance from the Project site. Refer to the discussion in Section 9(e), Hazards and Hazardous Materials. The Project would allow for the future development of residential units on the Project site. Given the Project site’s distance from the nearest airport and heliport, Project implementation would not result in the exposure of future residents of the site to excessive noise levels related to the airport. Therefore, no impacts related to excessive airport noise would occur as a result of Project construction or operation. No mitigation measures are either required or recommended.

14. Population and Housing

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(a) Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project includes the future development of 13 low-density detached residential dwelling units. As a result, the Project would result in additional residential growth within the County and Coto de Caza community. The addition of 13 residential units would result in approximately 39 additional residents based on the estimated 2.94⁴⁴ persons per household average for the Coto de Caza Census Designated Place (CDP). Based on these calculations, Project implementation would result in an increase of approximately 0.06 percent of the Coto de Caza CDP and 0.002 percent of projected population growth for the unincorporated area of Orange County (159,100) for the year 2020.⁴⁵ Further, of the 6,268 allocated units approved for development in Coto de Caza, 5,027 units are within approved Tentative Tract Maps leaving 1,241 units available (refer to Table B). Therefore, the 39 additional residents have been accounted for in the buildout of the Specific Plan. Additionally, all utility infrastructure, including sewer and water facilities and storm drains, exist in the immediate vicinity of the Project site and can be extended to the subject property. These existing utility and service systems have adequate capacity to serve the Project (refer to Section 19, Utilities and Service Systems). Therefore, the Project would not result in significant unplanned direct or indirect population growth as a result of Project implementation. Impacts during Project construction and operation would be less than significant. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
14. Population and Housing				
Would the project:				
(b) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

No Impact. In its existing condition, the Project site does not currently contain any housing or permanent occupants. Consequently, Project implementation would not result in the displacement of any housing or people. Therefore, the Project would not result in an impact to the displacement of housing or people during Project construction or operation, and the construction of replacement housing would not be required. No mitigation measures are either required or recommended.

⁴⁴ United States Census Bureau. 2013–2017 American Community Survey 5-Year Estimates. Website: <https://data.census.gov/cedsci/all?q=coto%20de%20caza&y=2017> (accessed September 16, 2019).

⁴⁵ Southern California Association of Governments (SCAG). Growth Forecast Appendix. Website: http://rtpscs.scag.ca.gov/Documents/2012/final/SR/2012fRTP_GrowthForecast.pdf (accessed October 23, 2020).

15. Public Services

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the Project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:				
(a) Fire protection?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Fire protection services would be provided to the proposed Project by the Orange County Fire Authority (OCFA). The OCFA provides fire protection, emergency medical and rescue services, hazardous inspection and response, and public education activities to the Coto de Caza community. The closest fire station to the Project site is OCFA Fire Station No. 40, located at 25082 Vista del Verde (approximately 1.7 miles southeast of the site). During Fiscal Year 2018/2019, OFCA was staffed by 1,387 full-time-equivalent uniform and civilian personnel.⁴⁶ Given this staffing level and the 2018/2019 service area population of 1,807,862, the 2018/2019 OFCA personnel-to-resident ratio is approximately 0.8 personnel per 1,000 residents.⁴⁷

The Project site is located within a VHFHSZ according to the Fire Hazard Severity Zone Map in the County’s General Plan Safety Element (2005). However, future construction would comply with California Building Code Chapter 7A, which requires new buildings in VHFHSZ to incorporate ignition resistant construction methods and materials. Furthermore, the Project would be required to adhere to County standards requiring the Project Applicant to provide evidence of an on-site fire hydrant system to the OCFA Fire Chief to ensure adequate fire flow for use by the OCFA in the event of an on-site fire. The Project would also include the provision of an internal private street that would provide ingress/egress access to emergency vehicles in the event of a fire and would connect to the larger circulation system to ensure the adequate provision of emergency access to the Project site.

As discussed in Section 4.14, Population and Housing, the future construction of 13 additional residential units would result in an increase of 39 new residents. The Specific Plan considered a maximum of 6,268 residential units at full build-out; Project implementation of 13 units would not result in an exceedance of the number of residential units analyzed under the Specific Plan. This development and subsequent population increase would not cause the total number of future residents of Coto de Caza anticipated by the Specific Plan to be exceeded. Based on OCFA’s 2018/2019 personnel-to-resident ratio of 0.8 personnel per 1,000 residents, the increase in residents associated with the Project would not impact the personnel-to-resident ratio. As such, the Project would not necessitate the need for additional uniformed and civilian personnel to maintain the existing staffing ratio.⁴⁸ Additionally, the Project would not impair emergency response vehicles or

⁴⁶ Orange County Fire Authority (OCFA). 2018 Statistical Annual Report. Website: Microsoft Word - Final2018 StatisticalData.docx (ocfa.org) (accessed May 28, 2020).

⁴⁷ $1,807,862 / 1,000 = 1,807.86$. $1,387 / 1,807.86 = 0.76$ or 0.8 .

⁴⁸ $1,807,682 + 39 = 1,807,721$. $1,807,721 / 1,000 = 1,807.72$. $1,387 / 1,807.72 = 0.76$ or 0.8 .

increase response times and would not substantially increase calls for service to the Project site. Specifically, current levels of fire service provided to the Project site would be maintained during Project construction and operation.

In accordance with OCFA’s Architectural Review Guideline E-04 and Fire Master Plans for Commercial and Residential Development B-09 and B-09a, OCFA reviews development plans for compliance with site development and fire department access and fire flow requirements, and codes and standards for building construction.

Therefore, the Project would result in less than significant impacts to fire protection services and would not necessitate new fire protection facilities. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
15. Public Services				
Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:				
(b) Police protection?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The OCSD is responsible for providing law enforcement protection within unincorporated areas of Orange County. The OCSD has approximately 4,000 sworn and professional staff members and over 800 reserve personnel. The Project is located within the area serviced by the Southeast Operations Division. The Southeast Operations Division’s geographic area of responsibility covers over 273 square miles and includes portions of the Santa Ana Mountain range. The division provides law enforcement services to more than 280,753 residents. The Southeast Division deploys 65 patrol cars during each 24-hour period to carry and employs approximately 223 staff members, of which 168 are sworn police officers. Given the existing population within the Southeast Operation Division, the current officer-to-resident ratio is approximately 0.6 officer per 1,000 residents.⁴⁹

The closest station to the Project is the OCSD Saddleback Station, located at 20202 Windrow Drive, approximately 5 miles northwest of the site. The Saddleback station deploys 118 deputies, 12 sergeants, 13 investigators, 11 community service officers, as well as support staff and volunteers. Deputies at the station patrol Lake Forest, Mission Viejo, Rancho Santa Margarita and all unincorporated areas east of the I-5 in south Orange County including Coto de Caza. The OCSD does not use a standard officer-to-population or standard response time objective ratio to measure the adequacy of policing levels in the County. Instead, the OCSD analyzes demographics, service calls, population, crime trends, and other changing factors to determine the level of police protection services needed.

⁴⁹ 280,753 / 1000 = 280.753. 168 / 280.753 = 0.5983 or 0.6.

As discussed in Section 4.14, Population and Housing, the Project includes the future development of 13 residential units that would result in an increase of 39 residents and their visitors.

The Specific Plan considered a maximum of 6,268 residential units in Coto de Caza at full build-out; however, approximately 20 percent of these approved residential units have not yet been constructed. As such, the volume of calls for service to the Coto de Caza community do not exceed, nor approach the maximum of what was previously planned for. Additionally, the Project site previously contained abandoned and degraded structures that had been vandalized and/or trespassed, which required calls for service to the Project site. Since the demolition of these structures, calls for service to the Project site have decreased. Therefore, implementation of the proposed Project would not result in an increase in calls for service to the area that exceeds existing conditions, or reaches a volume that was not previously planned for.

Project implementation of 13 units would not result in an exceedance of the number of residential units analyzed under the Specific Plan. This development and subsequent population increase would not cause the total number of future residents of Coto de Caza anticipated by the Specific Plan to be exceeded. Furthermore, based on the Southeast Operation Division’s current officer-to-resident ratio of 0.6 officer per 1,000 residents, the increase in residents associated with the Project would not impact the officer-to-resident ratio. As such, the Project would not necessitate the need for additional sworn officers to maintain the existing staffing ratio.⁵⁰ Additionally, given the size and nature of the future residential uses, the Project would not result in significant impacts related to policing demand or necessitate the need for new police facilities during Project construction and operation. No mitigation measures are either required or recommended.

15. Public Services	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:				
(c) Schools?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project is located within the Capistrano Unified School District (CUSD). CUSD encompasses 195 square miles in seven cities and unincorporated areas of Orange County and includes all or part of the cities of San Clemente, Dana Point, San Juan Capistrano, Laguna Niguel, Aliso Viejo, Mission Viejo, and Rancho Santa Margarita, and the communities of Las Flores, Dove Canyon, Ladera Ranch, Sendero/Rancho Mission Viejo, Wagon Wheel, and Coto de Caza. CUSD has an enrollment of approximately 54,036 students and operates 64 schools/

⁵⁰ 280,753 + 39 = 280,792. 280,792 / 1000 = 280.792. 168 / 280.792 = 0.5983 or 0.6.

programs including: 33 elementary schools, 2 K-8 schools, 6 comprehensive high schools, 6 charter schools, and 8 alternative schools/programs.⁵¹

Based on CUSD student generation rates for detached housing, shown in Table N, *Project-Generated Students*, it is estimated that the Project would generate approximately 3 elementary school students, 2 middle school students, and 2 high school students. The increase in students would incrementally increase the demand for school facilities.

Table N: Project-Generated Students

School Level	Single-Family Detached Units
Elementary School	0.1782
Middle School	0.1006
High School	0.1348
Total	0.4136

However, as noted above, the total number of allowed residential units in Coto de Caza have not been constructed and therefore, the seven additional students associated with the proposed 13 residential units were included in the environmental analysis included in Final EIR 401 that evaluated potential impacts to schools.

Pursuant to California Education Code Section 17620(a)(1), the governing board of any school district is authorized to levy a fee, charge, dedication, or other requirement against any construction within the boundaries of the district for the purpose of funding the construction or reconstruction of school facilities. The Project Applicant would be required to pay such fees to reduce any impacts of new residential development of school services. Payment of the developer fees will offset the addition of school-age children within the district. No significant impacts would occur during Project operation or construction. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
15. Public Services				
Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:				
(d) Parks?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Orange County Parks (OC Parks) manages and operates a system of regional parks, beaches, harbors, trails and historic sites throughout the County. Orange County features 60,000 acres of parkland, open space, and shoreline. The Project site is 0.25 mile southeast

⁵¹ Capistrano Unified School District (CUSD). CUSD Facts. Website: District Facts (schoolloop.com) (accessed February 2, 2016).

of the Coto Sports and Recreation Park and 3.5 miles north of the Thomas F. Riley Wilderness Park, a 544-acre wilderness park with 5 miles of multi-use and single-track trails.

To ensure sufficient standards for recreational opportunities, the County has established a local park policy of providing 2.5 acres of local parkland for every 1,000 County residents. This policy is implemented through the Local Park Code. The Local Park Code requires 2.5 acres of land per 1,000 persons when residential dwelling units are proposed. The Code also allows for the payment of in-lieu fees or a combined provision of parkland and payment of in-lieu fees when the community is better served through the provision of parkland outside but near the property served. The Project includes the future development of 13 residential units. Proposals with 50 or fewer dwelling units meet Local Park Code requirements by depositing a payment of fees into a Local Park Trust Fund intended to provide for the acquisition and development of local park sites in the general area which serve the future residents of the property from which the fees are derived (for further discussion, refer to Section 16, Recreation, Response (a) of this IS/MND).

Similarly, Final EIR 401 also evaluated the potential impacts of buildout of the Specific Plan on park and recreational facilities. Based on the adequate amount of park and recreational facilities in the Project vicinity, the future development of 13 residential units resulting in 39 additional residents would not result in substantial physical impacts or impact performance objectives for parks in the Project area. With payment of the park in-lieu fees in accordance with the mandatory provisions of Section 7-9-522 of the County of Orange Codified Ordinances, no significant project-related impacts to park/public recreation would occur during Project operation or construction. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
15. Public Services				
Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:				
(e) Other public facilities?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Orange County Public Library (OCPL) has a network of 33 libraries throughout the County. The Rancho Santa Margarita Library is located at 30902 La Promesa, approximately 1.25 miles north of the Project site. According to the Growth Management Element of the Orange County General Plan, the County’s standards for library service are one 10,000 sf branch library facility per 50,000 residents, or if appropriate, one 15,000 sf regional library per 75,000 residents. The Rancho Santa Margarita Library is approximately 10,000 sf,⁵² while Coto de Caza’s estimated population in 2010 was 14,866.⁵³ Therefore, the OCPL is currently meeting the County’s standard for library size for the area.

⁵² Rancho Santa Margarita Public Library. Personal Communication. March 31, 2016.

⁵³ United States Census Bureau. Website: <http://www.census.gov/quickfacts/table/PST045215/0616580,00> (accessed March 31, 2016).

The Project involves the future development of 13 residential units resulting in a population increase of 39 persons. As such, the future Project would not induce substantial population growth that would generate an increased need for additional public facilities (e.g., libraries). Furthermore, authorized by Government Code Section 66001(e), the Orange County Board of Supervisors adopted resolution No. 13-062 with respect to the Development Program for Branch Libraries, stating that those facilities have been constructed and the fee program is no longer needed. Therefore, construction and operation of the Project would result in less than significant impacts to libraries in the County. No mitigation measures are either required or recommended.

16. Recreation

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(a) Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Final EIR 401 evaluated the impacts to recreational facilities associated with the total maximum buildout of the Specific Plan (6,419 dwelling units); ultimate buildout has not been completed yet. Several County regional parks facilities are located within the vicinity of Coto de Caza, including the General Thomas F. Riley Wilderness Park in PA 18. Final EIR 401 provides for 482 acres of recreation space and 591 acres of Open Space. In conjunction with the Local Park Code, the County Master Plan for Local Parks is intended to provide for comprehensive local park planning programming. The County has established a local park policy of providing 2.5 acres of local parkland for every 1,000 County residents. This policy is implemented through the Local Park Code. The Local Park Code requires 2.5 acres of land per 1,000 persons when residential dwelling units are proposed. The Code also allows for the payment of in-lieu fees when the community is better served through the provision of parkland outside but near the property served.

The Project includes the future development of an approximately 5.1-acre site with 13 residential dwelling units. Proposals with 50 or fewer dwelling units meet Local Park Code requirements by depositing a payment of fees into a Local Park Trust Fund. As stipulated in County Standard Condition REC-1, in-lieu fees for the future development of the 13 residential units pursuant to Article 5, Section 7-9-520 through 7-9-530, *Residential Subdivisions*, of the Orange County Codified Ordinances will be required.

The 39 additional residents resulting from the future development would not create a substantial increased use of existing parks and recreational facilities within Coto de Caza, as the total number of approved residential units under the Coto de Caza Final EIR 401 have not been constructed. Because the community has not reached buildout, existing parkland has not reached maximum usage, and parkland planned for in the Specific Plan has yet to be built out. The impacts resulting from the addition of 39 residents to existing parkland would be negligible and adequate parkland is included in Coto de Caza Final EIR 401. Therefore, with implementation of County Standard Condition REC-1, the construction and operation of the Project would result in less than significant impacts related to the increased use and subsequent deterioration of recreational facilities. No mitigation measures are either required or recommended.

County Standard Condition. The following County Standard Condition is applicable to the Project:

County Standard Condition REC-1 In-Lieu Fees. Prior to the issuance of any Building Permits, the Project Applicant will be required to pay in-lieu fees pursuant to Article 5, Section 7-9-520 through 7-9-530 of the Orange County Codified Ordinances. The final amount of in-lieu fees shall be approved by the

Subdivision Committee. Any approval of the payment of park fees shall be made by the Subdivision Committee prior to or concurrently with the approval of the tentative map, and such approval shall be shown on the face of the tentative map and by conditions of approval.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
16. Recreation				
Would the project:				
(b) Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project does not include the construction or expansion of any recreational facilities. As previously stated, the expected population growth of 39 residents will not require the expansion of other recreational facilities, or cause adverse environmental effects related to expansion of such facilities during Project construction or operation. No mitigation measures are either required or recommended.

17. Transportation/Traffic

Potentially Significant Impact Less than Significant with Mitigation Incorporated Less than Significant Impact No Impact

Would the project:				
(a) Conflict with a program, plan, ordinance or policy addressing the circulation system, including roadway, bicycle, and pedestrian facilities?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Discussion:

The following section is based on the *Coto de Caza - Oak Grove Residential Traffic Assessment* conducted by LSA in October 2019 and included as Appendix F and the County’s *Guidelines for Evaluating Vehicle Miles Traveled under CEQA*, adopted by the Board of Supervisors in November 2020 and included as Appendix H. Level of Service (LOS) analysis is required by the County’s *Transportation Implementation Manual* (March 15, 1994; amended November 17, 2020), which is part of the Growth Management Element of the County’s General Plan. Therefore, the LOS analysis is presented below to aid in evaluating whether the Project would conflict with any programs, plans, ordinances, or policies addressing the circulation system.

Less than Significant Impact. An analysis of the Existing Baseline Conditions and Existing Baseline Plus Project Conditions was conducted to determine the potential traffic impacts as a result of Project implementation.

As previously stated, the Project will result in the construction of 13 single-family dwelling units. Project trips were generated using the Institute of Transportation Engineers (ITE) *Trip Generation Manual*, 10th Edition (2017), as presented in Table O, *Oak Grove Trip Generation Comparison*. This table indicates the proposed 13 single-family dwelling units would generate 10 a.m. peak-hour trips, 13 p.m. peak-hour trips, and 123 average daily trips (ADT).

Table O: Oak Grove Trip Generation Comparison

Land Use	Size	Unit	ADT	AM Peak Hour			PM Peak Hour		
				In	Out	Total	In	Out	Total
Trip Rates¹									
Single-Family Detached Housing		DU	9.44	0.19	0.55	0.74	0.62	0.37	0.99
Project Trip Generation (13 Single-Family Detached Residential)									
Single-Family Detached Housing	13	DU	123	2	8	10	8	5	13

Source: *Coto de Caza - Oak Grove Residential Traffic Assessment* (LSA 2019).

¹ Trip rates referenced from the Institute of Transportation Engineers (ITE) *Trip Generation Manual*, 10th Edition (2017).

ADT = average daily trips

DU = dwelling unit

As instructed by County Guidelines, the 2016 *Highway Capacity Manual* (HCM) methodology was used to determine LOS. The HCM 2016 unsignalized intersection methodology presents LOS in terms of total intersection delay and approach delay of the major and minor streets (in seconds per vehicle). The resulting delay is expressed in terms of LOS. The relationship of delay to LOS is demonstrated in the following table:

Levels of Service	Unsignalized Intersection Delay (seconds)
A	≤10.0
B	>10.0 and ≤15.0
C	>15.0 and ≤25.0
D	>25.0 and ≤35.0
E	>35.0 and ≤50.0
F	>50.0

Source: *Coto de Caza - Oak Grove Residential Traffic Assessment* (LSA 2019).

The Synchro 10 software was used to determine the LOS at the study area unsignalized intersection of Coto de Caza Drive/Vista del Verde and Vista del Verde/Via Pajaro. These intersections were selected because traffic to and from the Project site would pass through this intersection when accessing the nearest gate to the private community.

The County’s Growth Management Element *Transportation Implementation Manual* states that a project impact occurs when the intersection in question exceeds the acceptable LOS (LOS D) and the project volume results in a 1 percent increase in volume/capacity ratio of the sum of all critical movements. This threshold, however, is based on a signalized intersection. For purposes of this traffic assessment, the impact of an unsignalized intersection would be significant if the project adds 1 second of delay to an intersection operating at LOS E or LOS F.

The Sphere of Impact study area includes the Coto de Caza Drive/Vista del Verde and Vista del Verde/Via Pajaro intersections. In order to evaluate the impacts of the added Project trips, the Existing Baseline and Existing Baseline Plus Project conditions have been assessed. Existing a.m. and p.m. peak-hour traffic volumes were collected on a typical weekday (September 18, 2019) by an independent count company (Counts Unlimited). The traffic counts are provided in Appendix F. The weekday peak hours (i.e., highest 1-hour period between 7:00 a.m. and 9:00 a.m. and highest 1-hour period between 4:00 p.m. and 6:00 p.m.) are evaluated because they represent peak commute times (i.e., employees driving to work in the morning and driving home in the evening).

Existing Baseline Conditions and LOS Analysis. The Coto de Caza Drive/Vista del Verde intersection operates at LOS D in the a.m. peak hour (28.4 seconds of vehicle delay) and at LOS C in the p.m. peak hour (23.3 seconds of vehicle delay). The Vista del Verde/Via Pajaro intersection operates at LOS A in the a.m. peak hour (9.5 seconds of vehicle delay) and at LOS B in the p.m. peak hour (10.3 seconds of vehicle delay). According to the County’s standards, these intersections are performing at acceptable LOS during both peak hours in the existing condition.

Existing Baseline Plus Project Conditions and LOS Analysis. The Existing Baseline Plus Project volumes are calculated by adding Project trips to the existing traffic counts. With future project-related traffic, the Coto de Caza Drive/Vista del Verde intersection operates at LOS D in the a.m. peak hour (29.5 seconds of vehicle delay) and LOS C in the p.m. peak hour (24.1 seconds of vehicle delay). With future project-related traffic, the Vista del Verde/Via Pajaro intersection operates at LOS A in the a.m. peak hour (9.5 seconds of vehicle delay) and LOS B in the p.m. peak hour (10.3 second of vehicle delay). A summary of intersection LOS is provided in Table P, *Existing and Existing Plus Project Intersection Level of Service Summary*, below.

Table P: Existing and Existing Plus Project Intersection Level of Service Summary

Study Area Intersection	Time Period	Existing		Existing Plus Project		Delay Increase	Significant Impact?
		Delay	LOS	Delay	LOS		
Coto de Caza Drive/Vista del Verde	A.M.	28.4	D	29.5	D	1.1	No
	P.M.	23.3	C	24.1	C	0.8	No
Vista del Verde/Via Pajaro	A.M.	9.5	A	9.5	A	0.0	No
	P.M.	10.3	B	10.3	B	0.0	No

Source: *Coto de Caza - Oak Grove Residential Traffic Assessment* (LSA 2019).
 LOS = level of service

While the intersection of Coto de Caza Drive/Vista del Verde would increase vehicle delay by more than 1 second during the a.m. peak hour, the intersection does not result in an unacceptable LOS (E or F) in either the a.m. or p.m. peak hours and would not exceed the County’s significance threshold of LOS D (*Transportation Implementation Manual* [March 1994, amended November 17, 2020]). The Project represents an increase of 1.1 seconds of delay in the a.m. peak hour and 0.8 second of delay in the p.m. peak hour at the Coto de Caza Drive/Vista del Verde intersection and no increase in delay at the Vista del Verde/Via Pajaro intersection.

In accordance with the County’s guidelines, the addition of 123 ADTs from the development of 13 single-family dwelling units would not cause a significant impact at the primary intersections for the Project within the Coto de Caza community. Furthermore, the Project would be required to comply with County Standard Condition TRF-1, Road Fee Program, which would require payment of fees for the Major Thoroughfare and Bridge Fee Program for the Foothill/Eastern Transportation Corridor to improve the overall subregional roadway network. Therefore, the Project would not create any conflicts with the LOS thresholds outlined in the County’s *Transportation Implementation Manual*. Accordingly, the Project would not conflict with any plan, ordinance, or policy establishing measures of effectiveness for the performance of the circulation system or congestion management program (i.e., LOS standards). Impacts during Project construction and operation would be less than significant. No mitigation measures are either required or recommended.

County Standard Condition. The following County Standard Condition is applicable to the Project:

- County Standard Condition TRF-1** Prior to the issuance of Building Permits, the Project Applicant shall pay fees for the Major Thoroughfare and Bridge Fee Program listed below, in a manner meeting the approval of the Manager, Subdivision and Grading.
- a. Coastal Area Road Improvements and Traffic Signals
 - b. El Toro Road
 - c. Foothill/Eastern Transportation Corridor
 - d. Foothill Circulation Phasing Program
 - e. Moulton Parkway/Laguna Niguel Area

- f. Plano Trabuco
- g. Santiago Canyon Road
- h. San Joaquin Hills Transportation Corridor

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
17. Transportation/Traffic				
Would the project:				
(b) Conflict or be inconsistent with CEQA Guidelines §15064.3 subdivision (b)?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. According to *CEQA Guidelines* 15064.3(a), project-related transportation impacts are generally best measured by evaluating the project’s VMT. VMT refers to the amount and distance of automobile travel attributable to a project.

CEQA Guidelines Section 15064.3(b) sets forth criteria for analyzing transportation impacts, breaking down the methodology based on project type and specifying other criteria for conducting VMT analysis. The *CEQA Guidelines* Section 15064.3(b) state that if the vehicle miles traveled (VMT) generated by a project exceed an applicable threshold of significance, this may indicate a significant impact. The guidelines also state that projects which decrease VMT in the project area when compared to existing conditions should be presumed to have a less than significant impact.

According to the County’s *Guidelines for Evaluating Vehicle Miles Traveled under CEQA*, adopted by the Board of Supervisors in November 2020 and included as Appendix H, land development projects that are considered Small Projects are presumed to create a less than significant impact on transportation and circulation. Small Projects are defined as land development projects that generate 500 or fewer ADT. As stated above in Response 17(a), the proposed 13 single-family dwelling units would generate 123 ADT. As such, the Project’s 123 ADT is below the screening threshold of 500 ADT and is considered a Small Project. Therefore, under the County’s *Guidelines for Evaluating Vehicle Miles Traveled under CEQA*, the Project would be presumed to result in less than significant impacts. For the reasons stated above, implementation of the Project would result in less than significant impacts related to VMT. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
17. Transportation/Traffic				
Would the project:				
(c) Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project is a residential use that is considered a compatible use with the surrounding area that includes residential uses. There are no sharp curves or other roadway design elements that would create dangerous conditions (Figure 7, *Conceptual Site Plan*). Access to

the Project site would be provided via an unsignalized driveway off of Vista del Verde that would provide ingress/egress access to the residences via the internal road. The Project would comply with the standards prescribed in the Specific Plan. In addition, the Project would also be required to submit plans to the Orange County Fire Authority for review and approval prior to the issuance of Building Permits to ensure there are no substantial hazards associated with the Project design. Because of the presence of the off-site 60-inch diameter oak tree at the entry and the intent to incorporate the off-site oak tree into the Project design, the Project Applicant has applied for a deviation from Standard Plan 1117 - Intersection Sight Distance to exceed the 10 ft line of the site requirements and allow exiting vehicles to move an additional 4 ft beyond the curb so that the driver may see around the oak tree a greater distance than the required minimum sight distance of 390 ft. However, this design feature would not substantially increase hazards because drivers would still be able to see around the oak tree and check for oncoming vehicles, thereby providing for improved safety at the Project entry. Therefore, the construction and operation of the Project would result in a less than significant impact related to hazards of internal circulation and egress from the Project site associated with a design feature. No mitigation measures are either required or recommended.

17. Transportation/Traffic	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(d) Result in inadequate emergency access?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. While there is an existing access road off Vista del Verde that would be eliminated as part of the Project, a new ingress/egress access road to Vista del Verde would be provided to the Project site via a new internal private street. Future development of the Project would not alter any existing roadways or prohibit access to the Project site or surrounding areas. Further, the Project’s site plan would be subject to review and approval by the OCFA to ensure the Project includes adequate emergency ingress/egress access. Therefore, the construction and operation of Project would result in less than significant impacts related to emergency access. No mitigation measures are either required or recommended.

18. Tribal Cultural Resources

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:				
(a) Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code section 5020.1(k), or	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(b) A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1. In applying the criteria set forth in subdivision (c) of public Resource Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. While future construction activities are not anticipated to unearth any previously unknown archaeological resources, pursuant to Senate Bill (SB) 18 and Assembly Bill (AB) 52, Native American consultation was conducted to obtain input from Native American tribes regarding potential resources in the Project area. Chapter 532, Statutes of 2014 (i.e., AB 52), requires that Lead Agencies evaluate a project’s potential to impact “tribal cultural resources.” Such resources include “[s]ites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native American tribe that are eligible for inclusion in the California Register of Historical Resources or included in a local register of historical resources.” AB 52 also gives Lead Agencies the discretion to determine, supported by substantial evidence, whether a resource qualifies as a “tribal cultural resource.” Also, per AB 52 (specifically PRC 21080.3.1), Native American consultation is required upon request by a California Native American tribe that has previously requested the County provide it with notice of such projects.

SB 18 requires local governments to consult with tribes prior to making certain planning decisions and to provide notice to tribes at certain key points in the planning process. These consultation and notice requirements apply to adoption and amendment of both general plans (defined in Government Code section 65300 et seq.) and specific plans (defined in Government Code section 65450 et seq.).

The County initiated Native American consultation pursuant to AB 52 requirements by sending notice letters to the following tribes on November 21, 2016: Soboba Band of Luiseño Indians, Juaneño Band of Mission Indians, and Gabrieleño Band of Mission Indians – Kizh Nation. The County initiated Native American consultation pursuant to SB 18 requirements by sending notice letters to the following tribes on January 13, 2017: Juaneño Band of Mission Indians, Pauma Band of Luiseño Indians, and the Soboba Band of Luiseño Indians. The Gabrieleño Band of Mission Indians – Kizh Nation responded and did not request further consultation. No other tribes responded to the notices. Consultation was concluded on February 14, 2017. Cultural Resources were previously evaluated in Section 5, Cultural Resources, and considered the potential for the

Project to impact historical resources and archaeological resources. In Responses 5(a) and 5(b), impacts were determined to be less than significant and would not require mitigation to historical resources and archaeological resources, respectively. County Standard Condition CUL-1 requires archaeological observation and salvage during ground-disturbing activities, further minimizing the potential for any project-related impacts.

In Response 5(c), the potential for human remains to be disturbed was evaluated and included Regulatory Requirement CUL-1. With the implementation of this mandatory obligation, less than significant impacts to human remains would result. No mitigation measures are either required or recommended.

Although the Project area is not in an area of previously identified for archaeological sensitivity, the possibility exists that undiscovered Tribal Cultural Resources (TCRs) may be encountered during ground-disturbing activities associated with the Project. Implementation of Standard Condition TCR-1 would provide consulting Native American groups the opportunity to examine inadvertently discovered prehistoric cultural resources and consult on the identification, evaluation, and protection of TCRs if they are discovered during construction.

County Standard Condition TCR-1 Unanticipated Discovery of Archaeological Resources Below 6 Feet Depth in Previously Undisturbed Soils. If unanticipated archaeological resources or deposits are discovered during ground-disturbing activities below 2 feet depth in previously undisturbed soils, OC Public Works will implement the following measures. All work will halt within a 50-foot radius of the discovery. OC Public Works will have a qualified professional archaeologist with knowledge of Native American resources assess the significance of the find. If the resources are Native American in origin, the County shall coordinate with the Tribe regarding evaluation, treatment, curation, and preservation of these resources. The archaeologist will have the authority to modify the no-work radius as appropriate, using professional judgment in consultation with OC Public Works. Work will not continue within the no-work radius until the archaeologist conducts sufficient research and evidence and data collection to establish that the resource is either: (1) not cultural in origin; or (2) not potentially eligible for listing in the California Register of Historical Resources. If a potentially eligible resource is encountered, then the archaeologist and OC Public Works, as lead agency, in consultation with the Tribe, will arrange for either: (1) avoidance of the resource, if possible; or (2) test excavations to evaluate eligibility, and if eligible, an attempt to resolve adverse effects to determine appropriate mitigation. The assessment of eligibility will be formally documented in writing as verification that the provisions in

CEQA for managing unanticipated discoveries and Public Resources Code Section 5024 have been met.

Therefore, with implementation of County Standard Conditions CUL-1 and TCR-1, and Regulatory Requirement CUL-1 as well as completion of Native American consultation pursuant to SB 18 and AB 52, impacts to tribal cultural resources during construction and operation of the Project would be less than significant. No mitigation measures are either required or recommended.

19. Utilities and Service Systems

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(a) Require or result in the relocation or construction of new or expanded water, wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact.

Water. The Project site is served by the Santa Margarita Water District (SMWD). Per the Project’s Proposed Water and Sewer Easements plan (Figure 9, *Proposed Water and Sewer Easements*), which depicts proposed water facilities, all proposed private water lines would be installed within existing roadways or utility easements that are intended solely for the purpose of utility placement. The locations of the easements are not within sensitive natural areas or on slopes where erosion may occur. Furthermore, in a will serve letter dated August 28, 2018, and included as Appendix G in this IS/MND, the Santa Margarita Water District confirmed its ability to provide water to 13 residential units on the Project site, and no new or expanded water facilities beyond the immediate Project site are required. Therefore, impacts during construction and operation of the Project are considered less than significant. No mitigation measures are either required or recommended.

Wastewater. Per the Project’s Proposed Water and Sewer Improvements plan (Figure 9, *Proposed Water and Sewer Easements*), which depicts proposed wastewater facilities, all proposed private sewer lines would be installed within existing roadways or utility easements that are intended solely for the purpose of utility placement. The locations of the easements are not within sensitive natural areas or on slopes where erosion may occur. Furthermore, in a will serve letter dated August 28, 2018, and included as Appendix G, the Santa Margarita Water District confirmed that capacity exists to accept and treat wastewater that would be generated by the Project and no new or expanded water facilities beyond the immediate Project site are required. Therefore, impacts during construction and operation of the Project are less than significant. No mitigation measures are either required or recommended.

Stormwater Drainage. As discussed in Section 10, Hydrology and Water Quality, there would be an increase in impervious surfaces on the Project site (from approximately 1.0 acre [20 percent] to 3.1 acres [60 percent]). The Project includes on-site surface conveyance facilities, an off-site underground infiltration reservoir, and drainage infrastructure.

Construction activities associated with the Project would adhere to BMPs to increase infiltration and reduce the rate and amount of surface runoff from the Project site. Therefore, the Project would not contribute additional runoff to the downstream stormwater drainage facilities or cause the expansion of existing facilities. No mitigation measures are either required or recommended.

Project operation would require improvements to the on-site storm drain system to accommodate runoff associated with Project implementation. The Project site would direct runoff to collection points, which would subsequently convey runoff to storm drains. Improvements to the existing

storm drainage infrastructure would be similar to those currently present on the site and would connect to the existing storm drain system. Therefore, the construction and operation of the Project would not require or result in the construction of new stormwater drainage facilities or the expansion of existing facilities, the construction of which could cause significant environmental effects. A less than significant impact related to the construction of a storm drainage system would occur during construction and operation. No mitigation measures are either required or recommended.

Off-site drainage improvements constructed northeast of the Project site boundary would convey runoff around the site to the existing storm drain along Via Pajaro. No change in run-off volume would occur with these off-site improvements, and as such, they would not result in the need for construction of new storm water drainage facilities or the expansion of existing facilities.

Natural Gas. Natural gas is provided to the Project site by San Diego Gas & Electric. The abandoned and recently demolished use on the Project site (Merryhill School) included natural gas services; therefore, no new off-site natural gas facilities would be required to serve the site and no new or expanded natural gas facilities beyond the immediate Project area are required. As documented in Section 6, Energy, Table I, *Estimated Annual Energy Use of the Proposed Project*, natural gas usage is estimated at 335,464 British thermal units (Btu) annually for 13 residential single-family homes. The 13 units were accounted for in the overall residential development allowed under the Specific Plan; therefore, the natural gas demand from the Project would not require expansion of existing facilities or new entitlements. Impacts during construction and operation of the Project are less than significant. No mitigation measures are either required or recommended.

Telecommunication Facilities. The main telecommunication facility providers in Coto de Caza are AT&T and Cox. The Project site and surrounding area are already served by existing telecommunication facilities. No new off-site telecommunication facilities would be required to serve the site, and no new or expanded telecommunication facilities beyond the immediate Project are required. As such, impacts during construction and operation of the Project are less than significant. No mitigation measures are either required or recommended.

19. Utilities and Service Systems	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(b) Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The SMWD services approximately 160,000 customers in Mission Viejo, Rancho Santa Margarita, and the unincorporated areas of Las Flores, Ladera Ranch, Talega, and Coto de Caza. SMWD provides approximately 34,405 acre-feet annually to its 160,000

customers. Approximately 26,910 acre-feet of the water supply is imported, and 7,495 acre-feet is recycled water.⁵⁴

In May 2016, the Governor of the State of California issued an Executive Order (EO B-37-16) directing the Department of Water Resources and four additional State agencies (the SWRCB, the California Public Utilities Commission, the California Department of Food and Agriculture, and the California Energy Commission) to set actions to use water more wisely, eliminate water waste, strengthen local drought resilience, and improve agricultural water use efficiency and drought planning. The Executive Order directs the agencies identified above to establish a long-term water conservation framework that will enhance the resiliency of California communities against climate changes and drought.⁵⁵

The SMWD Board of Directors adopted Comprehensive Water Conservation Program Ordinance No. 2014-10-03 in October 2014, which establishes a comprehensive water conservation program that will encourage reduced water consumption within SMWD through conservation, enable effective water supply planning, assure reasonable and beneficial use of water, prevent waste of water, and maximize the efficient use of water within SMWD. Along with permanent water conservation requirements, SMWD’s Comprehensive Water Conservation Program consists of the following four stages found in Table Q, *SMWD Water Supply Shortage Stages and Conditions*. The stages are triggered in response to a reduction in potable water available to SMWD for distribution to its customers, with Stage 1 in effect at all times unless a mandatory conservation stage (Stages 2, 3, and 4) has been implemented by the Board of Directors.

Table Q: SMWD Water Supply Shortage Stages and Conditions

Stage Number	Complete Both	
	Supply Reduction	Water Supply Condition
1	Up to 10%	Exists when SMWD encourages customers to voluntarily conserve water.
2	Up to 20%	Exists when SMWD determines water supply shortage exists and consumer demand reduction necessary to use water efficiently and respond to water conditions.
3	Up to 40%	Exists when SMWD notifies residents and businesses significant reduction in consumer demand is necessary to maintain sufficient water supplies for public health and safety.
4	Over 40%	Exists when SMWD declares severe drought conditions exists and significant reduction in consumer demand necessary to maintain sufficient water supplies for public health and safety.

Source: *Urban Water Management Plan* (SMWD June 2016).
 SMWD = Santa Margarita Water District

⁵⁴ Santa Margarita Water District (SMWD). 2016. *Urban Water Management Plan 2015*. Website: <https://www.smwd.com/DocumentCenter/View/1823/2015-Urban-Water-Management-Plan> (accessed October 23, 2020).

⁵⁵ California Department of Water Resources. Website. Website: DWR and State Water Board Release Primer on 2018 Water Conservation and Drought Planning Legislation (ca.gov) (accessed November 18, 2019).

The Project includes the future development of 13 residential units that will result in additional water demand. However, the additional residential units are within the overall approved number of residential units for the Specific Plan and would not result in a significant increased water demand over that which was estimated for the Coto de Caza area in Final EIR 401, including the demand generated by the abandoned and recently demolished Merryhill School use. Furthermore, in a will serve letter dated August 28, 2018, and included as Appendix G, the Santa Margarita Water District confirmed its ability to provide water to 13 residential units on the Project site. The sufficiency of water supply is in part due to SMWD projects that converted landscape irrigation water from domestic to recycled water within Coto de Caza. Therefore, the Santa Margarita Water District would be able to serve the Project from existing entitlements and resources and would not require new or expanded entitlements.

The increased demand for water for 13 units would be typical of other residential uses in the area and would not be substantial. Further, the Specific Plan considered a maximum of 6,268 residential units at full build-out; Project implementation of 13 units would not result in an exceedance of the number of residential units analyzed under the Specific Plan. The future construction and operation of the development would be required to comply with all water saving regulations and emergency orders related to the reduction of water use. Overall, impacts related to water supplies are considered less than significant during construction and operation of the Project because the number of units has been previously planned. No mitigation measures are either required or recommended.

19. Utilities and Service Systems	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(c) Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The SMWD operates wastewater facilities within Coto de Caza. The majority of Coto de Caza's wastewater is delivered to the Chiquita Water Treatment Plant in San Juan Capistrano.⁵⁶ Per the Project's Proposed Water and Sewer Improvements plan (Figure 9), which depicts proposed wastewater facilities, all proposed private sewer lines would be installed within existing roadways or utility easements that are intended for the purpose of utility placement. As previously identified in Response 19(a) above, in a will serve letter dated August 28, 2018, and included as Appendix G, the Santa Margarita Water District confirmed that capacity exists to accept and treat wastewater that would be generated by the Project. Therefore, impacts related to wastewater treatment capacities during construction and operation of the Project would be less than significant. No mitigation measures are either required or recommended.

⁵⁶ Santa Margarita Water District (SMWD). 2020. Wastewater. Website: <https://smwd.com/310/Wastewater> (accessed May 21, 2020).

19. Utilities and Service Systems	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
(d) Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project site is located within Orange County Waste & Recycling’s (OCWR) service area. OCWR owns and operates three landfills in Orange County that accept municipal solid waste. These include the Frank R. Bowerman Landfill in Irvine, which accepts commercial waste only; the Olinda Alpha Landfill in Brea, which accepts both public and commercial waste; and the Prima Deshecha Landfill in San Juan Capistrano, which also accepts both public and commercial waste. All three landfills are Class III and only accept non-hazardous municipal solid waste.

Within the Coto de Caza community, collection of solid waste is contracted to the Waste Management of Orange County (WMOC). WMOC provides residential roll off, commercial and construction trash, waste, debris, recycling and disposal services and temporary dumpsters in the County.

The Frank R. Bowerman Landfill, located at 110002 Bee Canyon Access Road, Irvine, and the Prima Deshecha Landfill, located at 32250 La Pata Avenue, are the two closest OCWR landfills to the Project site and would be expected to provide waste disposal for the Project once it is completed and the residences are occupied. The Frank R. Bowerman Landfill is permitted to accept up to 11,500 tons of waste per day (TPD) and currently accepts a daily average of approximately 8,500 TPD. The landfill opened in 1990 and is projected to close in approximately 2053.⁵⁷ The Prima Deshecha Landfill is permitted to accept up to 4,000 TPD. The landfill was opened in 1976 and is scheduled to close in approximately 2067.⁵⁸

As illustrated by Table R, *Project Solid Waste Generation* the Project would generate a total of 158.99 pounds of solid waste per day.

Table R: Project Solid Waste Generation

Land Use	Proposed Project	Generation Rate	Total Solid Waste Generated per day
Single-Family Residential	13 units	12.23 lbs/household/day	158.99 lbs

Sources: CalRecycle, Estimated Solid Waste Generation and Disposal, Residential Developments; LSA (November 2019).
 lbs = pounds

⁵⁷ Orange County Landfills. Frank R. Bowerman Landfill. Website: <http://oclandfills.com/landfill/active/bowerman> (accessed November 18, 2019).

⁵⁸ Orange County Landfills. Prima Deshecha Landfill. Website: <http://oclandfills.com/landfill/active/deshecha> (accessed November 18, 2019).

The incremental increase of solid waste generated by the Project would constitute a small fractional percentage of the average daily available capacity (approximately 8,500 tons per day) at the Frank R. Bowerman and Prima Deshecha Landfills. Solid waste generated by the Project would not exceed the daily permitted capacity of either the Frank R. Bowerman Landfill or the Prima Deshecha Landfill. As such, the Project would be served by landfills with sufficient permitted capacity to accommodate its solid waste disposal needs. In addition, the 13 units were accounted for in the overall residential development allowed under the Specific Plan. Therefore, construction and operation of the Project would result in a less than significant impact to solid waste and landfill facilities. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
19. Utilities and Service Systems				
Would the project:				
(e) Comply with federal, State, and local management and reduction statutes and regulations related to solid waste?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The California Integrated Waste Management Act of 1989 (AB 939) changed the focus of solid waste management from landfill to diversion strategies such as source reduction, recycling, and composting. The purpose of the diversion strategies is to reduce dependence on landfills for solid waste disposal. AB 939 established mandatory diversion goals of 25 percent by 1995 and 50 percent by 2000. The Project would be required to comply with all federal, State, and local regulations related to solid waste. The Project would be required to comply with applicable elements of AB 1327, Chapter 18 (California Solid Waste Reuse and Recycling Access Act of 1991), and other applicable local, State, and federal solid waste disposal standards and management and reduction statutes. Adherence to these solid waste requirements and standards would ensure that impacts associated with this issue would remain less than significant during construction and operation of the Project. No mitigation measures are either required or recommended.

20. Wildfire

Potentially Significant Impact Less than Significant with Mitigation Incorporated Less than Significant Impact No Impact

If located in or near state responsibility areas or lands classified as very high fire hazard severity zones, would the project:				
(a) Substantially impair an adopted emergency response plan or emergency evacuation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. The Project does not include any characteristics (e.g., permanent road closures or long-term blocking of road access) that would substantially impair or otherwise conflict with an emergency response plan or emergency evacuation plan (for further discussion, refer to Section 9, Hazards and Hazardous Materials, Response 9[f] of this IS/MND) for a discussion of the temporary, partial lane closure on Vista del Verde. The Project does not include any changes to public or private roadways that would physically impair or otherwise conflict with an emergency response plan or emergency evacuation plan. Although Coto de Caza has been identified as a community with limited evacuation routes,⁵⁹ the Project would not obstruct or alter any transportation routes that could be used as evacuation routes during emergency events, including Vista del Verde and Via Pajaro.

The Project would not result in any substantial traffic queuing on nearby streets during short-term construction activities, or during Project operation. In addition, during the operational phase of the Project, on-site access would be required to comply with emergency ingress/egress access standards established by the County and the OCFA. Access to and from the Project site for emergency vehicles would be reviewed and approved by OCFA, OCSO, and the County as part of the Project approval process to ensure that the Project is compliant with all applicable codes and ordinances for emergency vehicle access. The Project would provide adequate emergency access to the site via a driveway and easement off of Vista del Verde; the driveway and easement would connect to a private internal roadway that would ensure access for emergency vehicles within the interior of the site.

The size and location of fire suppression facilities (e.g., hydrants) and fire ingress/egress access routes would be required to conform to County and OCFA standards. Compliance with existing codes and ordinances would ensure that potential impacts related to emergency response and evacuation plans associated with construction of the Project would be less than significant. No mitigation measures are either required or recommended.

Therefore, impacts related to emergency response and evacuation plans during an unforeseen wildfire event associated with construction and operation of the Project would be less than significant. No mitigation measures are either required or recommended.

⁵⁹ StreetLight Data. StreetLight Evacuation Risk Map. Website: <https://www.streetlightdata.com/limited-evacuation-routes-map/> (accessed January 7, 2021).

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
If located in or near state responsibility areas or lands classified as very high fire hazard severity zones, would the project:				
(b) Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. In accordance with the California Fire Code, OCFA has adopted a map designating the Wildland-Urban Interface Fire Area within Coto de Caza. The designated area is inclusive of the designated High and Very High Fire Hazard Severity Zones (VHFHSZ) in the State Responsibility Area that is within the jurisdictional boundaries of CAL FIRE. The designated area also includes areas within Coto de Caza that have been identified as fire hazard severity zones by CAL FIRE (also known as Local Responsibility Area fire hazard severity zones). The designated area also includes portions of Coto de Caza that have been identified by OCFA as having a high wildfire hazard or risk based on wildfire history. The Project site is identified as a VHFHSZ on the OCFA map.

Topography influences the movement of air, thereby directing a fire’s course. Where slope increases, the rate and spread of a wildfire also increases. The Project site is predominantly level and there are no significant slopes adjacent to the site. However, there is a minor slope adjacent to the western Project site boundary shared with the equestrian center. Prominent slopes nearest to the Project site are the two major open space ridgelines that occur on the eastern and western boundaries of the Specific Plan area located approximately 1.25 miles and 0.60 mile away, respectively. The Project would replace the previous development on the site with a residential subdivision.

Adherence to the California Fire Code and OCFA standards would reduce the chance of structure ignition on the Project site in the unlikely event of a wildfire. Additionally, the Project would comply with County Standard Conditions FPR01, Fire Hydrants, FPR02, Water Availability, FPR07, Fire Hazard Mitigation, FPR08, Fuel Modification, FPR10, Combustible Construction Letter, and FPR11, Hazardous Materials (refer to Response 9(g)). Adherence to the mandatory obligations of the California Fire Code, OCFA Standards and the County Standard Conditions would ensure that on-site wildfire risk is minimized and that, in the unlikely event of a wildfire, the Project site contains adequate fire suppression facilities. The Project itself would introduce uses consistent with the surrounding area and therefore would not increase exacerbate wildfire risks as compared to existing conditions and not introduce uses that would exacerbate wildfire risks. Therefore, based on these factors, the Project would not exacerbate wildfire risks or expose Project occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire. Impacts during construction and operation of the Project would be less than significant. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
20. Wildfire				
If located in or near state responsibility areas or lands classified as very high fire hazard severity zones, would the project:				
(c) Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Less than Significant Impact. Utility and infrastructure improvements included as part of the Project are described in the Project Description. These improvements include the construction of a vehicular ingress/egress access point off Vista del Verde and an internal private roadway to serve the Project site, the installation of electrical utilities within an on-site easement, a concrete-lined drainage, an off-site underground infiltration reservoir, an off-site concrete open swale, a new 8-inch water line underlying the proposed internal private roadway, and the installation of a new 8-inch sewer line. Existing utility lines and connections will be removed or relocated on the Project site, off site on the adjacent Coto Equestrian Preserve, and off site along Vista del Verde to serve the Project (Figure 5, *Existing Project Site*, and Figure 6, *Plot Plan and Building Limits*).

Although the Project would include an internal private roadway typical of residential subdivisions, the Project does not include any changes to public or private roadways that would exacerbate fire risk. Although utilities, including water facilities, sewer facilities, storm drain lines, and power lines would be modified and/or extended throughout the Project site and off site on the adjacent Coto Equestrian Preserve and along Vista del Verde, these improvements would be underground and would not have the potential to exacerbate fire risk. All utility lines, pipes, utility junction boxes, and transformers will be located underground.

The installation of project-related utilities and an internal private roadway would not exacerbate fire risk due to the Project site's location in a developed area. Furthermore, the improved connectivity of water lines would aid in fire suppression compared to existing conditions on the Project site in the unlikely event of a wildfire. Therefore, the Project would not exacerbate fire risk or result in temporary or ongoing impacts to the environment. Impacts during construction and operation of the Project would be less than significant. No mitigation measures are either required or recommended.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
20. Wildfire				
If located in or near state responsibility areas or lands classified as very high fire hazard severity zones, would the project:				
(d) Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Less than Significant with Mitigation Incorporated. The Project site is identified as a VHFHSZ. However, as discussed in Section 20(b) above, Project implementation itself would introduce uses consistent with the surrounding area and would not introduce uses that increase or exacerbate wildfire risks.

Flooding. The discussion in Response 10(c)(ii) above in Section 10, Hydrology and Water Quality, of this IS/MND, details the evaluation of the potential for the Project to result in off-site flooding and determined that Project impacts were less than significant. With the implementation of County Standard Conditions HYD-1 and HYD-2, the Project would incorporate construction and operational BMPs, which will be included in the Project design to reduce off-site stormwater runoff. In addition, there are no significant slopes in the vicinity of the Project site that could pose a post-fire slope or flooding risk to the Project site. Therefore, impacts related to downstream flooding, including flooding from a wildfire, would be less than significant and would not require mitigation.

Additionally, as specified in Response 10(c)(iv), although Flood Zone AE overlies a portion of Lot 9 on the eastern portion of the site, the pad elevation for the structure will be at an elevation greater than the base flood elevation. Further, the Project would be required to obtain an Elevation Certificate and would be required to obtain a CLOMR prior to Grading and Building permits and a LOMR prior to final map approval, as outlined in Mitigation Measure HYD-1 and County Standard Condition HYD-4, respectively. The CLOMR and LOMR would ensure that the FEMA FIRM reflects the changes to the floodplain that would result from Project implementation. This change to the floodplain would not exacerbate risks to people or structures as a result of runoff, post-fire slope instability, or drainage changes from those currently existing. In addition, as stated above, there are no significant slopes in the vicinity of the Project site that could pose a post-fire slope or flooding risk to the Project site. As such, impacts during construction and operation of the Project would be less than significant, and no additional mitigation is required related to wildfire flooding upstream from the Project site.

Landslides. Landslides and other forms of mass wasting, including mud flows, debris flows, and soil slips, occur as soil moves downslope under the influence of gravity. Landslides are frequently triggered by intense rainfall or seismic shaking but can also occur as a result of erosion and downslope runoff caused by rain following a fire. As previously discussed in Response 7(a)(iv), Geology and Soils, landslides or other forms of natural slope instability do not represent a significant hazard to the Project because the site is located in a level area, and there is no evidence of landslides in the Project vicinity. Additionally, according to the County's General Plan Safety Element (2005) and the Specific Plan (1995), the Project site does not lie within an area with a high potential for landslides. The Project would not require any significant grading activities, and no new slopes would be created. Therefore, construction and operation of the Project would not expose people or structures to significant risks, such as landslides, as a result of runoff, post-fire slope instability, or drainage changes. Impacts to people or structures related to post-wildfire landslide risks during construction and operation of the Project would be less than significant. No mitigation measures are either required or recommended.

21. Mandatory Findings of Significance

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
(a) Does the project have the potential to substantially degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Less than Significant with Mitigation Incorporated. Based on the discussion in Responses 4(a) through 4(f) in Section 4, Biological Resources, the Project would result in less than significant impacts related to habitat, wildlife species, and/or plant and animal communities and would not eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal. Additionally, mitigation measures have been proposed to perform a preconstruction biological resources survey to verify the absence of sensitive species on-site (Mitigation Measure BIO-1), to verify the absence of bats on-site (Mitigation Measure BIO-2), and to perform a nesting bird survey in compliance with the Migratory Bird Treaty Act.

Although no archaeological or paleontological resources were identified on-site due to the previous development of the Merryhill School and equestrian uses, the Project requires a SPA, and as such must comply with SB 18 and AB 52 and conduct Native American Consultation (refer to Responses 5(a) through 5(c) in Section 5, Cultural Resources, and Responses 18(a) and 18(b) in Section 18, Tribal Cultural Resources). Compliance with County Standard Conditions that are incorporated as part of the Project renders otherwise potentially significant impacts less than significant.

For the reasons stated above, the Project would incorporate Mitigation Measures BIO-1 and BIO-2 in order to reduce impacts to a less than significant level. With incorporation of mitigation, construction and operation of the Project would not have the potential to substantially degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of the major periods of California history or prehistory.

21. Mandatory Findings of Significance	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
(b) Does the project have impacts that are individually limited, but cumulatively considerable? (“Cumulatively considerable” means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Less than Significant with Mitigation Incorporated. The existing site was formerly occupied by a multi-structure conference center, a church, and later by the Merryhill School. A portion of the site was part of the adjacent Coto Equestrian Preserve. The site is surrounded by a variety of residential uses, equestrian uses, and commercial uses. Based on the analysis contained in this IS/MND, all potential impacts can be reduced to less than significant levels with the incorporation of County standard conditions and mitigation measures. The following seven projects identified in Table S located in the vicinity of the Project site are considered projects that could have potential cumulative effects. Table S also lists the status of each project.

Table S: Related Projects

Project	Distance from Project Site	Description	Status
PA 200022 Legacy at Coto	0.8 mile northwest of the Project site	Proposed 95-unit senior residential facility	Notice of Preparation issued December 2020.
PA 190100 Via Terracleta Area Plan (Coto de Caza)	0.5 mile west of the Project site	Proposed subdivision of a 16.1-acre site into seven lots to allow for the development of six new residential units and demolition and reconstruction of one existing single-family residence.	Administrative Draft Environmental Document in process. Project is on hold.
PA 150020 Coto de Caza General Store and Mercantile	0.6 mile west of the Project site	Site Plan to the Director for redevelopment of the "General Store"; proposal is to construct approximately 17,008 square-foot (sf) of leasable space within three new one- and two-story buildings, consisting of 10,196 sf of service and retail space, 1,800 sf of indoor dining, and 5,012 sf of office space.	Approved and first phase of construction is anticipated in Fall 2022 or soon thereafter.
PA 130026 The Preserve at San Juan	9.5 miles east of the Project site	Two phases of residential development on two non-contiguous parcels in southeastern unincorporated Orange County. Project proposes the development and maintenance of a single-family residential neighborhood with limited vineyard uses.	Approved, not yet constructed.

Table S: Related Projects

Project	Distance from Project Site	Description	Status
Wagon Wheel Creek Restoration Plan	2.7 miles southwest of the Project site	Stabilization of Wagon Wheel Creek for resource management purposes in order to protect remaining oak and sycamore woodland and other riparian vegetation; protection of the park and the recreational resources from flooding and to limit erosion hazards; and ensuring of public safety within Riley Wilderness Park. Improvements consist of bank stabilization, invert stabilization structures, and other methods.	Completed.
Lyon Subdivision (Coto de Caza)	0.7 mile southwest of the Project site	Development of 25 single-family lots (minimum 2 acres)	Under construction.
IP 17-248 Aliso Creek Trail Slope Repairs	0.5 mile west of Project site	Restoration of 2,000 linear feet of bike trail that was damaged due to heavy rainstorms and erosion over several years. The project would provide protection of creek banks and the bike path by replacing two 60-inch corrugated metal culverts with 60-inch reinforced concrete pipes and by providing bank stabilization with rip rap.	Will be completed in 2023. OC Parks received approval from the regulatory agencies; however, the I-5 expansion project has begun and conflicts with the construction schedule that will be delayed until I-5 construction is completed in the area.
Four Pines Pastures	Adjacent to east boundary of Project site.	Use for equestrian turnouts during daytime hours. Property improvements include installing grass and fencing.	In Planning review.

Source: OC Public Works, OC Development Services/Planning.

As discussed in this IS/MND, all potential project-related impacts can be mitigated to a less than significant level, and construction and operation of the Project would not result in impacts that are cumulatively considerable when evaluated with the impacts of these other current projects, or the effects of probable future projects. Therefore, with the incorporation of mitigation measures included in this IS/MND, the Project is not expected to result in cumulatively considerable impacts.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
21. Mandatory Findings of Significance				
(c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Less than Significant with Mitigation Incorporated. Potential impacts related to air quality, noise, and greenhouse gas emissions were determined to be less than significant. Noise impacts would be less than significant with implementation of County Standard Condition (NOI-1 to

address construction noise). Potential impacts related to hazardous materials would adhere to a County Standard Condition (FPR11) that would reduce potentially significant health hazards during construction to a less than significant level. County Standard Conditions FPR01, FPR02, FPR03, FPR07, FPR08, and FPR10 are also identified as applying to potential fire-related hazards. Hydrology mitigation for flood hazards is identified because a portion of the Project site is located within Flood Zone AE. Mitigation Measure HYD-1 requires the proposed Project to obtain an Elevation Certificate, ensuring that all habitable areas are elevated to or above the base flood elevation. County Standard Condition HYD-4 requires the Project to obtain a LOMR prior to final map approval or other approval granted by FEMA. Grading and Building Permits, for portions of the Project not in the floodplain area, may be issued prior to an approved CLOMR for the Project after review by staff and upon approval by the Director based on specified conditions.

Therefore, because all potentially significant impacts of the Project can be mitigated to less than significant levels, implementation of the Project would not cause substantial adverse effects on human beings.

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Silver-Bronze Corporation/Oak Grove LLC

The following individuals, representing the Project Applicant, were consulted during the preparation of this Draft IS/MND:

- Robert O Hill

INVENTORY OF COUNTY STANDARD CONDITIONS AND MITIGATION MEASURES

County Standard Conditions and Mitigation Measures	Responsible Party	Timing for Standard Condition or Mitigation Measure
4.1: Aesthetics		
<p>County Standard Condition AES-1.</p> <p>Prior to issuance of any Building Permit, the Project Applicant shall demonstrate that all exterior lighting has been designed and located so that all direct rays are confined to the property in a manner meeting the approval of the Manager, Permit Services.</p>	County, with verification by the Manager, Permit Services	Prior to the issuance of building permits
<p>County Standard Condition AES-2.</p> <p>Prior to the approval of final inspection, the Project Applicant shall provide a letter from the electrical engineer, the licensed landscape architect, or the licensed professional designer that a field test has been performed after dark and the light rays are confined to the premises. The letter shall be submitted to the Manager, Inspection, for review and approval.</p>	County, with verification by the Manager, Inspection	Prior to the approval of final inspection
4.2: Agriculture and Forest Resources		
The proposed Project would not result in significant adverse impacts related to agriculture. No mitigation is required. No Standard Conditions are associated with this topical environmental issue.		
4.3: Air Quality		
The proposed Project would not result in significant adverse impacts related to air quality. No mitigation is required. No Standard Conditions are associated with this topical environmental issue.		
4.4: Biological Resources		
<p>Mitigation Measure BIO-1.</p> <p>Preconstruction Nesting Bird Surveys. The trees that are present on-site may provide nesting habitat for migratory birds protected under the Migratory Bird Treaty Act and the California Fish and Game Code. When possible, vegetation clearing should be restricted to outside the active breeding season (February 1 through August 31) for those sensitive bird species present or potentially occurring within the study area or directly adjacent to the study area. However, some of these birds may start nesting as early as January or as late as September in certain years. Therefore, if vegetation is scheduled to be cleared during these extended breeding periods (i.e., January through September), or if it becomes absolutely necessary to clear vegetation during the active breeding season (February 1 through August 31), a qualified biologist shall conduct clearance surveys for active bird nesting prior to any clearing of vegetation. This is necessary to definitively ascertain whether or not any raptors or other migratory birds are actively nesting in the Project area. The location of any active raptor or migratory bird nests would be mapped by the qualified biologist and reported immediately to the construction manager. All construction activities in close proximity to active nests, as determined by the qualified biologist, would need to</p>	A qualified biologist	During construction activities occurring from February 1 through August 31

County Standard Conditions and Mitigation Measures	Responsible Party	Timing for Standard Condition or Mitigation Measure
<p>be delayed, or otherwise modified, as necessary to prevent nest failure caused by construction activities.</p> <p>A qualified biological monitor shall be present during all site-clearing and grading activities to flush mobile wildlife species and to ensure that there are no impacts to any areas to be protected.</p>		
<p>Mitigation Measure BIO-2.</p> <p>Preconstruction Bat Surveys. Project grading and construction activities shall occur outside the active bat roosting season (April 1–August 31), if feasible. Should such activities occur during the roosting season (April 1–August 31), the County of Orange Planning Manager, or designee, shall verify prior to issuance of Grading Permits, that the Project Applicant has retained a qualified biologist to conduct a preconstruction bat survey no more than 3 days prior to the tree removal/relocation on the Project site to verify the absence of bats on-site. If active roosting bats are observed in existing trees on the Project site, the relocation of trees containing roosts shall occur under the supervision of a qualified bat biologist to prevent potential mortality to roosting bats on-site. The Orange County Planning Manager, or designee, shall verify that a preconstruction bat survey has been conducted by a qualified bat biologist and, if the removal of trees with roosting bats is required, shall verify that the removal of on-site trees containing roosting bats has occurred under the supervision of the qualified bat biologist.</p>	<p>A qualified biologist; County of Orange Planning Manager, or designee</p>	<p>During grading and construction activities occurring April 1 through August 31</p>
<p>County Standard Condition BIO-1.</p> <p>Oak Tree Preservation Plan. Prior to the issuance of any Grading Permits or recordation of a subdivision map which creates building sites, whichever occurs first, the Project Applicant shall obtain the approval of the Manager of Subdivision and Grading at OC Public Works, of an oak tree preservation plan for the construction phase of the project that addresses the following construction phases: site preparation, grading, and paving.</p>		
<p>4.5: Cultural Resources</p>		
<p>County Standard Condition CUL-1.</p> <p>Archaeological Grading Observation and Salvage. Prior to the issuance of any Grading Permit, the Project Applicant shall provide written evidence to the Manager, Subdivision and Grading, that the Project Applicant has retained a County-certified archaeologist, to observe grading activities and salvage and catalogue archaeological resources as necessary. The archaeologist shall be present at the pre-grade conference, shall establish procedures for archaeological resource surveillance, and shall establish, in cooperation with the Project Applicant, procedures for temporarily halting or redirecting work to permit the sampling, identification, and evaluation of the artifacts as appropriate. If the archaeological resources are found to be significant, the archaeological observer shall determine appropriate actions, in cooperation with the Project Applicant, for exploration and/or salvage.</p> <p>Prior to the release of the grading bond, the Project Applicant shall</p>	<p>County, with verification by the Manager, Subdivision and Grading</p>	<p>Prior to the issuance of grading permits</p>

County Standard Conditions and Mitigation Measures	Responsible Party	Timing for Standard Condition or Mitigation Measure
<p>obtain approval of the archaeologist’s follow-up report from the Manager, Orange County Permit Services. The report shall include the period of inspection, an analysis of any artifacts found and the present repository of the artifacts. The Project Applicant shall prepare excavated material to the point of identification. The Project Applicant shall offer excavated finds for curatorial purposes to the County of Orange, or its designee, on a first refusal basis. These actions, as well as final mitigation and disposition of the resources, shall be subject to the approval of the Manager, Orange County Permit Services. The Project Applicant shall pay curatorial fees if an applicable fee program has been adopted by the Board of Supervisors, and such fee program is in effect at the time of presentation of the materials to the County of Orange or its designee, all in a manner meeting the approval of the Manager, Orange County Permit Services.</p>		
<p>Regulatory Requirement CUL-1.</p> <p>The Project would be required to comply with the applicable provisions of the California Health and Safety Code Section 7050.5, which requires that no further disturbance occur in the event of a discovery or recognition of any human remains on-site and that the County Coroner be notified immediately. If the remains are determined to be of Native American descent, the County Coroner will notify the Native American Heritage Commission (NAHC), which will determine and notify a Most Likely Descendant (MLD) and potentially inspect the site of the discovery. Upon completion of the assessment, consulting archaeologists would prepare a report documenting the methods and results regarding the treatment of the remains.</p>	<p>County Coroner; Construction contractor</p>	<p>During construction</p>
<p>4.6: Energy</p>		
<p>The proposed Project would not result in significant adverse impacts related to energy. No mitigation is required. No Standard Conditions are associated with this topical environmental issue.</p>		
<p>4.7: Geology and Soils</p>		
<p>County Standard Condition GEO-1.</p> <p>Geology Report. Prior to the issuance of a Grading Permit, the Project Applicant shall submit a final geotechnical report to the Manager, Subdivision and Grading, for approval. The report shall include the information required to address seismic and geologic hazards and be in the form as required by the OC Grading Manual and OC Grading and Excavation Code.</p>	<p>County, with verification by the Manager, Subdivision and Grading</p>	<p>Prior to the issuance of building permits</p>
<p>County Standard Condition GEO-2.</p> <p>Paleontological Pregrade Salvage. Prior to the issuance of any Grading Permit, the Project Applicant shall obtain approval from Manager, HBP/Coastal and Historical Facilities, of a report of the pre-grade paleontological salvage operation. The Project Applicant shall retain a County-certified paleontologist to conduct pregrade salvage excavation and prepare a report of the exposed resources. The report shall include methodology, an analysis of artifacts found, a catalogue of artifacts, and their present repository. The Project Applicant shall prepare excavated materials to the point of identification. The Project Applicant shall offer</p>	<p>County, with verification by the Manager, HBP/Coastal and Historical Facilities</p>	<p>Prior to the issuance of building permits</p>

County Standard Conditions and Mitigation Measures	Responsible Party	Timing for Standard Condition or Mitigation Measure
excavated finds for curatorial purposes to the County of Orange, or its designee, on a first refusal basis. The Project Applicant shall pay curatorial fees if an applicable fee program has been adopted by the Board of Supervisors, and such fee program is in effect at the time of presentation of the materials to the County of Orange or its designee, all in a manner meeting the approval of the Manager, HBP/Coastal and Historical Facilities.		
<p>County Standard Condition GEO-3.</p> <p>Paleontological Observance and Salvage. Prior to the issuance of any Grading Permit, the Project Applicant shall provide written evidence to the Manager, Subdivision and Grading, that the Project Applicant has retained a County certified paleontologist to observe grading activities and salvage and catalogue fossils as necessary. The paleontologist shall be present at the pre-grade conference, shall establish procedures for paleontological resource surveillance, and shall establish, in cooperation with the Project Applicant, procedures for temporarily halting or redirecting work to permit sampling, identification, and evaluation of the fossils. If the paleontological resources are found to be significant, the paleontologist shall determine appropriate actions, in cooperation with the Project Applicant, which ensure proper exploration and/or salvage.</p> <p>Prior to the release of the grading bond, the Project Applicant shall submit the paleontologist's follow up report for approval by the Manager, HBP/Coastal and Historical Facilities. The report shall include the period of inspection, a catalogue and analysis of the fossils found, and the present repository of the fossils. The Project Applicant shall prepare excavated material to the point of identification. The Project Applicant shall offer excavated finds for curatorial purposes to the County of Orange, or its designee, on a first refusal basis. These actions, as well as final mitigation and disposition of the resources, shall be subject to approval by the HBP/Coastal and Historical Facilities. The Project Applicant shall pay curatorial fees if an applicable fee program has been adopted by the Board of Supervisors, and such fee program is in effect at the time of presentation of the materials to the County of Orange or its designee, all in a manner meeting the approval of the Manager, HBP/Coastal and Historical Facilities.</p>	County, with verification by the Manager, Subdivision and Grading, and Manager, HBP/Coastal and Historical Facilities	Prior to the issuance of building permits
4.8: Greenhouse Gas Emissions		
The proposed Project would not result in significant adverse impacts related to greenhouse gas emissions. No mitigation is required. No Standard Conditions are associated with this topical environmental issue.		
4.9: Hazards and Hazardous Materials		
<p>County Standard Condition FPR01.</p> <p>Fire Hydrants. A. Prior to the recordation of a subdivision map, the issuance of any Grading Permits or the issuance of a building permit, whichever occurs first, the Project Applicant shall submit a fire hydrant location plan to the Orange County Fire Authority (OCFA) Fire Chief for review and approval.</p> <p>B. Prior to the issuance of a building permit, the Project Applicant shall submit evidence of the on-site fire hydrant system to the OCFA Fire</p>	Orange County Fire Authority Fire Chief	Prior to the recordation of a subdivision map, the issuance of any grading permits, or the issuance of any building permit, or whichever occurs first

County Standard Conditions and Mitigation Measures	Responsible Party	Timing for Standard Condition or Mitigation Measure
<p>Chief and indicate whether it is public or private. If the system is private, it shall be reviewed and approved by the OCFA Fire Chief prior to building permit issuance, and the Project Applicant shall make provisions for the repair and maintenance of the system in a manner meeting the approval of the OCFA Fire Chief.</p> <p>C. Prior to the issuance of any certificate of use and occupancy, all fire hydrants shall have a blue reflective pavement marker indicating the hydrant location on the street as approved by the OCFA Fire Chief, and must be maintained in good condition by the property owner.</p>		
<p>County Standard Condition FPR02.</p> <p>Water Availability. Prior to the recordation of a subdivision map, the issuance of any Grading Permits or the issuance of a building permit, whichever occurs first, the Project Applicant shall provide evidence of adequate fire flow. The “Orange County Fire Authority Water Availability for Fire Protection” form shall be signed by the applicable water district and submitted to the OCFA Fire Chief for approval. If sufficient water to meet fire flow requirements is not available, an automatic fire-extinguishing system may be required in each structure affected.</p>	<p>Orange County Fire Authority Fire Chief</p>	<p>Prior to the recordation of a subdivision map, the issuance of any grading permits, or the issuance of any building permit, or whichever occurs first</p>
<p>County Standard Condition FPR03.</p> <p>Automatic Fire Sprinklers. A. Prior to the recordation of a subdivision map, a note shall be placed on the map stating that all residential structures exceeding 5,500 square feet (per amendment) and all structures exceeding fire department access requirements shall be protected by an automatic fire sprinkler system in a manner meeting the approval of the OCFA Fire Chief.</p> <p>B. Prior to the issuance of a building permit, the Project Applicant shall submit plans for any required automatic fire sprinkler system in any structure to the OCFA Fire Chief for review and approval. Please contact the Orange County Fire Authority at (714) 744-0499 for additional information.</p> <p>C. Prior to the issuance of a certificate of use and occupancy, this system shall be operational in a manner meeting the approval of the OCFA Fire Chief.</p>	<p>Orange County Fire Authority Fire Chief</p>	<p>Prior to the recordation of a subdivision map, the issuance of any grading permits, or the issuance of any building permit, or whichever occurs first</p>
<p>County Standard Condition FPR07.</p> <p>Fire Hazard Notification. A. State Responsibility Areas. Prior to the recordation of a subdivision map, the subdivider shall place a note on the map meeting the approval of the OCFA Fire Chief that the property is in a “(High/Very High) Fire Hazard Area” due to wildland exposure based on State Responsibility Areas maps.</p> <p>B. Special Fire Protection Area (SFPA) Notification. Prior to the recordation of any final tract map, the subdivider shall place a note on the map meeting the approval of the OCFA Fire Chief that the property is in a “Special Fire Protection Area” and must meet all requirements for development within the area or file for an exclusion with the OCFA Fire Chief.</p>	<p>Orange County Fire Authority Fire Chief</p>	<p>Prior to the recordation of a subdivision map, the recordation of any final tract map, or the issuance of any building permit, or whichever occurs first</p>

County Standard Conditions and Mitigation Measures	Responsible Party	Timing for Standard Condition or Mitigation Measure
<p>C. Prior to the issuance of a building permit, the Project Applicant shall place a note on the map meeting the approval of the OCFA Fire Chief that all requirements for development and construction within a “Special Fire Protection Area,” including increased street widths, Class A roof assemblies, and fire sprinklers, etc., will be met. Please contact the Orange County Fire Authority at (714) 744-0499 or visit the Orange County Fire Authority website to obtain a copy of the “Guidelines for Development within Special Fire Protection Areas and Instructions for Request for Exclusion from SFPA.”</p> <p>D. Prior to recordation of any final tract map, the subdivider shall place a note on the map meeting the approval of the OCFA Fire Chief that the property is “Conditionally Excluded” from a “Special Fire Protection Area” and must meet all conditions of exclusion as required by the Fire Chief.</p>		
<p>County Standard Condition FPR08.</p> <p>Fuel Modification. A. Prior to the recordation of a subdivision map or the issuance of a preliminary Grading Permit, the Project Applicant shall obtain approval from the OCFA Fire Chief in consultation with the Manager, Subdivision and Grading Services, for a conceptual fuel modification plan and program. Please contact the Orange County Fire Authority at (714) 744-0499 or visit the Orange County Fire Authority website to obtain a copy of the “Guidelines for Fuel Modification Plans and Maintenance.”</p> <p>B. Prior to the issuance of a precise Grading Permit, the Project Applicant shall obtain approval from the OCFA Fire Chief in consultation with the Manager, Subdivision and Grading Services, for a precise fuel modification plan and program. The plan shall indicate the proposed means of modifying vegetation to reduce the risk to structures. Please contact the Orange County Fire Authority at (714) 744-0499 or visit the Orange County Fire Authority website to obtain a copy of the “Guidelines for Fuel Modification Plans and Maintenance.”</p> <p>C. Prior to the issuance of a building permit, the developer, under the supervision of the OCFA Fire Chief, shall have completed the portion of the approved fuel modification plan determined to be necessary before the introduction of any combustible materials into the Project area. Approval shall be subject to an on-site inspection.</p> <p>D. Prior to the issuance of any certificate of use and occupancy, the fuel modification shall be installed and completed under the supervision of the OCFA Fire Chief with an approved plant palette. The Declaration of Covenants, Conditions, and Restrictions (CC&Rs) or other approved documents shall contain provisions for maintaining the fuel modification zones, including the removal of all dead and dying vegetation. The fuel modification zones shall be subject to triennial inspections.</p> <p>E. Lot 9 on the Project site is located within the OCFA 100 ft fuel modification zone and will require extra measures to create a barrier between this lot and the natural woodland open space east of the Project site across Via Pajaro. A wildfire ember barrier which includes a glass</p>	<p>Orange County Fire Authority Fire Chief, with verification by the County of Orange Manager, Subdivision and Grading Services</p>	<p>Prior to the recordation of a subdivision map, the issuance of a preliminary grading permit, the issuance of a precise grading permit, the issuance of a building permit, or whichever occurs first</p>

County Standard Conditions and Mitigation Measures	Responsible Party	Timing for Standard Condition or Mitigation Measure
fence shall be added to the top of the wall at this single location to extend the wall to 6 ft above the rear yard and a maximum of 12 ft above Via Pajaro.		
<p>County Standard Condition FPR10.</p> <p>Combustible Construction Letter. Prior to the issuance of a building permit for combustible construction, the builder shall submit a letter on company letterhead stating that water for fire-fighting purposes and all-weather fire protection access roads shall be in place and operational before any combustible material is placed on-site. Building permits will not be issued without Orange County Fire Authority approval obtained as a result of an on-site inspection. Please contact the Orange County Fire Authority at (714) 744-0499 to obtain a copy of the standard combustible construction letter.</p>	Orange County Fire Authority Fire Chief	Prior to the issuance of a building permit for combustible construction
<p>County Standard Condition FPR11.</p> <p>Hazardous Materials. A. Prior to the issuance of a grading or building permit, the Project Applicant shall submit to the OCFA Fire Chief a list of all hazardous, flammable, and combustible liquids, solids, or gases to be stored, used, or handled on-site. These materials shall be classified according to the Uniform Fire Code and a document submitted to the OCFA Fire Chief with a summary sheet listing the totals for storage and use for each hazard class. Please contact the Orange County Fire Authority at (714) 744-0499 or visit the Orange County Fire Authority website to obtain a copy of the “Guidelines for Completing Chemical Classification Packets.”</p> <p>B. Prior to the issuance of a building permit, the Project Applicant shall complete and submit to the OCFA Fire Chief a copy of a “Hazardous Materials Disclosure Chemical Inventory and Business Emergency Plan” packet. Please contact the Orange County Fire Authority Hazardous Materials Services at (714) 744-0463 to obtain a copy of the packet.</p>	Orange County Fire Authority Fire Chief	Prior to the issuance of a grading or building permit

County Standard Conditions and Mitigation Measures	Responsible Party	Timing for Standard Condition or Mitigation Measure
4.10: Hydrology and Water Quality		
<p>County Standard Condition HYD-1.</p> <p>Construction General Permit. Prior to issuance of a Grading Permit, the Project Applicant shall obtain coverage under the State Water Resources Control Board National Pollutant Discharge Elimination System General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities (Order No. 2009-0009-DWQ, Permit No. CAS000002 as amended by Orders No. 2010-0014-DWQ and 2012-0006-DWQ) (Construction General Permit). This shall include submission of Permit Registration Documents (PRDs), including a Notice of Intent (NOI) for coverage under the permit to the State Water Resources Control Board (SWRCB). The Project Applicant shall provide the Waste Discharge Identification Number to the Manager, Orange County Permit Services, to demonstrate proof of coverage under the Construction General Permit. A Storm Water Pollution Prevention Plan (SWPPP) shall be prepared and implemented for the Project in compliance with the requirements of the Construction General Permit. The SWPPP shall identify construction best management practices (BMPs) to be implemented to ensure that the potential for soil erosion and sedimentation is minimized and to control the discharge of pollutants in stormwater runoff as a result of construction activities.</p>	County, with verification by the Manager, Orange County Permit Services	Prior to the issuance of a grading permit
<p>County Standard Condition-HYD-2.</p> <p>Final Water Quality Management Plan. Prior to the issuance of any Grading or Building Permits, the Project Applicant shall submit a Final Water Quality Management Plan (WQMP) to the Director of the County of Orange Public Works Department, or designee, for review and approval. The Final WQMP shall be prepared consistent with the Orange County Municipal Separate Storm Sewer System (MS4) Permit, the Model WQMP, the Hydromodification Management Plan, and the Technical Guidance Document. The Final WQMP shall specify BMPs to be incorporated into the design of the Project. The BMPs shall include operational BMPs that target pollutants of concern in stormwater runoff and reduce stormwater runoff discharged from the Project site to mimic predevelopment conditions.</p>	Director of the County of Orange Public Works Department, or designee	Prior to the issuance of grading permits
<p>County Standard Condition HYD-3.</p> <p>Final Drainage Report. Prior to the issuance of any Grading or Building Permits, the Project Applicant shall submit a Final Drainage Report to the Director of the County of Orange Public Works Department, or designee, for review and approval. The Final Drainage Report shall be prepared consistent with the Orange County Hydrology Manual. The Final WQMP shall specify the sizing requirements for the BMPs and drainage improvements to be incorporated into the design of the Project.</p>	Director of the County of Orange Public Works Department, or designee	Prior to the issuance of grading or building permits
<p>County Standard Condition HYD-4.</p> <p>Letter of Map Revision. Prior to the approval of the final map, the Project Applicant shall obtain an approved Letter of Map Revision (LOMR) from the Federal Emergency Management Agency (FEMA) to</p>	Project Applicant, with verification by Director of the County of	Prior to the issuance of a final map or of grading and/or construction permits

County Standard Conditions and Mitigation Measures	Responsible Party	Timing for Standard Condition or Mitigation Measure
<p>adjust the floodplain boundaries pursuant to the approved Project plan. No Grading or Building Permits shall be issued in the floodplain area within the Project area, including but not limited to Lot 9, prior to approval of a Conditional Letters of Map Revision (CLOMR) or other approval granted by FEMA. Grading and Building Permits, for portions of the Project not in the floodplain area, may be issued prior to an approved CLOMR for the Project after review by staff and upon approval by the Director, OC Public Works, if the Project Applicant can demonstrate: (1) those portion(s) of the Project proposed for Grading and Building Permits can be constructed without alteration of the floodplain and altering off-site storm water runoff; (2) the Project is in compliance with the adopted CEQA documentation; and (3) Project approvals have been secured. The owners of any buildings subsequently constructed on portions of the Project site within the floodplain may be subject to the Federal Mandatory Flood Insurance purchase requirement until a LOMR or Elevation Certificate is issued.</p>	<p>Orange Public Works Department, or designee</p>	
<p>Mitigation Measure HYD-1. Flood Hazard Certification. Prior to issuance of any Certificates of Occupancy, the Project Applicant shall obtain certification from a registered professional engineer or surveyor that the constructed structures on Lot 9 comply with the requirements of Section 7-9-42, <i>FP "Floodplain Overlay District"</i> of Orange County's Codified Ordinances. The certification shall be a Federal Emergency Management Agency (FEMA) Elevation Certificate for the residence located on Lot 9. The certification shall verify that the elevation of the first floor of the completed building, or of any habitable space, is located at least one foot above the base flood elevation for the 100-year floodplain. In addition, the certification shall verify that the on-site structure would not impede or increase the 100-year flood elevations. The certification shall be submitted to and verified by the Director, OC Public Works.</p>	<p>Director of the County of Orange Public Works Department, or designee</p>	<p>Prior to the issuance of any Certificates of Occupancy</p>
<p>4.11: Land Use and Planning</p>		
<p>The proposed Project would not result in significant adverse impacts related to land use and planning. No mitigation is required. No Standard Conditions are associated with this topical environmental issue.</p>		
<p>4.12: Mineral Resources</p>		
<p>The proposed Project would not result in significant adverse impacts related to mineral resources. No mitigation is required. No Standard Conditions are associated with this topical environmental issue.</p>		
<p>4.13: Noise</p>		
<p>County Standard Condition NOI-1. Construction Noise. Construction shall be limited to the hours of 7:00 a.m. to 7:00 p.m. Monday through Friday and on federal holidays and 9:00 a.m. to 6:00 p.m. on Saturday. In accordance with County standards, no construction activities are permitted outside of these hours and no construction is permitted on Sundays without a special work permit. The following measures shall be implemented to reduce potential construction noise impacts on nearby sensitive receptors:</p>	<p>County of Orange; Construction contractor</p>	<p>During construction</p>

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<ul style="list-style-type: none"> During all site excavation and grading, the Project contractors shall equip all construction equipment, fixed or mobile, with properly operating and maintained mufflers consistent with manufacturers' standards. The Project contractor shall place all stationary construction equipment so that emitted noise is directed away from sensitive receptors nearest the Project site. The construction contractor shall locate equipment staging in areas that will create the greatest distance between construction-related noise sources and noise-sensitive receptors nearest the Project site during all Project construction. 		
<p>County Standard Condition NOI-2</p> <p>Acoustical Study. Prior to the issuance of any Building Permits, the Project Applicant shall submit an acoustical analysis report describing the acoustical design features of the structures required to satisfy the exterior and interior noise standards to the Manager of Building Permits Services for approval, along with satisfactory evidence which indicates that the sound attenuation measures specified in the approved acoustical report have been incorporated into the design of the Project.</p>	County of Orange, with verification by the Manager of Building Permits Services	Prior to the issuance of any building permits
<p>4.14: Population and Housing</p>		
<p>The proposed Project would not result in significant adverse impacts related to population and housing. No mitigation is required. No Standard Conditions are associated with this topical environmental issue.</p>		
<p>4.15: Public Services</p>		
<p>The proposed Project would not result in any significant adverse impacts related to public services. No mitigation is required. No Standard Conditions are associated with this topical environmental issue.</p>		
<p>4.16: Recreation</p>		
<p>County Standard Condition REC-1</p> <p>In-Lieu Fees. Prior to the issuance of any Building Permits, the Project Applicant will be required to pay in-lieu fees pursuant to Article 5, Section 7-9-520 through 7-9-530 of the Orange County Codified Ordinances. The final amount of in-lieu fees shall be approved by the Subdivision Committee. Any approval of the payment of park fees shall be made by the Subdivision Committee prior to or concurrently with the approval of the tentative map, and such approval shall be shown on the face of the tentative map and by conditions of approval.</p>	Project Applicant, with approval by the County of Orange Subdivision Committee	Prior to the issuance of any building permits
<p>4.17: Transportation</p>		
<p>County Standard Condition TRF-1.</p> <p>Prior to the issuance of Building Permits, the Project Applicant shall pay fees for the Major Thoroughfare and Bridge Fee Program listed below, in a manner meeting the approval of the Manager, Subdivision and Grading.</p> <ol style="list-style-type: none"> Coastal Area Road Improvements and Traffic Signals El Toro Road Foothill/Eastern Transportation Corridor Foothill Circulation Phasing Program Moulton Parkway/Laguna Niguel Area 	County of Orange, with verification by the Manager, Subdivision and Grading	Prior to the issuance of building permits

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f. Plano Trabuco g. Santiago Canyon Road h. San Joaquin Hills Transportation Corridor		
4.18: Tribal Cultural Resources		
<p>County Standard Condition TCR-1.</p> <p>Unanticipated Discovery of Archaeological Resources Below 6 Feet Depth in Previously Undisturbed Soils. If unanticipated archaeological resources or deposits are discovered during ground disturbing activities below 2 feet depth in previously undisturbed soils, OC Public Works will implement the following measures. All work will halt within a 50-foot radius of the discovery. OC Public Works will have a qualified professional archaeologist with knowledge of Native American resources assess the significance of the find. If the resources are Native American in origin, the County shall coordinate with the Tribe regarding evaluation, treatment, curation, and preservation of these resources. The archaeologist will have the authority to modify the no-work radius as appropriate, using professional judgment in consultation with OC Public Works. Work will not continue within the no-work radius until the archaeologist conducts sufficient research and evidence and data collection to establish that the resource is either: (1) not cultural in origin; or (2) not potentially eligible for listing in the California Register of Historical Resources. If a potentially eligible resource is encountered, then the archaeologist and OC Public Works, as lead agency, in consultation with the Tribe, will arrange for either: (1) avoidance of the resource, if possible; or (2) test excavations to evaluate eligibility, and if eligible, an attempt to resolve adverse effects to determine appropriate mitigation. The assessment of eligibility will be formally documented in writing as verification that the provisions in CEQA for managing unanticipated discoveries and Public Resources Code Section 5024 have been met.</p>		
4.19: Utilities and Service Systems		
The proposed Project would not result in any significant adverse impacts to utilities and service systems. No mitigation is required. No Standard Conditions are associated with this topical environmental issue.		
4.20: Wildfire		
Refer to Mitigation Measure HYD-1 and Standard Conditions HYD-1, HYD-2, and HYD-4, which are provided above under Section 4.10: Hydrology and Water Quality.		