CITRUS SQUARE PROJECT

Draft Initial Study/Mitigated Negative Declaration

City of Cypress

August 2021

Prepared by:

LSA

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DRAFT

INITIAL STUDY/
MITIGATED NEGATIVE DECLARATION

CITRUS SQUARE PROJECT

CYPRESS, CALIFORNIA

AUGUST 2021

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1.0 INTRODUCTION

In accordance with the California Environmental Quality Act (CEQA) and the *State CEQA Guidelines*, this Initial Study/Mitigated Negative Declaration (IS/MND) has been prepared for the proposed Citrus Square Project (proposed project) at the northeast corner of Moody Street and Orange Avenue in the City of Cypress. Consistent with *State CEQA Guidelines* Section 15071, this IS/MND includes a description of the proposed 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 proposed project. The City is the Lead Agency under CEQA and is responsible for adoption of the IS/MND and approval of the project.

1.1 CONTACT PERSON

Any questions or comments regarding the preparation of this IS/MND, its assumptions, or its conclusions should be referred to:

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Cypress, CA 90630
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2.0 PROJECT DESCRIPTION

This section describes the proposed Citrus Square Project (proposed project) that is evaluated in this Initial Study/Mitigated Negative Declaration (IS/MND). A description of the proposed project's location, characteristics, and required approvals is provided below. The proposed project will also require approval of Tentative Tract Map 19147 and a Conditional Use Permit for a residential senior housing project which includes both affordable and market rate units.

2.1 PROJECT OVERVIEW

The proposed project includes the construction of 50 affordable condominium units and 48 market-rate condominium units at an approximately 6.3-acre site at the northeast corner of the intersection of Moody Street and Orange Avenue (project site) in the City of Cypress (City) that is currently used by the Cypress School District (District) for its administrative and maintenance operations. Occupancy of all 98 units would be restricted to households with at least one member 62 years of age or older. The proposed project will include the subdivision and redevelopment of the project site, and will require approval of a tentative tract map and a Conditional Use Permit for Senior Housing – Affordable by the City of Cypress. As part of a separate project, the District's administrative office would be relocated to a commercial office building located at 5816 Corporate Avenue in Cypress, and the maintenance facilities would be relocated to the currently closed Swain Elementary school site located at 5851 Newman Street, also in Cypress. The District is responsible for preparing any California Environmental Quality Act (CEQA) compliance documentation related to those relocations.

2.2 PROJECT LOCATION AND SITE DESCRIPTION

The project site is located in the north-central part of the City, which is in northwestern Orange County, California. The project site consists of an approximately 6.3-acre property that is located at the northeast corner of Moody Street and Orange Avenue (Assessor's Parcel Number [APN] 244-092-030). Local access to the project site is provided by Orange Avenue and Moody Street. The project site is located approximately 2.4 miles southwest of State Route 91 (SR-91), approximately 7.0 miles west of Interstate 5 (I-5), approximately 2.2 miles east of I-605, and approximately 3.5 miles north of State Route 22 (SR-22) and Interstate 405 (I-405). Figure 2-1, Regional Location, shows the location of the project site within the City and the larger northwestern Orange County region (figures are provided at the end of this section).

Land uses surrounding the project site include a Church of Jesus Christ of Latter-day Saints (LDS) meetinghouse to the east; a small commercial center, an animal hospital, and single-family residential uses to the west, and single-family residential uses to the north and south. Oxford Academy, a public high school and part of the Anaheim Union High School District, is located southeast of the project site across Orange Avenue. The Cypress Civic Center, which includes Cypress City Hall, the Cypress Police Department, and the Cypress Branch of the Orange County Public Library, is located approximately 0.2 mile east of the project site.

With the exception of several soil stockpiles on the northern edge of the site, the project site is relatively flat, with surface drainage directed to the south-southwest. The remainder of the project site contains structures and miscellaneous construction materials and equipment and is paved. Six-foot (ft) tall block walls are located on the northern and eastern sides of the site. Figure 2-2, Local Vicinity, provides an aerial view of the project site and surrounding land uses.

Historically, the project site was in agricultural production use until the administrative and office/ vehicle maintenance building was constructed by the District in 1967. Additional maintenance and storage buildings were constructed between 1968 and 2011. The site has operated with dual purposes, with the District's administrative office on the western portion of the project site and the District's maintenance and storage facility on the eastern portion of the project site, from the 1960s until the present. Figure 2-3, Project Site, provides an aerial view of the project site and adjacent land uses. The District's office building, an education center, and a warehouse are located in the western portion of the project site. The District's maintenance office building and an adjoining vehicle maintenance building are located in the southern portion of the project site. Four storage buildings, three portable office/computer/training buildings, a maintenance shop, and an equipment storage building are situated in the eastern portion of the project site.

2.3 CURRENT LAND USE AND ZONING DESIGNATIONS

According to the City's General Plan, the project site is designated Community Services and Facilities (Education Facilities). The site is currently zoned Public and Semi-Public (PS-1A). Allowable land uses within the Community Services and Facilities designation include public parks, educational facilities, public buildings, and other key community facilities. The PS-1A zone was established to set aside properties to be developed with public uses, other than street rights-of-way. This zoning district is also intended to identify and preserve areas of historic and community significance for the enjoyment of future generations. "Senior Housing – Affordable" is a conditionally permitted use within the "PS – Public and Semi-Public Zone." As part of the project approval, the approval of a Conditional Use Permit is required to allow for the construction of the residential units within the PS-1A Zone.

2.4 PROJECT CHARACTERISTICS

The proposed project would include (1) the demolition and removal of the existing driveways, parking areas, and structures on the site; and (2) the development of 98 attached condominium dwelling units in ten separate buildings on the project site at a maximum density of 15.5 dwelling units per acre. The proposed project would also require the removal of the existing landscaping and soil stockpiles on the project site.

The conceptual site plan and tentative tract map would comply with all of the applicable development standards included in the City's Zoning Ordinance. Figure 2-4, Conceptual Site Plan, provides a more detailed breakdown of the site plan for the proposed project. Figure 2-5, Tentative Tract Map, shows the proposed boundaries of the various parcels and easements included in the proposed tentative tract map. As shown in Figure 2-5, the project would create three common lots. Lots 1 and 2 would be used for condominium purposes and private drive aisles, and Lot A would be used for recreation areas.

As shown in Figure 2-4, the proposed project would consist of 48 attached market-rate senior condominium dwelling units distributed across 8 different buildings (Buildings 1–8) on the western two thirds of the site (Lot 1) and 50 attached affordable senior condominium dwelling units distributed across 2 different buildings (Buildings A and B) on the eastern third of the site (Lot 2). Buildings 1–8 would be situated around an internal driveway loop that would connect to Moody Street and Orange Avenue via a private street along the northern and eastern boundaries of the project site. The proposed project would be developed with a gross density of 15.5 dwelling units per acre. In addition to the proposed residential uses, the project would provide open space and community amenities on Lot A (refer to Section 2.4.6, Open Space and Community Amenities, for additional information regarding the specific improvements proposed).

The District's administrative offices and maintenance and operations facility and transportation operations (school buses) would be relocated under separate projects. Because the relocation of the District's maintenance and operations facility and transportation operations will have independent utility from the proposed project, a separate environmental review process will be undertaken for those relocations, as necessary.

2.4.1 Building Design

The market-rate senior units would feature four different floorplans, and the affordable senior units would feature two different floorplans. The market-rate unit floorplans would include two bedrooms and provide 1,326 to 2,031 square feet (sf) of living space. The affordable senior unit floorplans would include one- and two-bedroom units that range from 767 to 1,003 sf. All of the buildings would be built in a contemporary architectural style and clad in a mix of stucco and horizontal siding in neutral colors. Buildings A and B would feature wood trellises over the building entries and all of the buildings would have concrete "S" tile roofs. Figure 2-6, Elevations, shows details of the building elevations for both the market-rate senior units (Buildings 1–8) and the affordable senior units (Buildings A and B), including the various materials and finishes that are envisioned for incorporation into the building design. As shown in Figure 2-6, the maximum building heights for Buildings 1–8 would be 28 ft, 9 inches, and 27 ft, 9 inches, for Buildings A and B.

2.4.2 Circulation and Access

As mentioned above, access to the site would be provided by two driveways. The primary access to the site would be via a 38 ft driveway along Moody Street. A secondary access point would be provided by a 26 ft driveway along Orange Avenue. Outbound left turns at this secondary driveway along Orange Avenue would be prohibited during student drop-off/pickup periods (from 7:30 a.m. to 9:00 a.m. and from 2:00 p.m. to 3:30 p.m.) in order to reduce potential vehicular conflicts between the proposed project and Oxford Academy. The proposed project would also install appropriate "No Left Turn" signage with these time restrictions at the secondary project driveway on Orange Avenue. These driveways would provide access to a private street that would run along the northern and eastern boundaries of the project site. The private street would connect to an internal circulation loop that would provide direct access to Buildings 1–8. The proposed project would provide internal sidewalks on at least one side of the internal loop roadway and on the private street that would run the northern and eastern boundaries of the project site. Pedestrian connections to Moody Street and Orange Avenue would also be provided to reduce walking

distances from those streets to the interior of the project site. Additional sidewalks would connect the various residential buildings to the proposed open space and community amenities described in further detail below. A 5 ft wide meandering public sidewalk would replace the existing standard sidewalk along Orange Avenue. A portion of the meandering sidewalk would be located on the project site and dedicated through a public easement. The turning radius at the entrance driveways would be 30 ft.

The proposed project would also modify the existing median on Moody Street north of Lemon Avenue to provide a 60 ft deep southbound left-turn pocket into the project's primary driveway.

2.4.3 Parking

The proposed project would provide a total of 133 spaces for the market-rate condominium units (96 garage spaces and 37 uncovered spaces) for a parking space/unit ratio of 2.77:1. In addition, the proposed project would provide a total 86 spaces for the affordable senior units (50 covered carport spaces and 36 uncovered spaces), for a parking space/unit ratio of 1.72:1. The City's Zoning Ordinance requires a minimum of 128 parking spaces for the market-rate condominium units included in the proposed project.[1] Additionally, 69 parking spaces are required for the affordable senior units per the reduced parking standards set forth in the State's Density Bonus Law (specifically, Government Code Section 65915[p][3][A]).[2] The proposed project exceeds the applicable minimum parking requirements outlined in the City's Zoning Code and the State's Density Bonus Law.

2.4.4 Landscaping

The project site currently contains soil stockpiles, pavement, turf grass, and some ornamental trees. As discussed above, the existing trees and vegetation on the site would be removed. Figure 2-7, Conceptual Landscape Plan, provides the proposed details of the landscape design for the proposed project. As shown in Figure 2-7, a 10 ft wide planter would be provided along the south side of the existing 6 ft high masonry wall along the northern boundary of the project site to buffer and screen the access drive aisle from the existing rear yards of the adjacent single-family homes using a mix of columnar and evergreen canopy trees. Although most of the proposed landscape would include low water use plant species, the project would also include higher water use lawn areas that would be designed and sized to accommodate both passive and active uses for residents. The plant palette would consist of low maintenance shrubs and groundcovers, requiring minimal trimming and hedging to reduce the need for gas-operated equipment.

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1 The City's Zoning Ordinance requires 2 parking spaces/unit for market-rate condominium units with two bedrooms and 2.5 parking spaces/unit for market-rate condominium units with three bedrooms with an additional 0.5 space/unit of guest parking.

2 California Government Code Section 65915 limits the City's ability to impose parking standards on the project's affordable dwelling units due to the project site's location within 0.50 mile of a major transit stop and because access from the project site to the major transit stop is unobstructed. Specifically, Government Code Section 65915 requires 1 parking space/unit for affordable dwelling units with one bedroom and 2 parking spaces/unit for affordable dwelling units with two bedrooms.

The proposed project includes a 42-inch-high block wall, interspersed with decorated metal screen fencing, along both Moody Street and Orange Avenue. This wall/fence would be located well inside the property lines along Moody Street and Orange Avenue to allow for landscaping on the interior and exterior of the perimeter wall locations at street frontages. A new 6 ft screen wall would be installed along the entire eastern boundary of the project site, and the existing 6 ft high block wall along the north boundary would remain in place.

2.4.5 Outdoor Lighting

The proposed project's lighting would be distributed throughout the project site. A mix of flow voltage (12v) and regular voltage (120v) lighting would be used to balance both safety lighting and ambient/enhanced lighting throughout the site. Light fixtures would be specified and located to incorporate shielding to minimize and eliminate lighting spill over from the project site into neighboring properties. Figure 2-8, Conceptual Photometric Plan, provides the details of the lighting levels planned for the proposed project. All exterior lighting associated with the proposed project would be implemented in conformance with the exterior lighting requirements in Section 3.11.060, Exterior Lighting, and Section 3.10.060, Light and Glare, of the City's Zoning Ordinance.

2.4.6 Open Space and Community Amenities

As shown in Figure 2-7, the proposed project would be designed to include a community recreational area with a pool and spa, cabanas, a BBQ counter, a natural gas rectangular fire pit area with lounge seating and a shade structure, and a pool building with restrooms. Other proposed recreational facilities include a pickleball court and a shade structure seating area, a bocce ball court with a shade structure, and a picnic table seating area. The proposed project would also include two lawn areas/flex space with adjacent seating. The project would also include an approximately 1,900 sf indoor amenity space on the first floor of Building A for resident use.

2.4.7 Utilities and Drainage

Existing utilities near the project site include 12-inch water lines in Moody Street and Orange Avenue that are owned and maintained by Golden State Water Company (GSWC) and a 10-inch sewer line owned and maintained by the City of Cypress within Orange Avenue. Figure 2-9, Preliminary Utility Plan, shows the locations of the proposed water, sewer, and storm drain connections. As shown in Figure 2-9, new 8-inch water and sewer lines supporting the project would connect to these existing lines within Moody Street and Orange Avenue and would be placed within the proposed internal circulation roadways. The electrical utilities for the project site would be provided by Southern California Edison (SCE), and natural gas services would be provided by the Southern California Gas Company. New natural gas and electrical lines on the project site would connect to existing lines within Orange Avenue. Solid waste services would be provided by Valley Vista Services of Orange County.

The proposed project would underground several existing above-ground electrical lines and dry utilities on the western boundary of the project site along Moody Street and may replace two utility poles on the west side of Moody Street. The final determination regarding the specific improvements to utility poles in the area will be made by SCE and the City Council.

In its existing condition, approximately 51 percent of the project site consists of impervious surface area. Stormwater runoff on the westerly half of the site currently drains generally via sheet flow towards Moody Street to the west, with some portions of the existing parking lot draining to the south towards Orange Avenue. The easterly half of the site currently sheet flows to the south towards Orange Avenue. Stormwater runoff on both the westerly and easterly portions of the site currently flows to a catch basin at the intersection of Moody Street and Orange Avenue, and then enters a 42-inch storm drain in Orange Avenue that conveys the stormwater flows to the Lincoln Avenue Storm Drain and Coyote Creek Channel, then to Coyote Creek and the San Gabriel River, ultimately discharging to the Pacific Ocean.

After project grading and construction, approximately 85 percent of the project site would consist of impervious surface area. Stormwater runoff in the proposed condition would be collected by a series of area drains and sump curb inlet catch basins before being conveyed to seven proposed stormwater biofiltration systems (Modular Wetland Systems) located throughout the site for water quality treatment. The Modular Wetland Systems would treat street, roof, and landscape runoff for the proposed project, as well as reduce project-related flow rates into the existing storm drains by retaining and treating stormwater on the site. The proposed Modular Wetland Systems and catch basins would be designed with internal peak bypass and upstream diversion systems for conveyance of larger storm events. Treated and overflow stormwater from the Modular Wetland Systems would be conveyed via a proposed private underground storm drain system to two public points of connection, then to the same existing 42-inch storm drain in Orange Avenue that currently receives runoff from the project site.

2.4.8 Conservation and Sustainability Features

The proposed project would be designed to comply with the water efficiency and energy conservation requirements included in the California Building Standards Code (California Code of Regulations [CCR], Title 24).

2.5 PROJECT IMPLEMENTATION

Development of the proposed project would require the demolition of the existing structures on the site; excavation and grading of the site; delivery of materials and personnel; construction of the buildings and parking areas; and landscaping of the project site.

Demolition of the existing structures on the project site is estimated to begin in May 2022. Grading and site development activities would begin in June 2022 and conclude in September 2022. Construction of the models for the proposed project's market-rate and affordable units (Buildings 2 and A, respectively) would commence in September 2022. Construction of the market-rate units would continue in three separate phases starting in November 2022. Buildings 7 and 8 would be constructed first, with Buildings 5 and 6 following afterwards and then Buildings 1, 4, and 3. Construction of the various market-rate buildings is anticipated to be completed by July 2024. Of the affordable units, Building A would be constructed first, followed by Building B. Construction of Building B would be completed by November 2024.

Figure 2-10, Preliminary Grading Plan, provides the preliminary grading plans for the proposed project. Based on those plans, approximately 15,135 cubic yards (cy) of cut material and approximately 6,094 cy of fill material would be required, resulting in the need to export approximately 9,041 cy of soil. Demolition, grading, and building activities would involve the use of standard earthmoving equipment such as loaders, bulldozers, cranes, and other related equipment. Construction staging would occur on the project site.

Intermittent single-lane closures along Moody Street and Orange Avenue would be required to accommodate utility lateral installations and construction of the proposed driveway and sidewalks along Orange Avenue during worktime hours only. However, both streets would remain open to vehicular traffic for the entire duration of construction. Pedestrian traffic would be temporarily routed to the southern side of Orange Avenue and the western side of Moody Street during installation of the low perimeter walls, landscaping, driveways, and utilities along the western and southern boundaries of the project site.

2.6 DISCRETIONARY ACTIONS, PERMITS, AND OTHER APPROVALS

In accordance with Sections 15050 and 15367 of the *State CEQA Guidelines,* the City is the designated Lead Agency for the proposed project and has principal authority and jurisdiction for CEQA actions and project approval. Responsible Agencies are those agencies that have jurisdiction or authority over one or more aspects associated with the development of the proposed project and/or mitigation. Trustee Agencies are State agencies that have jurisdiction by law over natural resources affected by a proposed project.

The discretionary actions to be considered by the City as part of the proposed project include the following:

- Approval and adoption of the IS/MND;
- Approval of Conditional Use Permit No. 2021-03 to allow for the development of senior residential housing units in the "PS- Public and Semi-Public Zone"; and
- Approval of Tentative Tract Map 19147, splitting the 6.3-acre project site into three common lots (Lots 1 and 2 for condominium purposes and private drive aisles and Lot A for recreation areas).

Other non-discretionary actions anticipated to be taken by the City and additional agencies at the staff level as part of the proposed project include, but are not limited to, the actions detailed in Table 2.A, below.

Table 2.A: Non-Discretionary Permits/Approvals

Agency	Permit/Approval
City of Cypress Public Works Department	Right-of-way permits for driveways, sidewalks, and other public improvements, and utility connection permits
City of Cypress Community Development Department	Demolition, building, and grading permits
Orange County Fire Authority (OCFA)	Plan approval including emergency access and fire water supply
State Water Resources Control Board (SWRCB)	Notice of Intent (NOI) to comply with the General Activity Construction National Pollutant Discharge Elimination System (NPDES) Permit and Municipal Separate Storm Sewer System (MS4) Permit
Santa Ana Regional Water Quality Control Board (RWQCB) (Region 8)	NPDES Permit

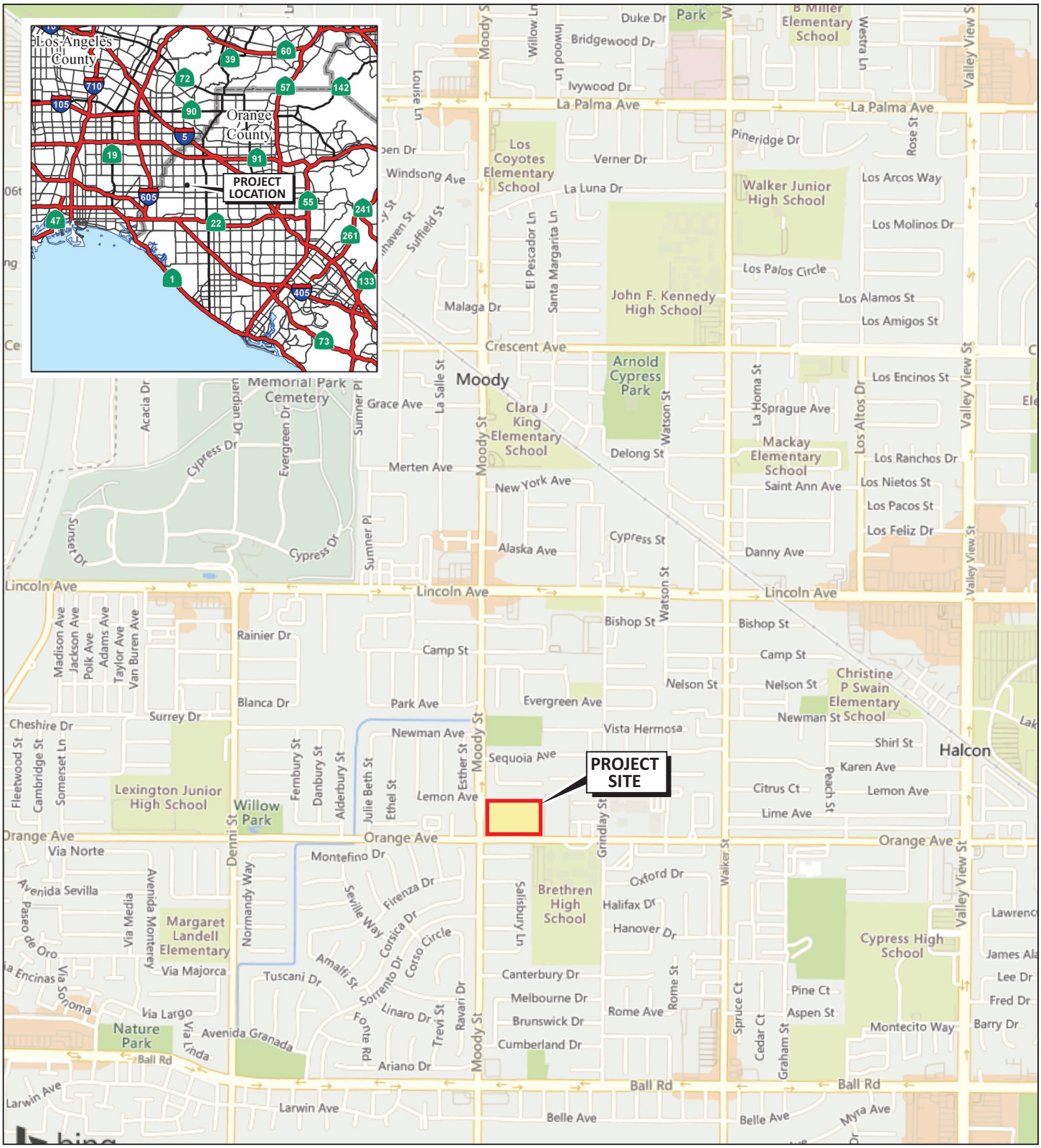

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FIGURE 2-1

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0 750 1500

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SOURCE: Bing Maps

Citrus Square Project

Regional Location

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FIGURE 2-2

SOURCE: Google Earth

Citrus Square Project

Local Vicinity

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FIGURE 2-3

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SOURCE: Google Earth

Citrus Square Project

Project Site

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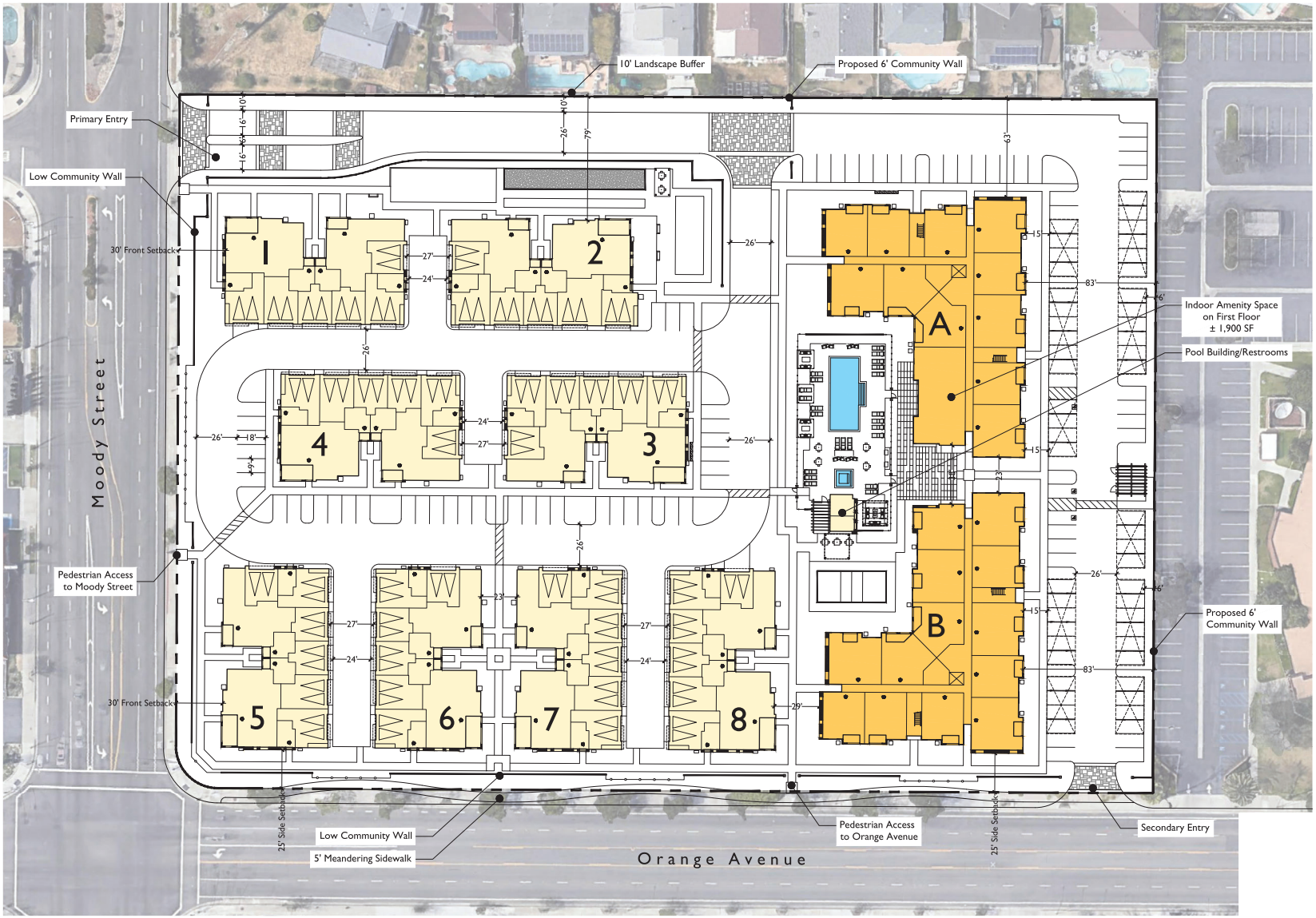

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FIGURE 2-4

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SOURCE: Bassenian Lagoni

Citrus Square Project

Conceptual Site Plan

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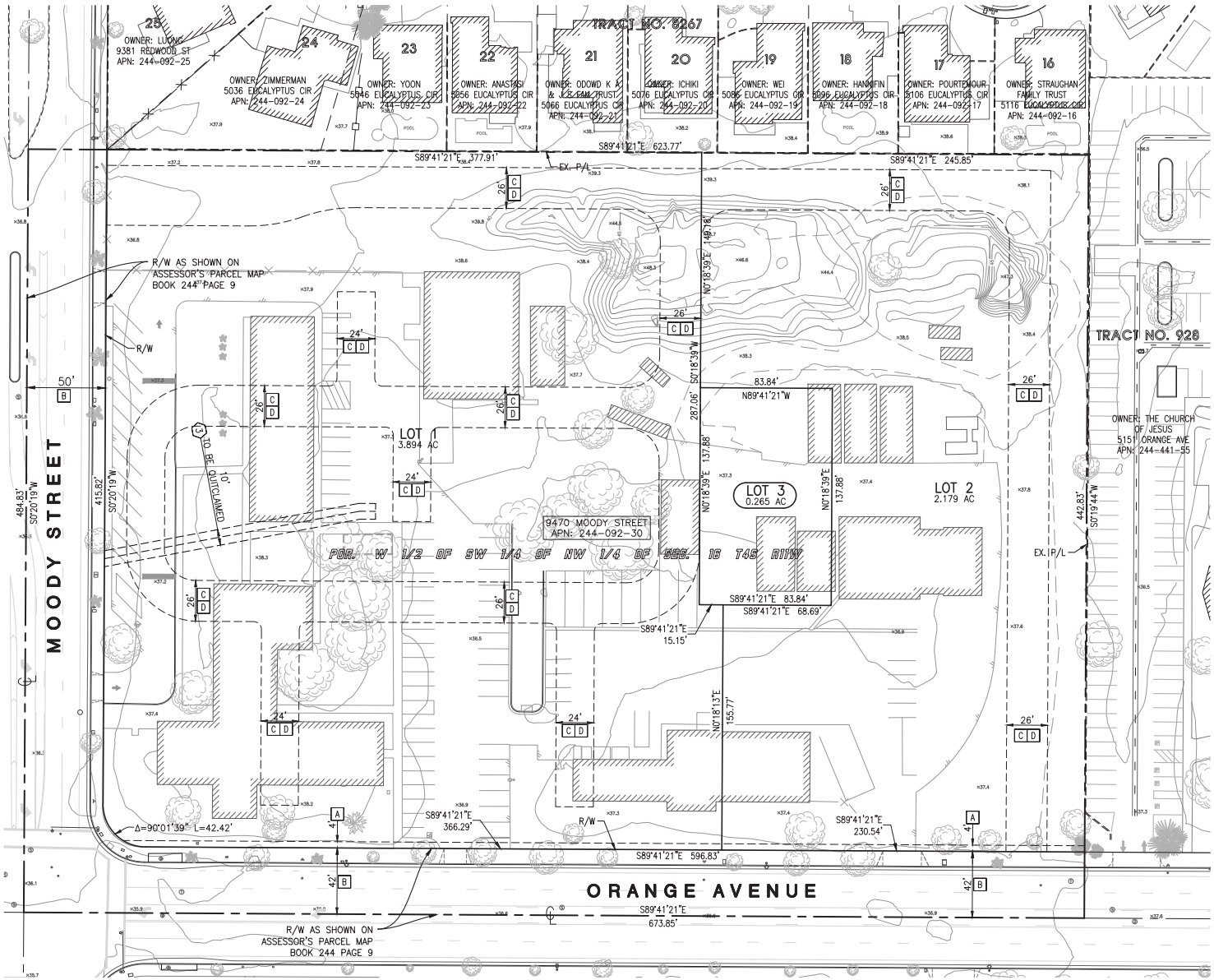

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FIGURE 2-5

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SOURCE: C&V Consulting, Inc.

Citrus Square Project
Tentative Tract Map

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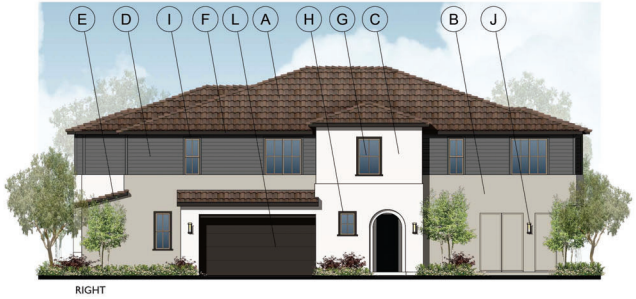

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MATERIAL LEGEND

A. CONCRETE 'S' TILE
B. BASE STUCCO
C. ACCENT STUCCO
D. HORIZONTAL SIDING
E. WOOD BARGE BOARD
F. WOOD FASCIA
G. VINYL WINDOW
H. FOAM TRIM
I. CEMENTITIOUS TRIM
J. LIGHT FIXTURE
K. METAL RAILING
L. ROLL-UP GARAGE DOOR

FIGURE 2-6
Sheet 1 of 4

SOURCE: Bassenian Lagoni

Citrus Square Project

Elevations - Condominium Buildings 1, 3-8

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MATERIAL LEGEND

A. CONCRETE 'S' TILE
B. BASE STUCCO
C. ACCENT STUCCO
D. HORIZONTAL SIDING
E. WOOD BARGE BOARD
F. WOOD FASCIA
G. VINYL WINDOW
H. FOAM TRIM
I. CEMENTITIOUS TRIM
J. LIGHT FIXTURE
K. METAL RAILING
L. ROLL-UP GARAGE DOOR

FIGURE 2-6
Sheet 2 of 4

SOURCE: Bassenian Lagoni

Citrus Square Project

Elevations - Condominium Building 2

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LSA

MATERIAL LEGEND

A. CONCRETE 'S' TILE
B. BASE STUCCO
C. ACCENT STUCCO
D. HORIZONTAL SIDING
E. WOOD BARGE BOARD
F. WOOD FASCIA
G. VINYL WINDOW
H. FOAM TRIM
I. CEMENTITIOUS TRIM
J. LIGHT FIXTURE
K. METAL RAILING
L. ROLL-UP GARAGE DOOR

FIGURE 2-6
Sheet 3 of 4

SOURCE: Bassenian Lagoni

Citrus Square Project
Elevations - Senior Affordable Building A

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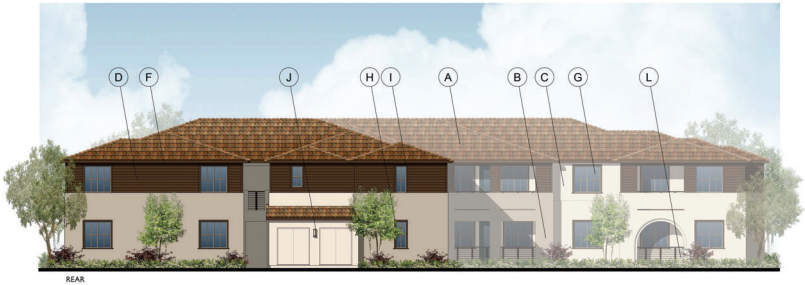

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L. ROLL-UP GARAGE DOOR

FIGURE 2-6
Sheet 4 of 4

SOURCE: Bassenian Lagoni

Citrus Square Project
Elevations - Senior Affordable Building B

I:\CCP1603.11\G\Elevations.cdr (6/10/2021)

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LEGEND

1. Community recreational club area with pool and spa, cabanas, BBQ counter, picnic table seating, chaise lounge chairs, and natural gas rectangular fire pit area with lounge seating and shade structure.
2. Proposed lawn area / flex space with adjacent bench seating.
3. Flex space with mixed linear concrete and artificial turf pattern.
4. Pickleball court open space area with decomposed granite perimeter and shade structure seating area.
5. Bocce ball court with decomposed granite, shade structure, and picnic table seating area.
6. Nine community cluster mailboxes, per USPS review and approval.
7. Proposed wall, gate or fence, per Wall & Fence Plan.
8. Enhanced vehicular pavers.
9. Proposed metal entry arbor.
10. Proposed tree, per Planting Plan.
11. 5' wide community natural colored concrete sidewalk, with light broom finish and saw-cut joints.
12. 4' wide unit entry natural colored concrete walk, in natural colored concrete, with light broom finish & narrow tooled joints.
13. Integral colored concrete, with light broom finish and saw-cut joints.
14. Accessible parking stall and striping, per Civil plans.
15. Resident parking stall & drive lane, per Civil plans.
16. Common area landscape, builder installed and HOA maintained.
17. Community dog bag station (black in color), for pet owners.
18. Property line / R.O.W, per Civil plans.
19. Public street curb & street sidewalk, per civil plans.
20. 6' wide meandering sidewalk; in natural colored concrete, with light broom finish & narrow tooled joints
21. Natural colored concrete driveway, with light broom finish and tooled joints.
22. Overhead parking structure, per others.
23. Proposed 1-2' berm.
24. Transformer, per others.
25. Utilities, per civil plans.

*Conceptual images (provided herein are all subject to change)

LSA

FIGURE 2-7

N

SOURCE: studio PAD

Citrus Square Project

Conceptual Landscape Plan

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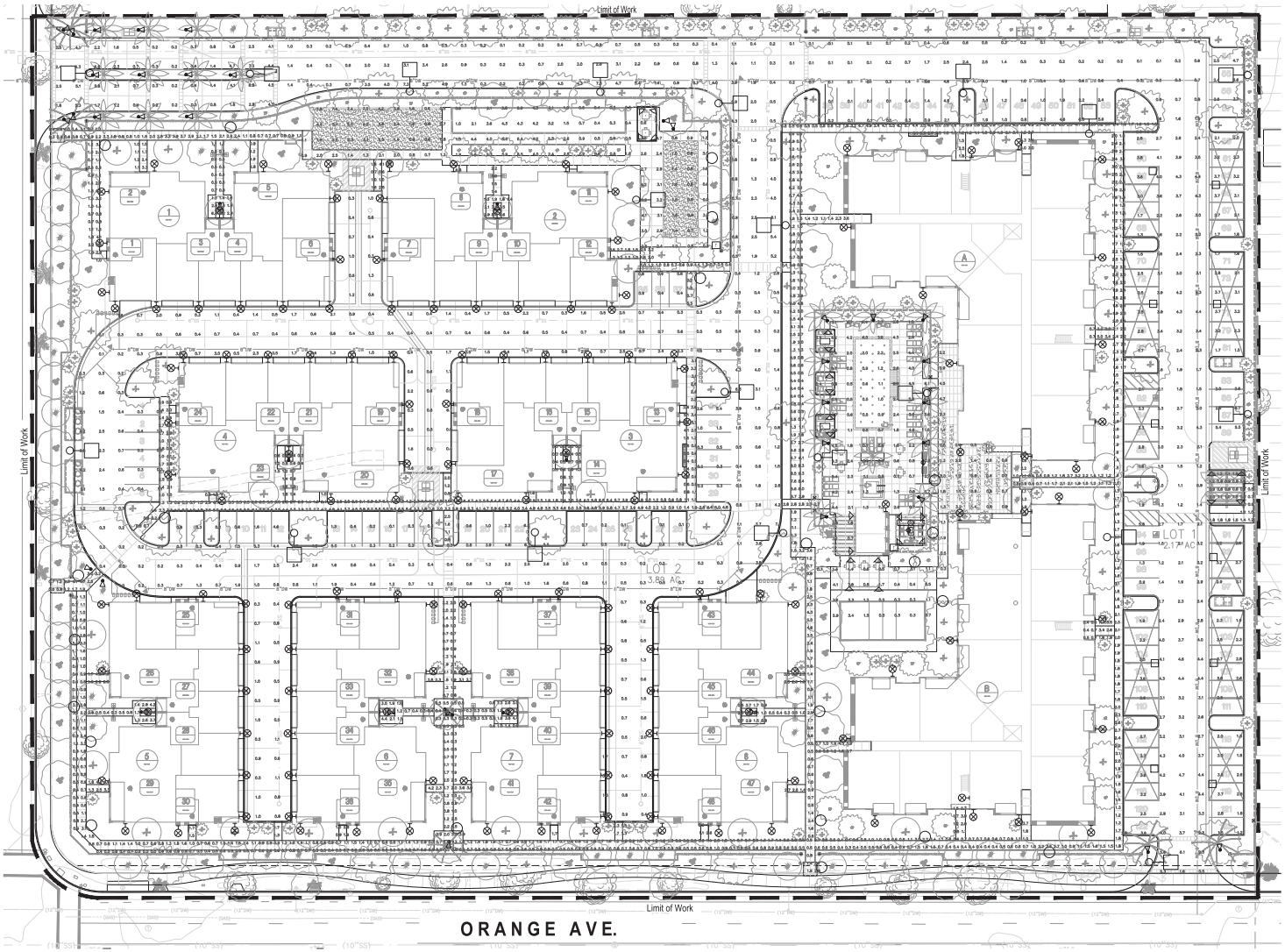

LSA

FIGURE 2-8

N

0 45 90

FEET

SOURCE: studio PAD

Citrus Square Project

Conceptual Photometric Plan

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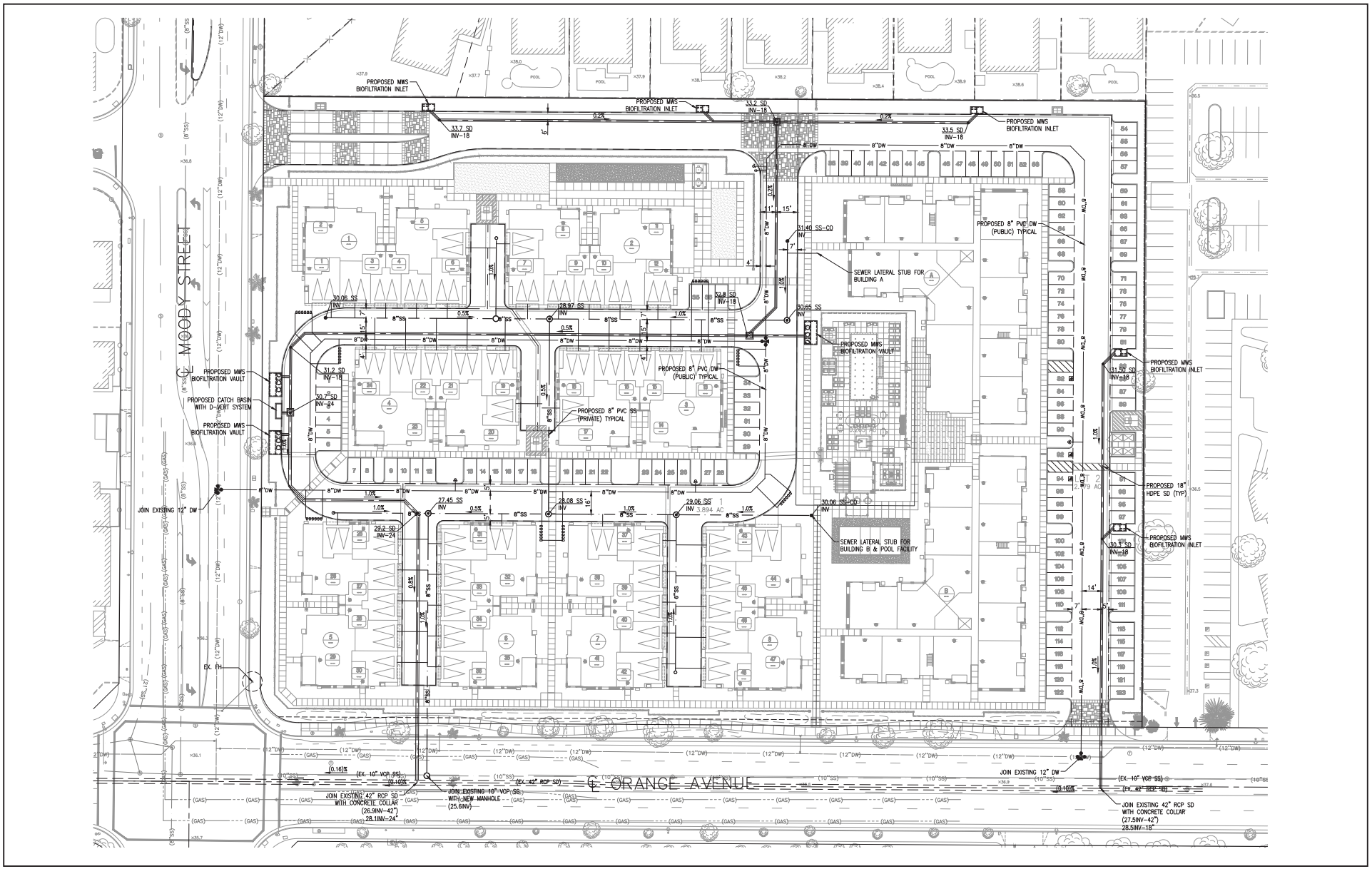

LSA

FIGURE 2-9

0 50 100

FEET

SOURCE: C&V Consulting, Inc.

Citrus Square Project

Preliminary Utility Plan

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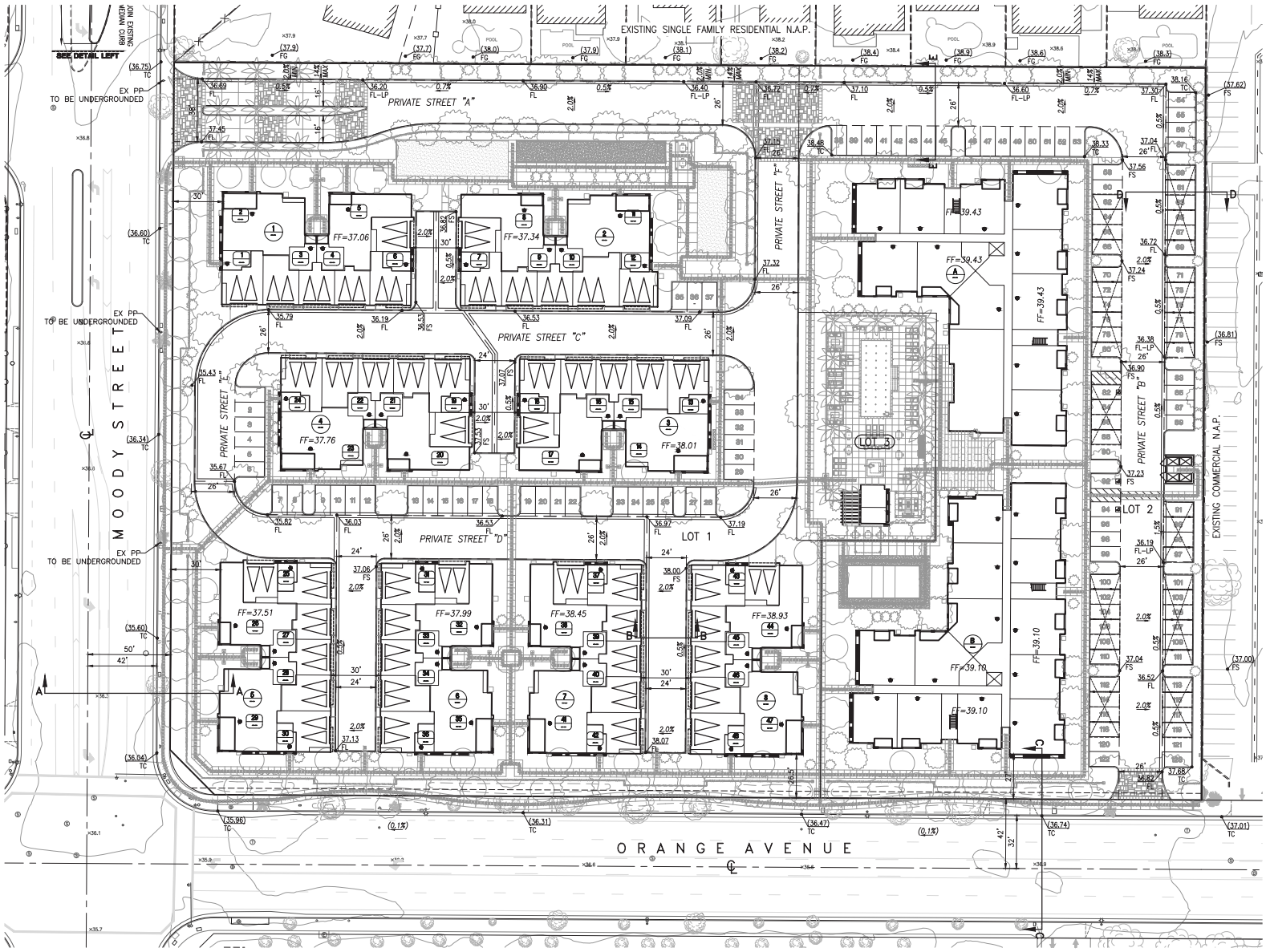

FIGURE 2-10

0 47 94

FEET

SOURCE: C&V Consulting, Inc.

Citrus Square Project

Preliminary Grading Plan

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3.0 ENVIRONMENTAL FACTORS POTENTIALLY AFFECTED

The environmental factors checked below would be potentially affected by this project, involving at least one impact that is a "Potentially Significant Impact" as indicated by the checklist in Chapter 4.0.

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

3.1 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.

☒ 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.

☐ 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 addressed 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 ENVIRONMENTAL IMPACT REPORT or NEGATIVE DECLARATION pursuant to applicable standards, and (b) have been avoided or mitigated pursuant to that earlier ENVIRONMENTAL IMPACT REPORT or NEGATIVE DECLARATION, including revisions or mitigation measures that are imposed upon the proposed project, nothing further is required.

Digitally signed by Alicia Velasco
Date: 2021.08.12 17:23:58 -07'00'

Signature

8/12/21

Date

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4.0 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, an EIR 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 "Earlier Analyses," as described in (5) below, may be cross-referenced).

5) Earlier analyses may be used where, pursuant to the tiering, program EIR, or other CEQA process, an effect has been adequately analyzed in an earlier EIR 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 Addressed. 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 addressed 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 normally 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.

4.1 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:				
a) Have a substantial adverse effect on a scenic vista?	☐	☐	☐	☒
b) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?	☐	☐	☐	☒
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 a 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?	☐	☐	☒	☐
d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?	☐	☐	☒	☐

Discussion

The following section is based on the building elevations and landscape plan included in the development plans for the proposed project and the City of Cypress (City) Municipal Code.

Impact Analysis

a) Would the project have a substantial adverse effect on a scenic vista?

No Impact. A scenic vista is defined as a viewpoint that provides expansive views of a highly valued landscape for the benefit of the general public. Aesthetic components of a scenic vista generally include (1) scenic quality, (2) sensitivity level, and (3) view access. Although the City of Cypress does not provide a definition of scenic vistas, potential scenic vistas include areas with views of the coastline, mountains, or other prominent scenic features that are considered significant visual resources for residents and businesses.

The project site is visible from its southern and western boundaries by vehicles and pedestrians traveling along Orange Avenue and Moody Street, respectively. The City is almost entirely developed and neither the project site nor other properties in the project vicinity provide substantial views of any water bodies, mountains, hilltops, or any other significant visual resources. As such, the City has not designated any scenic corridors or scenic vistas within the City. The project site is located in a flat area and is surrounded by urban development, including a church to the east; a small commercial center, an animal hospital, and single-family residential uses to the west; single-family residential uses to the north and south; and a school to the southeast of the project site.

Buildings in the vicinity of the project site include residential buildings that range from one to two stories and are approximately 25 to 50 feet (ft) in height, commercial structures approximately

25 ft in height, and a church approximately 30 ft in height. The maximum building heights would be 28 ft, 9 inches, and 27 ft, 9 inches, for Buildings 1–8 and Buildings A and B, respectively. As there are no scenic resources that could be blocked by the proposed project and the surrounding area is characterized by residential and commercial development and an adjacent church of similar height, the proposed project would neither alter an existing scenic vista nor block views of any scenic vistas. For these reasons, the development of the proposed project would not have a substantial adverse effect on a scenic vista. Therefore, no impact would occur. No mitigation is required.

b) Would the project substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?

No Impact. The California Department of Transportation (Caltrans) Scenic Highway Program protects the natural scenic beauty of the State's highways and corridors through its designated scenic highways throughout the State. Caltrans defines a scenic highway as any freeway, highway, road, or other public right-of-way that traverses an area of exceptional scenic quality. Other considerations given to a scenic highway designation include how much of the natural landscape a traveler may see and the extent to which visual intrusions degrade the scenic corridor.

The project site is not located in the vicinity of a State Scenic Highway. According to the List of Eligible and Officially Designated State Scenic Highways published by Caltrans, the only State-designated Scenic Highway in the County is a 4-mile portion of State Route 91 (SR-91) from State Route 55 (SR-55) to east of the Anaheim city limits.[3] This portion of SR-91 is approximately 12.5 miles east of the project site. The nearest State highway that is eligible for official designation as a State Scenic Highway is a portion of Pacific Coast Highway (PCH or State Route 1 [SR-1]), which is located approximately 6.5 miles southwest of the project site. Due to distance and intervening land uses, no portion of the project site or surrounding area is viewable from the officially designated portion of SR-91 or the eligible portion of PCH. As such, the project would not result in impacts related to the substantial damage of scenic resources within a State Scenic Highway. Therefore, there would be no impact, and no mitigation is required.

c) In non-urbanized areas, would the project 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?

Less Than Significant Impact. According to the United States Census Bureau, the City of Cypress is located within the Los Angeles—Long Beach—Anaheim, CA Urbanized Area.[4] As described in the *State CEQA Guidelines* Section 15387 and defined by the United States Census Bureau, an

[3] California Department of Transportation (Caltrans). 2015, last modified July 2019. List of Eligible and Officially Designated State Scenic Highways. Website: https://dot.ca.gov/-/media/dot-media/programs/design/documents/desig-and-eligible-aug2019_a11y.xlsx (accessed June 11, 2021).

[4] United States Census Bureau. 2010a. Los Angeles—Long Beach—Anaheim, CA Urbanized Area No. 51445. Website: https://www2.census.gov/geo/maps/dc10map/UAUC_RefMap/ua/ua51445_los_angeles--long_beach--anaheim_ca/DC10UA51445_000.pdf (accessed June 11, 2021).

"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.[5] Because the City is located in an urbanized area, the project site is also located within an urbanized area. Further, surrounding land uses in the vicinity of the project site are representative of urban densities.

In its existing condition, the project site is characterized by several buildings that are currently used by the Cypress School District (District) for its administrative and maintenance operations (refer to Figure 2-3, Existing Conditions, in Chapter 2.0, Project Description). The existing buildings consist of the District's office building, an education center, and a warehouse located on the western portion of the project site, the District's maintenance office building and an adjoining vehicle maintenance building located on the southern portion of the project site, four storage buildings, three portable office/computer/training buildings, a maintenance shop, and an equipment storage building situated on the eastern portion of the project site. The project site is bounded on the west by Moody Street, on the south by Orange Avenue, on the north by residential uses, and on the east by a church.

As stated previously, the project site is visible from its western and southern boundaries by vehicles and pedestrians traveling along Moody Street and Orange Avenue, respectively. Land uses surrounding the project site reflect a developed, urban area that consists of residential, commercial, and institutional uses. Buildings in the vicinity of the project site include residential buildings that range from one to two stories and are approximately 25 to 50 ft in height. The maximum building heights would be 28 ft, 9 inches, and 27 ft, 9 inches, for Buildings 1–8 and Buildings A and B, respectively. The proposed project's building heights are similar to and compatible with the residential, commercial, and institutional uses that surround the project site.

The Cypress General Plan Land Use Policy Map designates the project site as Community Services and Facilities (Education Facilities). The site is currently zoned Public and Semi-Public (PS-1A). Allowable land uses within the Community Services and Facilities designation include public parks, educational facilities, public buildings, and other key community facilities. As part of the project approval process, a Conditional Use Permit approval would be required to allow for the construction of the residential units within the PS-1A zone. With approval of the Conditional Use Permit, the proposed project would be consistent with the site's General Plan and zoning designations. The proposed project would also conform to all applicable development standards in the Cypress Zoning Ordinance. Therefore, the proposed project would not conflict with applicable zoning and other regulations governing scenic quality. As such, impacts would be less than significant, and no mitigation is required.

d) Would the project create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?

Less Than Significant Impact. The impact of nighttime lighting depends upon the type of use affected, the proximity to the affected use, the intensity of specific lighting, and the background or

[5] 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 June 25, 2021).

ambient level of the combined nighttime lighting. Nighttime ambient light levels may vary considerably depending on the age, condition, and abundance of point-of-light sources present in a particular view. The use of exterior lighting for security and aesthetic illumination of architectural features may contribute to ambient nighttime lighting conditions. Spillover light can be problematic in areas where the ambient conditions are very dark, and there are specialized uses that depend on that darkness.

The spillover of light onto adjacent properties has the potential to interfere with certain activities, including vision, sleep, privacy, and the general enjoyment of the natural nighttime condition. Light-sensitive uses include residential, some commercial and institutional uses, and, in some situations, natural areas. Changes in nighttime lighting may become significant if a proposed project substantially increases ambient lighting conditions beyond its property line and project lighting routinely spills over into adjacent light-sensitive land use areas.

Reflective light (glare) is caused by sunlight or artificial light reflecting from finished surfaces (e.g., window glass) or other reflective materials. Glass and other materials can have many different reflectance characteristics. Buildings constructed of highly reflective materials from which the sun reflects at a low angle commonly cause adverse glare. Reflective light is common in urban areas. Glare generally does not result in the illumination of off-site locations but results in a visible source of light viewable from a distance.

Nighttime illumination impacts are evaluated in terms of the project's net change in ambient lighting conditions and proximity to light-sensitive land uses. The project site is developed with the District's administration, maintenance, and storage facilities. The site is developed with buildings, storage units, a gravel lot, paved parking, soil stockpiles, and a dirt access road. The project site is surrounded by a variety of residential, commercial, and institutional uses. Sensitive receptors in the vicinity of the site include residential uses to the north, east, and south of the site, and Oxford Academy south of the project site across Orange Avenue. Other sources of light on and adjacent to the project site include exterior lighting from adjacent properties, streetlights, and vehicle headlights.

***Construction*.** Construction activities would occur primarily during daylight hours. The project would be required to comply with Section 13-70, Special Provisions, of the City's Municipal Code, which requires that construction activities occur only between the hours of 7:00 a.m. and 8:00 p.m. on weekdays and between 9:00 a.m. and 8:00 p.m. on Saturdays. Any construction-related illumination during evening and nighttime hours would be shielded to the extent feasible and would consist of the minimum lighting required for safety and security purposes only and would occur only for the duration required for the temporary construction process. Due to its limited scope and short duration, light resulting from construction activities would not substantially impact sensitive uses, substantially alter the character of off-site areas surrounding the construction area, or interfere with the performance of an off-site activity. 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 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, construction of the proposed project would not create a new source of

substantial light or glare that would adversely affect day or nighttime views in the area, and light impacts associated with construction would be less than significant. No mitigation would be required.

***Operation*.** The proposed project would include lighting that would be distributed throughout the project site. A mix of lighting would be used to balance both safety lighting and ambient/enhanced lighting throughout the site. Light fixtures would be specified and located to incorporate shielding to minimize and eliminate lighting spill over from the project site into neighboring properties. Figure 2-8, Conceptual Photometric Plan, in Chapter 2.0, Project Description, provides the details of the lighting levels planned for the proposed project. All exterior lighting associated with the proposed project would be implemented in conformance with the exterior lighting requirements in Section 3.11.060, Exterior Lighting, and Section 3.10.060, Light and Glare, of the City's Zoning Ordinance. Section 3.10.060, Light and Glare, requires that light and glare associated with residential uses is shielded or directed to avoid illuminating adjacent properties or causing glare that affects motorists. The proposed project will also be required to comply with Cypress Municipal Code Section 3.11.060, Exterior Lighting, which requires that (1) lighting fixtures are appropriate in height, intensity, and scale to the use they are serving; (2) the level of parking lot lights is between 2 and 4 footcandles at the base of the light fixture; and (3) light sources visible from outside a project's boundary are shielded to reduce glare so that neither the light source nor its image from a reflective surface shall be directly visible from any point beyond the property line. Compliance with Cypress Municipal Code Sections 3.10.060 and 3.11.060 would minimize light and glare spillover impacts related to the proposed project.

Impacts related to glare from on-site lighting would not occur because the exterior building materials would not include highly reflective materials.

Therefore, lighting provided as part of the proposed project would be largely consistent with the type and intensity of existing lighting in the vicinity of the project site. The final lighting for the project would be subject to review and approval as part of the site plan review process. In addition, compliance with the City's Municipal Code would ensure sufficient lighting for safety purposes while also ensuring that all exterior lighting would be directed, positioned, or shielded from adjacent land uses. As such, the proposed project would not create a new source of substantial light or glare, which would adversely affect day or nighttime views in the area, and impacts would be less than significant. No mitigation is required.

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4.2 AGRICULTURE AND FORESTRY RESOURCES

	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
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?	☐	☐	☐	☒
b) Conflict with existing zoning for agricultural use, or a Williamson Act contract?	☐	☐	☐	☒
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))?	☐	☐	☐	☒
d) Result in the loss of forest land or conversion of forest land to non-forest use?	☐	☐	☐	☒
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?	☐	☐	☐	☒

Impact Analysis

a) Would the project 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?

No Impact. The proposed project site is currently developed with the Cypress School District's (District) administrative office on the western portion of the project site and the District's maintenance and storage facility on the eastern portion of the project site. As shown in Figure 2-2, Local Vicinity, in Chapter 2.0, Project Description, the project site is surrounded by a religious facility, a small commercial center, an animal hospital, single-family residential uses, and a school. The proposed project would be located in a fully urbanized area that does not contain agricultural uses. The map of Important Farmland in California prepared by the California Department of Conservation does not identify the project site as being Prime Farmland, Unique Farmland, or Farmland of Statewide Importance.[6] As of 2018, the entire project site and surrounding area is located in an area designated "Urban and Built-Up Land." Therefore, implementation of the proposed project would not convert designated Prime Farmland, Unique Farmland, or Farmland of Statewide Importance to a non-agricultural use. No impact would occur, and no mitigation is required.

6 California Department of Conservation (DOC). 2018. Orange County Important Farmland 2018.

b) Would the project conflict with existing zoning for agricultural use, or a Williamson Act contract?

No Impact. The project site is currently zoned Public and Semi-Public (PS-1A).[7] The proposed project does not propose a change to the project site's zoning designation. The area surrounding the project site consists of Urban and Built-Up Land, and the project site itself is non-enrolled land (land not enrolled in a Williamson Act contract and not mapped by the Farmland Mapping & Monitoring Program).[8] Therefore, there would be no conflict with existing zoning for agricultural use or a Williamson Act contract. No impact would occur, and no mitigation is required.

c) Would the project 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))?

No Impact. The project site is not currently used for timberland production, is not zoned as forest land or timberland, and does not contain forest land or timberland as defined by Public Resources Code (PRC) Section 1220(g), PRC Section 4526, or Government Code Section 51104(g). Therefore, no impacts to forest land or timberland would occur, and no mitigation is required.

d) Would the project result in the loss of forest land or conversion of forestland to non-forest use?

No Impact. The project site is currently used by the District for its administrative and maintenance operations and does not contain forest land. The proposed project would not convert forest land to a non-forest use. Likewise, the proposed project would not contribute to environmental changes that would result in the conversion of forest land to a non-forest use. Therefore, no impact would occur, and no mitigation is required.

e) Would the project 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?

No Impact. The project site is not used for agricultural production and does not contain any forest land. The project site is currently zoned Public and Semi-Public (PS-1A) and is used for administrative and maintenance purposes by the District. The proposed project would not require a General Plan Amendment or a change to the site's zoning designation. The project site and surrounding area is characterized by residential, neighborhood commercial, and institutional uses. In addition, the site has been developed since the 1960s. The proposed project would not convert farmland to a non-agriculture use. Likewise, because the project site is already developed and is not within the vicinity of any existing agricultural land or land zoned for agricultural uses, the proposed project would not contribute to environmental changes that could result in the conversion of farmland to non-agricultural use. Therefore, no impact would occur, and no mitigation is required.

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7 City of Cypress. 2021. Zoning Map. Website: https://www.cypressca.org/government/departments/community-development/zoning-map (accessed June 11, 2021).

8 California DOC. 2017. Division of Land Resource Protection. State of California Williamson Act Contract Land.

4.3 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.

	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project:				
a) Conflict with or obstruct implementation of the applicable air quality plan?	☐	☐	☒	☐
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?	☐	☐	☒	☐
c) Expose sensitive receptors to substantial pollutant concentrations?	☐	☐	☒	☐
d) Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?	☐	☐	☒	☐

Discussion

The project site is located within the South Coast Air Basin (Basin). The South Coast Air Quality Management District (SCAQMD) is the regional government agency that monitors and regulates air pollution within the Basin. The Federal Clean Air Act and the California Clean Air Act mandate the control and reduction of specific air pollutants. Under these Acts, the United States Environmental Protection Agency (USEPA) and the California Air Resources Board (CARB) have established ambient air quality standards for specific "criteria" pollutants, designed to protect public health and welfare. Primary criteria pollutants include carbon monoxide (CO), volatile organic compounds (VOC), nitrogen oxides (NO_X), particulate matter (PM_{10}), sulfur dioxide (SO_2), and lead (Pb). Secondary criteria pollutants include ozone (O_3), and fine particulate matter ($PM_{2.5}$). These ambient air quality standards are levels of contaminants, which represent safe levels that avoid specific adverse health effects associated with each criteria pollutant.

The Basin is in nonattainment for the federal and State standards for O_3 and $PM_{2.5}$. In addition, the Basin is in nonattainment for the PM_{10} standard and in attainment/maintenance for the federal PM_{10}, CO, and NO_2 standards. To meet these standards, the SCAQMD has established project-level thresholds for VOC, NO_X, and $PM_{2.5}$. The SCAQMD has established thresholds of significance for criteria pollutant emissions generated during both construction and operation of projects as shown in Table 4.3.A, below.

The SCAQMD considers any projects in the Basin with construction- or operation-related emissions that exceed any of the emission thresholds above to have potentially significant impacts.

Table 4.3.A: SCAQMD Construction and Operation Thresholds of Significance (lbs/day)

	VOC	NO_X	CO	SO_2	PM_{10}	$PM_{2.5}$
Construction Thresholds	75	100	550	150	150	55
Operation Thresholds	55	55	550	150	150	55

Source: South Coast Air Quality Management District (1993).
CO = carbon monoxide
lbs/day = pounds per day
NO_X = nitrogen oxides
$PM_{2.5}$ = particulate matter less than 2.5 microns in size
PM_{10} = particulate matter less than 10 microns in size
SCAQMD = South Coast Air Quality Management District
SO_2 = sulfur dioxides
VOC = volatile organic compounds

In addition, the SCAQMD published its *Final Localized Significance Threshold Methodology* in July 2008, recommending that all air quality analyses include an assessment of air quality impacts to nearby sensitive receptors.[9] This guidance was used to analyze potential localized air quality impacts associated with construction of the proposed project. Localized significance thresholds (LSTs) are developed based on the size or total area of the emission source, the ambient air quality in the source receptor area, and the distance between the project and the nearest sensitive receptor. The SCAQMD defines structures that house persons (e.g., children, the elderly, persons with pre-existing respiratory or cardiovascular illness, and athletes and others who engage in frequent exercise) or places where they gather as sensitive receptors (i.e., residences, schools, playgrounds, child-care centers, convalescent centers, retirement homes, and athletic fields).

LSTs are based on the ambient concentrations of that pollutant within the project Source Receptor Area (SRA) and the distance to the nearest sensitive receptor. For the proposed project, the appropriate SRA for the LST is the Central Orange County area (SRA 17). SCAQMD provides LST screening tables for 25-, 50-, 100-, 200-, and 500-meter source-receptor distances. While the project site is approximately 6.3 acres, for screening purposes, the 5-acre LST thresholds were used for the construction and operational LST analysis. This approach is conservative as it assumes that all on-site emissions associated with the project would occur within a concentrated 5-acre area.

The nearest sensitive receptors are the single-family homes located adjacent to the northern boundary of the project site. Since the adjacent sensitive receptors are within 82 feet (ft) (25 meters) of the project site,[10] the LST analysis followed the guidance of the SCAQMD for evaluating sensitive receptors, discussed in further detail in this analysis. Table 4.3.B lists the LST thresholds that apply during project construction and operation.

[9] South Coast Air Quality Management District (SCAQMD). 2008. *Final Localized Significance Threshold Methodology.* July. Website: http://www.aqmd.gov/docs/default-source/ceqa/handbook/localized-significance-thresholds/final-lst-methodology-document.pdf (accessed May 2021).

[10] SCAQMD. Fact Sheet for Applying CalEEMod to Localized Significance Thresholds. Website: http://www.aqmd.gov/docs/default-source/ceqa/handbook/localized-significance-thresholds/caleemod-guidance.pdf (accessed May 2021).

Table 4.3.B: SCAQMD LST Thresholds (lbs/day)

Emissions Source Category	NO_X	CO	PM_{10}	$PM_{2.5}$
Construction (5-acre, 25-meter distance)	183.0	1,253.0	13.0	7.0
Operations (5-acre, 25-meter distance)	183.0	1,253.0	3.0	2.0

Source: SCAQMD LST Guidance Manual.
Note: SRA 17— Central Orange County, 5 acres, receptors at 82 feet (25 meters).
CO = carbon monoxide
lbs/day = pounds per day
LST = localized significance threshold
NO_x = nitrogen oxides
$PM_{2.5}$ = particulate matter less than 2.5 microns in size
PM_{10} = particulate matter less than 10 microns in size
SCAQMD = South Coast Air Quality Management District

Impact Analysis

a) Would the project conflict with or obstruct implementation of the applicable air quality plan?

Less Than Significant Impact. An Air Quality Management Plan (AQMP) describes air pollution control strategies to be undertaken by a city or county in a region classified as a nonattainment area to meet the requirements of the federal Clean Air Act. The main purpose of an AQMP is to bring an area into compliance with the requirements of federal and State ambient air quality standards (AAQS). The applicable air quality plan is the SCAQMD's adopted 2016 AQMP. The AQMP is based on regional growth projections developed by the Southern California Association of Governments (SCAG).

Consistency with the 2016 AQMP for the Basin would be achieved if a project is consistent with the goals, objectives, and assumptions in the AQMP that were designed to achieve the federal and State air quality standards. Per the SCAQMD's *CEQA Air Quality Handbook* (April 1993, currently being revised), there are two main indicators of a project's consistency with the applicable AQMP: (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 (2) whether the project would exceed the 2016 AQMP's assumptions for the final year for the AQMP.

Consistency Criterion 1. Consistency Criterion No. 1 refers to violations of the California ambient air quality standards (CAAQS) and national ambient air quality standards (NAAQS). CAAQS and NAAQS violations would occur if LSTs or regional significance thresholds are exceeded. As evaluated below in the response under checklist Threshold 4.3(b), the proposed project would result in short-term construction and long-term pollutant emissions that are less than the CEQA significance emissions thresholds established by the SCAQMD. Therefore, the proposed project would not result in an increase in the frequency or severity of any air quality standards violation and would not cause a new air quality standards violation. Therefore, the proposed project would not conflict with the AQMP according to this criterion. On the basis of the preceding discussion, the proposed project is determined to be consistent with the first criterion.

Consistency Criterion 2. The SCAQMD *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. The project proposes construction of a 98-unit senior housing development. Given its limited size, the proposed project is not defined as significant for the purposes of the AQMP consistency analysis.

Based on the analysis presented above, the proposed project is consistent with the City's General Plan and the regional AQMP and would not require a General Plan amendment. Therefore, the proposed project would not conflict with or obstruct implementation of the applicable air quality plan and would result in a less than significant impact. No mitigation is required.

b) Would the project result in a cumulatively considerable net increase of any criteria pollutant for which the project region is nonattainment under an applicable federal or state ambient air quality standard?

Less Than Significant Impact. The Basin is currently designated as nonattainment for the federal and State standards for O_3 and $PM_{2.5}$. In addition, the Basin is in nonattainment for the PM_{10} standard. The Basin's nonattainment status is attributed to the region's development history. Past, present, and future development projects contribute to the region's adverse air quality impacts on a cumulative basis. By its very nature, air pollution is largely a cumulative impact. No single project is sufficient in size to, by itself, result in nonattainment of AAQS. Instead, a project's individual emissions contribute to existing cumulatively significant adverse air quality impacts. If a project's contribution to the cumulative impact is considerable, then the project's impact on air quality would be considered significant.

In developing thresholds of significance for air pollutants, the SCAQMD considered the emission levels for which a project's individual emissions would be cumulatively considerable. If a project exceeds the identified SCAQMD significance thresholds identified above in Table 4.3.B, its emissions would be cumulatively considerable, resulting in significant adverse air quality impacts to the region's existing air quality conditions. Therefore, additional analysis to assess cumulative impacts is not necessary. The following analysis assesses the potential project-level air quality impacts associated with construction and operation of the proposed project.

Construction Emissions. During construction, short-term degradation of air quality may occur due to the release of particulate matter emissions (i.e., fugitive dust) generated by grading, building construction, paving, and other activities. Emissions from construction equipment are also anticipated and would include CO, nitrogen oxides (NO_x), VOC, directly emitted $PM_{2.5}$ or PM_{10}, and toxic air contaminants (TACs) such as diesel exhaust particulate matter.

Construction activities associated with the proposed project would include grading, site preparation, building construction, architectural coating, and paving activities. Construction-related effects on air quality from the proposed project would be greatest during the site preparation phase due to the disturbance of soils. If not properly controlled, these activities would temporarily generate particulate emissions. Sources of fugitive dust would include disturbed soils at the construction site. Unless properly controlled, vehicles leaving the site would deposit dirt and mud on local streets, which could be an additional source of airborne dust after it dries. PM_{10} emissions would vary from day to day, depending on the nature and magnitude of construction activity and local weather

conditions. PM_{10} emissions would depend on soil moisture, silt content of soil, wind speed, and amount of operating equipment. Larger dust particles would settle near the source, whereas fine particles would be dispersed over greater distances from the construction site.

Water or other soil stabilizers can be used to control dust, resulting in emission reductions of 50 percent or more. SCAQMD has established Rule 403: Fugitive Dust, which would require the Applicant to implement measures that would reduce the amount of particulate matter generated during the construction period. The Rule 403 measures that were incorporated in this analysis include:

- Water active sites at least three times daily (locations where grading is to occur shall be thoroughly watered prior to earthmoving).
- Cover all trucks hauling dirt, sand, soil, or other loose materials, or maintain at least 2 ft (0.6 meter) of freeboard (vertical space between the top of the load and the top of the trailer) in accordance with the requirements of California Vehicle Code Section 23114.
- Reduce traffic speeds on all unpaved roads to 15 miles per hour or less.

In addition to dust-related PM_{10} emissions, heavy trucks and construction equipment powered by gasoline and diesel engines would generate CO, sulfur oxides (SO_x), NO_x, VOCs and some soot particulate ($PM_{2.5}$ and PM_{10}) in exhaust emissions. If construction activities were to increase traffic congestion in the area, CO and other emissions from traffic would increase slightly while those vehicles idle in traffic. These emissions would be temporary in nature and limited to the immediate area surrounding the construction site.

Construction emissions were estimated for the proposed project using the California Emissions Estimator Model version 2016.3.2 (CalEEMod). Included in CalEEMod was a 30-month construction schedule for the proposed project beginning construction in May 2022 with completion in November 2024 that also included the demolition of the existing on-site buildings. In addition, the proposed project would require the cut of approximately 15,135 cubic yards of soil and fill of approximately 6,094 cubic yards, resulting in the need to export approximately 9,041 cubic yards of soil. Other precise details of construction activities are unknown at this time; therefore, default settings (e.g., construction equipment and worker trips) from CalEEMod were assumed. Use of Tier 2 construction equipment was included in the CalEEMod modeling. Table 4.3.C identifies the maximum daily emissions associated with construction activities during each construction phase. Appendix A provides CalEEMod output sheets for the construction emissions associated with the proposed project.

As shown in Table 4.3.C, construction emissions associated with the proposed project would not exceed the SCAQMD's thresholds for VOC, NO_X, CO, SO_X, $PM_{2.5}$, and PM_{10}. Therefore, construction of the proposed project would not result in a cumulatively considerable increase of any criteria pollutant for which the project region is in nonattainment under an applicable federal or State AAQS. Impacts would be less than significant, and no mitigation is required.

Table 4.3.C: Short-Term Regional Construction Emissions

Construction Phase	Maximum Daily Regional Pollutant Emissions (lbs/day)							
	VOCs	NO_X	CO	SO_X	Fugitive PM_{10}	Exhaust PM_{10}	Fugitive $PM_{2.5}$	Exhaust $PM_{2.5}$
Demolition	1.4	34.2	25.5	0.0	0.8	0.9	0.2	0.9
Site Preparation	1.3	33.8	23.6	0.0	7.2	0.9	3.9	0.9
Grading	1.5	39.7	22.7	0.1	3.7	0.8	1.6	0.8
Building Construction	1.7	25.3	21.6	0.0	1.1	0.9	0.3	0.9
Paving	1.0	20.2	17.8	0.0	0.2	0.7	0.0	0.7
Architectural Coating	9.6	1.4	2.4	0.0	0.2	0.1	0.1	0.1
Peak Daily Emissions	**9.6**	**39.7**	**25.5**	**0.1**	**8.2**		**4.9**	
SCAQMD Threshold	**75.0**	**100.0**	**550.0**	**150.0**	**150.0**		**55.0**	
Significant?	**No**	**No**	**No**	**No**	**No**		**No**	

Source: Compiled by LSA (June 2021).
CO = carbon monoxide
lbs/day = pounds per day
NO_X = nitrogen oxides
$PM_{2.5}$ = particulate matter less than 2.5 microns in size
PM_{10} = particulate matter less than 10 microns in size
SCAQMD = South Coast Air Quality Management District
SO_X = sulfur oxides
VOCs = volatile organic compounds

Operational Air Quality Impacts. Long-term air pollutant emissions associated with operation of the proposed project include emissions from area, energy, and mobile. Area-source emissions include architectural coatings, consumer products, and landscaping. Energy-source emissions result from activities in buildings that use electricity and natural gas. Mobile-source emissions are from vehicle trips associated with operation of the proposed project.

PM_{10} emissions result from running exhaust, tire and brake wear, and the entrainment of dust into the atmosphere from vehicles traveling on paved roadways. Entrainment of PM_{10} occurs when vehicle tires pulverize small rocks and pavement and the vehicle wakes generate airborne dust. The contribution of tire and brake wear is small compared to the other PM emission processes. Gasoline-powered engines have small rates of particulate matter emissions compared with diesel-powered vehicles.

Energy-source emissions result from activities in buildings for which electricity and natural gas are used. The quantity of emissions is the product of usage intensity (i.e., the amount of electricity or natural gas) and the emission factor of the fuel source. The primary sources of energy demand for the proposed project would include building mechanical systems such as heating and air conditioning, lighting, and plug-in electronics, such as refrigerators or computers. Greater building or appliance efficiency reduces the amount of energy for a given activity and thus lowers the resultant emissions. The emission factor is determined by the fuel source, with cleaner energy sources, like renewable energy, producing fewer emissions than conventional sources. The proposed project would comply with the 2019 California Green Building Standards Code, which was included in this analysis.

Typically, area-source emissions consist of direct sources of air emissions at the project site, including architectural coatings, consumer products, and use of landscape maintenance equipment. This analysis assumes that the proposed project would not include any wood-burning hearths or stoves.

Long-term operation emissions associated with the proposed project were calculated using CalEEMod. Trip generation rates used in CalEEMod for the proposed project were based on the project's trip generation estimates compiled by LSA. The proposed project would generate 363 average daily trips (ADT). In addition, the CalEEMod analysis assumes the proposed project would be consistent with 2019 Title 24 standards, install high-efficiency lighting, install low-flow water fixtures and irrigation systems, and comply with California Department of Resources Recycling and Recovery (CalRecycle) requirements for waste reduction diverted from landfills. The long-term operational emissions associated with the proposed project are shown in Table 4.3.D. Appendix A provides CalEEMod output sheets for the operational emissions of the proposed project.

Table 4.3.D: Project Operational Emissions

Emission Type	Pollutant Emissions (lbs/day)					
	VOC	NO_X	CO	SO_X	PM_{10}	$PM_{2.5}$
Proposed Project Operational Emissions						
Area Sources	2.3	1.5	8.7	<0.01	0.2	0.2
Energy Sources	0.0	0.3	0.1	<0.01	0.0	0.0
Mobile Sources	0.5	2.5	7.4	0.0	2.7	0.7
Total Project Emissions	**2.9**	**4.2**	**16.2**	**0.0**	**2.8**	**0.9**
SCAQMD Threshold	**55.0**	**55.0**	**550.0**	**150.0**	**150.0**	**55.0**
Exceeds Threshold?	**No**	**No**	**No**	**No**	**No**	**No**

Source: Compiled by LSA (June 2021).
Note: Some values may not appear to add correctly due to rounding.
CO = carbon monoxide
lbs/day = pounds per day
NO_X = nitrogen oxides
$PM_{2.5}$ = particulate matter less than 2.5 microns in size
PM_{10} = particulate matter less than 10 microns in size
SCAQMD = South Coast Air Quality Management District
SO_X = sulfur oxides
VOC = volatile organic compounds

The results shown in Table 4.3.D indicate operational emissions associated with the proposed project would not exceed the significance criteria for daily VOC, NO_X, CO, SO_X, PM_{10}, or $PM_{2.5}$ emissions. Therefore, operation of the proposed project would not result in a cumulatively considerable net increase of any criteria pollutant for which the project region is in nonattainment under an applicable federal or State AAQS. Impacts would be less than significant, and no mitigation is required.

Long-Term Microscale (CO Hot Spot) Analysis. Vehicular trips associated with the proposed project would contribute to congestion at intersections and along roadway segments in the vicinity of the project site. Localized air quality impacts would occur when emissions from vehicular traffic increase as a result of the proposed project. The primary mobile-source pollutant of local concern is CO, a direct function of vehicle idling time and, thus, of traffic flow conditions. CO transport is extremely limited; under normal meteorological conditions, it disperses rapidly with distance from the source. However, under certain extreme meteorological conditions, CO concentrations near a congested roadway or intersection may reach unhealthful levels, affecting local sensitive receptors (e.g., residents, schoolchildren, the elderly, and hospital patients).

Typically, high CO concentrations are associated with roadways or intersections operating at unacceptable levels of service or with extremely high traffic volumes. In areas with high ambient

background CO concentrations, modeling is recommended to determine a project's effect on local CO levels.

An assessment of project-related impacts on localized ambient air quality requires that future ambient air quality levels be projected. Existing CO concentrations in the immediate project vicinity are not available. Ambient CO levels monitored at the Anaheim Monitoring Station showed a highest recorded 1-hour concentration of 2.4 parts per million (ppm) (the State standard is 20 ppm) and a highest 8-hour concentration of 1.7 ppm (the State standard is 9 ppm) from 2019 to 2021. The highest CO concentrations would normally occur during peak traffic hours; hence, CO impacts calculated under peak traffic conditions represent a worst-case analysis. Reduced speeds and vehicular congestion at intersections result in increased CO emissions.[11]

Based on the trip generation described in Section 4.17, Transportation, the proposed project would generate 363 ADT, with approximately 20 trips occurring in the AM peak hour and approximately 26 trips occurring in the PM peak hour. As the proposed project would not generate 100 or more AM or PM peak hour trips, the proposed project did not meet the criteria for an evaluation of study area intersection or roadway segment levels of service. Therefore, it is assumed that the addition of the proposed project traffic would not create any significant adverse impacts to nearby intersections.

Therefore, given the extremely low level of CO concentrations in the project area and the lack of traffic impacts at any intersections, project-related vehicles are not expected to contribute significantly to CO concentrations exceeding the State or federal CO standards. Because no CO hot spot would occur, as identified in the proposed project, there would be no project-related impacts on CO concentrations.

Therefore, operation of the proposed project would not result in a cumulatively considerable net increase of any criteria pollutant for which the project region is in nonattainment under an applicable NAAQS and CAAQS, and impacts would be less than significant.

c) Would the project expose sensitive receptors to substantial pollutant concentrations?

Less Than Significant Impact. The SCAQMD defines structures that house persons (e.g., children, the elderly, persons with pre-existing respiratory or cardiovascular illness, and athletes and others who engage in frequent exercise) or places where they gather (i.e., residences, schools, playgrounds, child-care centers, convalescent centers, retirement homes, and athletic fields) as sensitive receptors. Sensitive receptors are defined as people who have an increased sensitivity to air pollution or environmental contaminants. The closest existing sensitive receptors are the single-family homes located to the north on Eucalyptus Circle along the northern project site boundary.

As discussed above, LSTs are based on the ambient concentrations of that pollutant within the project SRA and the distance to the nearest sensitive receptor. SCAQMD provides LST screening tables for 25, 50, 100, 200, and 500-meter source-receptor distances. For the proposed project, the

[11] United States Environmental Protection Agency (USEPA). Outdoor Air Quality Data. 2021. Website: https://www.epa.gov/outdoor-air-quality-data/monitor-values-report (accessed May 2021).

appropriate SRA for the LST is the Central Orange County area (SRA 17). While the project site is approximately 6.3 acres, for screening purposes, the 5-acre LST thresholds were used for the construction and operational LST analysis. This approach is conservative as it assumes that all on-site emissions associated with the proposed project would occur within a concentrated 5-acre area. The results of the LST analysis for both construction and operation of the proposed project are summarized in Tables 4.3.E and 4.3.F.

Table 4.3.E: Construction Localized Emissions

Emissions Sources	Pollutant Emissions (lbs/day)			
	NO_X	CO	PM_{10}	$PM_{2.5}$
Construction Emissions	33.7	24.7	8.0	4.8
SCAQMD LST	**183.0**	**1,253.0**	**13.0**	**7.0**
Significant Emissions?	**No**	**No**	**No**	**No**

Source: Compiled by LSA (June 2021).
Note: SRA 17— Central Orange County, 5 acres, receptors at 82 feet (25 meters).
CO = carbon monoxide
lbs/day = pounds per day
LST = localized significance threshold
NO_X = nitrogen oxides
$PM_{2.5}$ = particulate matter less than 2.5 microns in size
PM_{10} = particulate matter less than 10 microns in size
SCAQMD = South Coast Air Quality Management District
SRA = Source Receptor Area

Table 4.3.F: Operational Localized Emissions

Emissions Sources	Pollutant Emissions (lbs/day)			
	NO_X	CO	PM_{10}	$PM_{2.5}$
On-Site Emissions	1.6	9.1	0.3	0.2
SCAQMD LST	**183.0**	**1,253.0**	**3.0**	**2.0**
Significant Emissions?	**No**	**No**	**No**	**No**

Source: Compiled by LSA (June 2021).
Note: SRA 17— Central Orange County, 5 acre, receptors at 82 feet, on-site traffic 5 percent of total.
CO = carbon monoxide
lbs/day = pounds per day
LST = localized significance threshold
NO_X = nitrogen oxides
$PM_{2.5}$ = particulate matter less than 2.5 microns in size
PM_{10} = particulate matter less than 10 microns in size
SCAQMD = South Coast Air Quality Management District
SRA = Source Receptor Area

The results of the LST analysis, summarized in Tables 4.3.E and 4.3.F, indicate that the proposed project would not result in an exceedance of a SCAQMD LST during project construction or operation. Therefore, the proposed project would result in less than significant localized air quality impacts during construction and operation, and no mitigation is required.

d) Would the project result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?

Less Than Significant Impact. Heavy-duty equipment on the project site during construction would emit odors, primarily from equipment exhaust. In addition, the application of asphalt and architectural coatings during construction activities may result in odors. Standard construction requirements would minimize odor impacts from construction. The construction odor emissions

would be temporary, short-term, and intermittent in nature and would cease upon completion of the respective phase of construction and is thus considered less than significant.

SCAQMD Rule 402 regarding nuisances states: "A person shall not discharge from any source whatsoever such quantities of air contaminants or other material which cause injury, detriment, nuisance, or annoyance to any considerable number of persons or to the public, or which endanger the comfort, repose, health or safety of any such persons or the public, or which cause, or have a natural tendency to cause, injury or damage to business or property." The proposed project does not contain land uses typically associated with emitting objectionable odors. It is expected that project-generated refuse would be stored in covered containers and removed at regular intervals in compliance with the City's solid waste regulations. The proposed project would also be required to comply with SCAQMD Rule 402 to prevent occurrences of public nuisances. Therefore, odors associated with the proposed project construction and operations would be less than significant, and no mitigation is required.

4.4 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 the U.S. Fish and Wildlife Service?	☐	☐	☐	☒
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 the U.S. Fish and Wildlife Service?	☐	☐	☐	☒
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?	☐	☐	☐	☒
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?	☐	☐	☒	☐
e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?	☐	☐	☐	☒
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?	☐	☐	☐	☒

Discussion

The following section is based on the *Biological Resource Technical Memorandum for the Oxford Place Project* (Biological Resources Assessment) conducted by LSA (February 5, 2018) and provided in Appendix B of this IS/MND.

Impact Analysis

a) Would the project 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 the U.S. Fish and Wildlife Service?

No Impact. The proposed project site has been developed with the Cypress School District's (District) facilities since the 1960s and includes administrative buildings, a gravel lot, stockpiled dirt, a dirt access road, and storage containers. Existing landscaping includes turf grass and ornamental trees and shrubs, which are scattered throughout the project site. There is no native vegetation on the project site. As part of the project, all existing on-site landscaping would be removed.

There are no known sensitive species or habitats on site as identified by local/regional plans, policies, or regulations, or by the California Department of Fish and Wildlife (CDFW) or the United States Fish and Wildlife Service (USFWS). The USFWS Critical Habitat for Threatened & Endangered Species map does not identify any locations of critical habitat within approximately 7 miles of the project site. The closest known critical habitat is approximately 7 miles northeast of the project site near West Coyote Hills in the City of Fullerton.[12]

As detailed in the Biological Resources Assessment (LSA 2018), several special-interest plant and animal species are known to occur or potentially occur in the vicinity of the project site. However, due to the project site's sparse vegetation and developed condition, it was determined that there are no special-interest plant or animal species with a moderate or high probability of occurrence on site. In addition, no special-interest plant or animal species were observed during the site survey for the Oxford Place project. Therefore, no impacts to sensitive or special-status species would result from implementation of the proposed project, and no mitigation is required.

b) Would the project have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, and regulations or by the California Department of Fish and Wildlife or the U.S. Fish and Wildlife Service?

No Impact. The project site is currently developed and located in an urban area. There are no natural streams or riparian habitat on the project site. As discussed in Response 4.4(a), the critical habitat in closest proximity to the project site is approximately 7 miles to the northeast. No riparian habitat or sensitive natural communities, as identified in local or regional plans, policies, or regulations or by the CDFW or USFWS, exist on the project site. Therefore, development of the proposed project would not impact any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations, or by the CDFW or USFWS. No mitigation is required.

c) Would the project 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?

No Impact. The project site is located within a highly urbanized area of the City of Cypress and does not contain any federally protected wetlands as defined by Section 404 of the Clean Water Act. As discussed in the Biological Resources Assessment, there are no records indicating that wetlands or jurisdictional drainage features exist on the project site. In addition, no potentially jurisdictional features were observed during the site survey for the Oxford Place project in 2018. Therefore, development of the project site would have no impact on federally protected wetlands, and no mitigation is required.

d) Would the project 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?

[12] United States Fish and Wildlife Service (USFWS). Critical Habitat for Threatened & Endangered Species. Website: https://fws.maps.arcgis.com/home/webmap/viewer.html?webmap=9d8de5e265ad4fe09893cf75b8dbfb77 (accessed February June 11, 2021).

Less Than Significant Impact. The project site is currently developed and is located in an urban area. Due to the surrounding urban development, the project site does not function as a wildlife movement corridor. Species that are found on site either fly onto the site or are able to navigate on the ground through long stretches of urban development. Therefore, the project site does not contain any native resident or migratory fish, wildlife species, or wildlife corridors. In addition, no portion of the project site or the immediately surrounding areas contains an open body of water that serves as natural habitat in which fish could exist.

According to the Biological Resources Assessment for the Oxford Place project (2018), native wildlife habitat is largely absent on the project site and in the vicinity. In addition, the lack of ground cover and suitable foraging habitat make the site undesirable for many local wildlife species.

The existing trees on the project site may provide habitat suitable for nesting migratory birds that were observed on the project site. All of the existing on-site trees, which are primarily ornamental, would be removed during construction. Therefore, the proposed project has the potential to impact active bird nests if vegetation and trees are removed during the nesting season. Nesting birds are protected under the federal Migratory Bird Treaty Act (MBTA) (Title 33, United States Code, Section 703 et seq., see also Title 50, Code of Federal Regulations, Part 10) and Section 3503 of the California Department of Fish and Game Code. Therefore, implementation of the proposed project would be subject to the provisions of the MBTA, which prohibits disturbing or destroying active nests. Project implementation must be accomplished in a manner that avoids impacts to active nests during the breeding season. Therefore, if project construction occurs between February 1 and August 31, a qualified biologist shall conduct a nesting bird survey prior to ground- and/or vegetation-disturbing activities to confirm the absence of nesting birds. As documented in Regulatory Compliance Measure BIO-1, as provided below, avoidance of impacts can be accomplished through a variety of means, including establishing suitable buffers around any active nests. With implementation of Regulatory Compliance Measure BIO-1, impacts to nesting birds would be less than significant, and no mitigation is required.

Regulatory Compliance Measures and Mitigation Measures:

No mitigation is required. However, the following regulatory compliance measure is an existing regulation that is applicable to the proposed project and is considered in the analysis of potential impacts related to biological resources. The City of Cypress considers this requirement to be mandatory; therefore, it is not a mitigation measure.

Regulatory Compliance Measure BIO-1 **Nesting Bird Survey and Avoidance.** If vegetation removal, construction, or grading activities are planned to occur within the active nesting bird season (February 1 through August 31), the City of Cypress, or designee, shall confirm that the Applicant has retained a qualified biologist who shall conduct a preconstruction nesting bird survey no more than 3 days prior to the start of such activities. The nesting bird survey shall include the work area and areas adjacent to the site (within 500 feet, as feasible) that could potentially be affected by project-related activities such as noise, vibration, increased

human activity, and dust, etc. For any active nest(s) identified, the qualified biologist shall establish an appropriate buffer zone around the active nest(s). The appropriate buffer shall be determined by the qualified biologist based on species, location, and the nature of the proposed activities. Project activities shall be avoided within the buffer zone until the nest is deemed no longer active, as determined by the qualified biologist.

e) Would the project conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?

No Impact. The Landmark Tree Ordinance in the City's Municipal Code protects designated landmark trees that are specifically identified in the City's *Inventory of Landmark Trees* (July 1996). As shown in this inventory, there are no landmark trees on the project site. The removal of any on-site trees or vegetation would not conflict with the City's Landmark Tree Ordinance.

Per Article IV of the Municipal Code, Street Trees, any tree within the public right-of-way belongs to the City of Cypress. Any work to street trees conducted as part of the proposed project would be done in accordance with the City Council's adopted Parkway Tree Policy. The City has not adopted any other policies or ordinances protecting biological resources.

Therefore, because the project would comply with all local policies and ordinances relating to tree protection, it would not result in any conflicts with local policies or ordinances protecting biological resources. No impacts would occur, and no mitigation is required.

f) Would the project conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?

No Impact. There is no adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other habitat conservation plan in the City. However, Orange County Transportation Authority's (OCTA) Natural Community Conservation Plan/Habitat Conservation Plan (NCCP/HCP) includes a Plan Area that covers the entirety of Orange County. Only some portions of the Plan Area fall within a designated Permit Area, or the area in which OCTA would request authorization from CDFW and USFWS to issue permits due to potential project-related impacts to certain identified species. Because the project site does not fall within a Permit Area, the proposed project would not conflict with any local, regional, or State Habitat Conservation Plan. Therefore, the proposed project would result in no impacts related to conflict with a Habitat Conservation Plan, and no mitigation is required.

4.5 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 resource pursuant to §15064.5?	☐	☐	☐	☒
b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5?	☐	☒	☐	☐
c) Disturb any human remains, including those interred outside of formal cemeteries?	☐	☐	☒	☐

Discussion

The following section is based on extensive archival research and a field survey conducted by LSA in support of the proposed project's Historic Resources Assessment (LSA, June 2021), which is provided in Appendix C of this IS/MND. Additionally, discussion in this section references correspondence and database records from the South Central Coastal Information Center (SCCIC) (February 2018), which were used for the City of Cypress' Oxford Place IS/MND (April 2018), as it shares generally the same project site location as the current proposed project.

Impact Analysis

a) Would the project cause a substantial adverse change in the significance of a historical resource pursuant to §15064.5?

No Impact. Based on the previous level of disturbance on the site and the findings identified in the project's Historic Resources Assessment (June 2021), no known historic resources occur on the project site. Therefore, the proposed project would not cause a substantial adverse change in the significance of a historical resource. No impact would occur, and no mitigation is required.

b) Would the project cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5?

Less Than Significant with Mitigation Incorporated. Based on archival research conducted for the project's Historic Resources Assessment (June 2021), and the City of Cypress General Plan Conservation, Open Space and Recreation Element, there are no known archaeological resources located at the project site. The project has been previously disturbed to construct various structures as well as material stockpiling and storage purposes. The existing structures at the project site would be demolished, materials removed, and the entirety of the site would be graded for the construction of the proposed project. During site preparation/grading activities, there is the potential to encounter unknown cultural resources. In the event that historical or archaeological resources are encountered during grading and construction, operations shall cease and Mitigation Measure CUL-1 will be implemented. With the implementation of Mitigation Measure CUL-1, project impacts to archaeological resources would be less than significant with mitigation incorporated.

Mitigation Measure:

Mitigation Measure CUL-1 **Unknown Archaeological Resources.** In the event that archaeological resources are discovered during excavation, grading, or construction activities, work shall cease within 50 feet of the find until a qualified archaeologist from the Orange County List of Qualified Archaeologists has evaluated the find in accordance with federal, State, and local guidelines to determine whether the find constitutes a "unique archaeological resource," as defined in Section 21083.2(g) of the California Public Resources Code (PRC). The Applicant and its construction contractor shall not collect or move any archaeological materials and associated materials. Construction activity may continue unimpeded on other portions of the project site. Any found deposits shall be treated in accordance with federal, State and local guidelines, including those set forth in PRC Section 21083.2. Prior to commencement of grading activities, the Director of the City of Cypress (City) Community Development Department, or designee, shall verify that all project grading and construction plans include specific requirements regarding California PRC (Section 21083.2[g]) and the treatment of archaeological resources as specified above.

c) Would the project disturb any human remains, including those interred outside of dedicated cemeteries?

Less Than Significant Impact. No known human remains are present on the project site, and there are no facts or evidence to support the idea that Native Americans or people of European descent are buried on the project site. However, as described previously, buried and undiscovered archaeological remains, including human remains, may be present below the ground surface in portions of the project site. Disturbing human remains could violate the State's Health and Safety Code, as well as destroy the resource. In the unlikely event that human remains are encountered during project grading, the proper authorities would be notified, and standard procedures for the respectful handling of human remains during the earthmoving activities would be adhered to. Construction contractors are required to adhere to California Code of Regulations (CCR) Section 15064.5(e), PRC Section 5097, and Section 7050.5 of the State's Health and Safety Code. To ensure proper treatment of burials in the event of an unanticipated discovery of a burial, human bone, or suspected human bone, the law requires that all excavation or grading in the vicinity of the find halt immediately, the area of the find be protected, and the contractor immediately notify the County Coroner of the find. The contractor, the Applicant, and the County Coroner are required to comply with the provisions of CCR Section 15064.5(e), PRC Section 5097.98, and Section 7050.5 of the State's Health and Safety Code. Compliance with these provisions (specified in Regulatory Compliance Measure CUL-1), would ensure that any potential impacts to unknown buried human remains would be less than significant by ensuring appropriate examination, treatment, and protection of human remains as required by State law.

Regulatory Compliance Measures and Mitigation Measures:

No mitigation is required. However, the following regulatory compliance measure is a standard condition based on State law related to the discovery of human remains. This regulatory compliance measure is applicable to the proposed project and shall be incorporated to ensure that the project has minimal impacts related to unknown buried human remains.

Regulatory Compliance Measure CUL-1

Human Remains. In the event that human remains are encountered on the project site, work within 50 feet of the discovery shall be redirected and the County Coroner notified immediately consistent with the requirements of California Code of Regulations (CCR) Section 15064.5(e). State Health and Safety Code Section 7050.5 states that no further disturbance shall occur until the County Coroner has made a determination of origin and disposition pursuant to Public Resources Code (PRC) Section 5097.98. If the remains are determined to be Native American, the County Coroner shall notify the Native American Heritage Commission (NAHC), which shall determine and notify a Most Likely Descendant (MLD). With the permission of the property owner, the MLD may inspect the site of the discovery. The MLD shall complete the inspection within 48 hours of notification by the NAHC. The MLD may recommend scientific removal and non-destructive analysis of human remains and items associated with Native American burials. Consistent with CCR Section 15064.5(d), if the remains are determined to be Native American and an MLD is notified, the City of Cypress shall consult with the MLD as identified by the NAHC to develop an agreement for treatment and disposition of the remains. Prior to the issuance of grading permits, the Director of the City of Cypress Community Development Department, or designee, shall verify that all grading plans specify the requirements of CCR Section 15064.5(e), State Health and Safety Code Section 7050.5, and PRC Section 5097.98, as stated above.

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4.6 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?	☐	☐	☒	☐
b) Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?	☐	☐	☒	☐

Discussion

Total electricity generation in California in 2021 (the most recent data published by the California Energy Commission [CEC]) was 279,402 gigawatt-hours (GWh), down 2.1 percent from 2018's total generation of 285,488 GWh. The project site is within the service territory of Southern California Edison (SCE). SCE provides electricity to more than 15 million people in a 50,000-square-mile area of Central, Coastal, and Southern California.[13] According to the CEC, total electricity consumption in the SCE service area in 2019 was 80,913 gigawatt-hours (GWh). Total electricity consumption in Orange County in 2019 was 19,460 GWh (19,459,510,000 kilowatt hours [kWh]).[14]

Natural gas consumed in California is used for electricity generation (45 percent), residential uses (21 percent), industrial uses (25 percent), and commercial uses (9 percent). California continues to depend on out-of-state imports for nearly 90 percent of its natural gas supply.[15] The Southern California Gas Company (SoCalGas) is the natural gas service provider for the project site. SoCalGas provides natural gas to approximately 21.8 million people in a 24,000 sq mi service area throughout Central and Southern California, from Visalia to the Mexican border.[16] According to the CEC, total natural gas consumption in the SoCalGas service area in 2019 was 5,425 million therms (2,419 million therms for the residential sector and 3,006 million therms for the commercial sector). Total natural gas consumption in Orange County in 2019 was 623 million therms (382 million therms for the residential sector and 241 million therms for the non-residential sector).[17]

[13] Southern California Edison (SCE). Fact Sheets. Website: https://newsroom.edison.com/fact-sheets/fs (accessed May 2021).

[14] California Energy Commission (CEC). 2019a. California Energy Consumption Database. Website: http://www.ecdms.energy.ca.gov/ (accessed May 2021).

[15] CEC. 2020. Supply and Demand of Natural Gas in California. Website: https://www.energy.ca.gov/data-reports/energy-almanac/californias-natural-gas-market/supply-and-demand-natural-gas-california (accessed May 2021).

[16] Southern California Gas Company (SoCalGas). 2019. About SoCalGas. Website: https://www3.socalgas.com/about-us/company-profile (accessed May 2021).

[17] CEC. 2019b. Gas Consumption by County. Website: http://www.ecdms.energy.ca.gov/gasbycounty.aspx (accessed May 2021).

Gasoline is the most used transportation fuel in California, with 97 percent of all gasoline being consumed by light-duty cars, pickup trucks, and sport utility vehicles. According to the most recent data available, total gasoline consumption in California was 365,610 thousand barrels or 1,847.8 trillion British Thermal Units (BTU) in 2018.[18] Of the total gasoline consumption, 349,108 thousand barrels or 1,764.4 trillion BTU were consumed for transportation.[19] Based on fuel consumption obtained from EMFAC2021, 131.2 million gallons of diesel and 1.2 billion gallons of gasoline will be consumed from vehicle trips in Orange County in 2021.

The proposed 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 output, which is included in Appendix A.

Impact Analysis

a) Would the project result in a potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?

Less Than Significant Impact.

Construction Energy Use. Construction of the proposed project is anticipated to last 30 months and would require demolition, site preparation, grading, building construction, paving, and architectural coating activities during construction. Construction and demolition activities would require energy for the manufacture and transportation of construction materials, preparation of the site for grading and building activities, and construction of the building. All or most of this energy would be derived from non-renewable resources. Petroleum fuels (e.g., diesel and gasoline) would be the primary sources of energy for these activities. Construction of the proposed project would not involve the consumption of natural gas because none of the construction-related equipment would be powered by natural gas.

Transportation energy represents the largest energy use during construction and would occur from the transport and use of construction equipment, delivery vehicles and haul trucks, and construction worker vehicles that would use petroleum fuels. Therefore, the analysis of energy use during construction focuses on fuel consumption. Construction trucks and vendor trucks hauling materials to and from the project site would be anticipated to use diesel fuel, whereas construction workers traveling to and from the project site would be anticipated to use gasoline-powered vehicles. Fuel consumption from transportation uses depends on the types and number of trips, vehicle miles traveled (VMT), vehicle fuel efficiency, and travel mode.

[18] A British Thermal Unit is defined as the amount of heat required to raise the temperature of one pound of water by one degree Fahrenheit.

[19] U.S. Energy Information Administration. 2020. California State Profile and Energy Estimates. Table F3: Motor gasoline consumption, price, and expenditure estimates, 2017. Website: eia.gov/state/seds/data.php?incfile=/state/seds/sep_fuel/html/fuel_mg.html&sid=CA (accessed June 2021).

Estimates of fuel consumption (diesel fuel and gasoline) from construction equipment, construction trucks, and construction worker vehicles were based on construction equipment assumptions and trip estimates from CalEEMod and fuel efficiencies from the EMFAC2017 model. Fuel consumption estimates are presented in Table 4.6.A.

Table 4.6.A: Construction-Related Fuel Consumption

Category	Annual VMT	Estimated Annual Fuel Consumption (gallons)
Diesel Fuel		
Construction Equipment		70,400
Construction Vendor and Haul Trip		33,648
Total Diesel Consumption		**104,048**
Construction Worker Trips		45,281
Total Gasoline Consumption		**45,281**

Source: Compiled by LSA (June 2021).
VMT = vehicle miles traveled

As indicated in Table 4.6.A, during construction, the proposed project would consume an estimated 104,048 gallons of diesel fuel and 45,281 gallons of gasoline. Based on fuel consumption obtained from EMFAC2021, 131.2 million gallons of diesel and 1.2 billion gallons of gasoline will be consumed from vehicle trips in Orange County in 2021. Therefore, construction of the proposed project would increase the annual construction generated fuel use in Orange County by approximately 0.1 percent for diesel fuel usage and less than 0.1 percent for gasoline fuel usage. As such, construction of the proposed project would have a negligible effect on local and regional energy supplies. Furthermore, impacts related to energy use during construction would be temporary and relatively small in comparison to Orange County's overall use of the State's available energy sources. No unusual project characteristics would necessitate the use of construction equipment that would be less energy efficient than at comparable construction sites in the region or the State.

The proposed project would utilize construction contractors who practice compliance with applicable California Air Resources Board (CARB) regulations regarding retrofitting, repowering, and replacement of diesel off-road construction equipment. Additionally, CARB has adopted the Airborne Toxic Control Measure to limit heavy-duty diesel motor vehicle idling in order to reduce public exposure to diesel particulate matter and other toxic air contaminants (TACs).[20] Compliance with anti-idling and emissions regulations would result in a more efficient use of construction-related energy and the minimization or elimination of wasteful or unnecessary consumption of energy. Idling restrictions and the use of newer engines and equipment would result in less fuel combustion and energy consumption.

Additionally, certain incidental construction-source energy efficiencies would likely accrue through implementation of California regulations and best available control measures (BACM). More specifically, California Code of Regulations (CCR) Title 13, Motor Vehicles, Section 2449(d)(3) Idling, limits idling times of construction vehicles to no more than five minutes, thereby precluding

[20] California Air Resources Board (CARB). Airborne Toxic Control Measures. Website: https://ww2.arb.ca.gov/resources/documents/airborne-toxic-control-measures (accessed May 2021).

unnecessary and wasteful consumption of fuel due to unproductive idling of construction equipment. To ensure adherence to these regulations, the Applicant would be required to comply with Regulatory Compliance Measure EN-1, provided below, which requires the placement of signage on the project site informing the construction workers that engines must be shut off at or before 5 minutes of idling.

Indirectly, construction energy efficiencies and energy conservation would be achieved for the proposed development through energy efficiencies realized from bulk purchase, transport, and use of construction materials.

In general, the construction process would promote conservation and efficient use of energy by reducing raw materials demands, with related reduction in energy demands associated with raw materials extraction, transportation, processing, and refinement. Use of materials in bulk reduces energy demands associated with the preparation and transport of construction materials as well as the transport and disposal of construction waste and solid waste in general, with corollary reduced demands on area landfill capacities and energy consumed by waste transport and landfill operations. With adherence to Regulatory Compliance Measure EN-1, the project impacts related to energy during construction would be less than significant.

Operational Energy Demands. Energy consumption associated with operation of the proposed project would include transportation energy demands (e.g., energy consumed by future residents, employees, and visitors accessing the project site) and facilities energy demands (e.g., energy consumed by building operations and site maintenance activities).

Energy that would be consumed by project-generated traffic is a function of total VMT and estimated vehicle fuel economies of the various types of vehicles accessing the project site. Trip generation rates used in CalEEMod for the proposed project were based on the project's trip generation estimates presented in Section 4.17, Transportation. The proposed project would generate 363 average daily trips. Based on CalEEMod, the proposed project would generate approximately 1,075,446 VMT per year. The average fuel economy for light-duty vehicles (autos, pickups, vans, and SUVs) in the United States has steadily increased from about 14.9 miles per gallon (mpg) in 1980 to 22.2 mpg in 2019.[21] Therefore, using the USEPA fuel economy estimates for 2019, the proposed project would result in the consumption of approximately 48,444 gallons of fuel (gasoline and diesel) per year.

Energy use in buildings is divided into energy consumed by the built environment and energy consumed by uses that are independent of the construction of the building such as in plug-in appliances. In California, the California Building Standards Code Title 24 governs energy consumed by the built environment, mechanical systems, and some types of fixed lighting. Non-building energy use, or "plug-in" energy use can be further subdivided by specific end-use (refrigeration, cooking, appliances, etc.). Annual natural gas and electricity usage estimates associated with project operation were obtained from CalEEMod. The CalEEMod analysis assumes the proposed project

[21] U.S. Department of Transportation (USDOT). "Table 4-23: Average Fuel Efficiency of U.S. Light Duty Vehicles." Website: https://www.bts.dot.gov/bts/bts/content/average-fuel-efficiency-us-light-duty-vehicles (accessed May 20, 2021).

would be consistent with 2019 Title 24 standards, install high-efficiency lighting, install low-flow water fixtures and irrigation systems, and comply with CalRecycle requirements for waste reduction diverted from landfills. Table 4.6.B provides the proposed project's estimated annual operational energy usage.

Table 4.6.B: Estimated Annual Energy Use of the Proposed Project

Land Use	Electricity Use (kWh per year)	Natural Gas Use (therms per year)	Fuel Consumption (gallons per year)
Senior Living Facility	414,314	10,377	48,444
Parking Lot	16,015	0	0
Total	**430,329**	**10,377**	**48,444**

Source: Compiled by LSA (May 2021).
kBTU = kilo-British Thermal Unit(s)
kWh = kilowatt-hour(s)

As shown in Table 4.6.B, the estimated potential increase in electricity demand associated with the operation of the proposed project is 430,329 kWh per year. Total electricity demand in Orange County in 2019 was approximately 19,459 GWh (19,459,508,543 kWh). Therefore, operation of the proposed project would increase the annual electricity consumption in Orange County by less than 0.1 percent.

Also as shown in Table 4.6.B, the estimated potential increase in natural gas demand associated with the proposed project is 10,377 therms per year. Total natural gas consumption in Orange County in 2019 was 623 million therms (623,146,364 therms). Therefore, operation of the proposed project would negligibly increase the annual natural gas consumption in Orange County by less than 0.1 percent.

Electrical and natural gas demand associated with project operations would not be considered inefficient, wasteful, or unnecessary in comparison to other similar developments in the region. Furthermore, the proposed project would not conflict with or obstruct a State or local plan for renewable energy or energy efficiency. The project would be required to adhere to all federal, State, and local requirements for energy efficiency, including the Title 24 standards as discussed above, which would significantly reduce energy usage.

The proposed project would also result in energy usage associated with gasoline and diesel fuel consumed by project-related vehicle trips. As shown in Table 4.6.B, fuel use associated with the vehicle trips generated by the proposed project is estimated at 48,444 gallons of fuel (gasoline and diesel). Based on fuel consumption obtained from EMFAC2017, 164.2 million gallons of diesel and 1.3 billion gallons of gasoline were consumed from vehicle trips in Orange County in 2019. Therefore, operation of the proposed project would result in a negligible increase in the annual gasoline and diesel fuel consumption in Orange County. Fuel consumption associated with vehicle trips generated by project operations would not be considered inefficient, wasteful, or unnecessary in comparison to other similar developments in the region. Impacts are considered less than significant, and no mitigation is required.

Regulatory Compliance Measures and Mitigation Measures:

The following regulatory compliance measure is an existing regulation that is applicable to the proposed project and is considered in the analysis of potential impacts related to energy. The City of Cypress considers this requirement to be mandatory; therefore, it is not a mitigation measure.

Regulatory Compliance Measure EN-1 **Idling Restriction Signage.** Prior to the issuance of grading permits, the City of Cypress Community Development Director, or designee, shall confirm that the grading plans for the project include a requirement that a sign shall be posted on site stating that construction workers shall shut off engines at or before five minutes of idling.

b) Would the project conflict with or obstruct a state or local plan for renewable energy or energy efficiency?

Less Than Significant Impact. In 2002, the Legislature passed SB 1389, which required the CEC to develop an integrated energy plan every 2 years for electricity, natural gas, and transportation fuels for the California Energy Policy Report. The plan calls for the State to assist in the transformation of the transportation system to improve air quality, reduce congestion, and increase the efficient use of fuel supplies with the least environmental and energy costs. To further this policy, the plan identifies a number of strategies, including assistance to public agencies and fleet operators in implementing incentive programs for zero emission vehicles and their infrastructure needs, and encouragement of urban designs that reduce VMT and accommodate pedestrian and bicycle access.

The CEC approved the *2020 Integrated Energy Policy Report* in March 2021.[22] The *2020 Integrated Energy Policy Report* provides the results of the CEC's assessments of a variety of energy issues facing California. The City of Cypress relies on the State integrated energy plan and does not have its own local plan to address renewable energy or energy efficiency.

As indicated above, energy usage on the project site during construction would be temporary in nature and would be relatively small in comparison to the overall use in the County. In addition, energy usage associated with operation of the proposed project would be relatively small in comparison to the overall use in Orange County, and the State's available energy sources. Therefore, energy impacts at the regional level would be negligible. Because California's energy conservation planning actions are conducted at a regional level, and because the proposed project's total impact on regional energy supplies would be minor, the proposed project would not conflict with or obstruct California's energy conservation plans as described in the CEC's Integrated Energy Policy Report. Additionally, as demonstrated above, the proposed project would not result in the inefficient, wasteful, and unnecessary consumption of energy. Potential impacts related to conflict with or obstruction of a State or local plan for renewable energy or energy efficiency would be less than significant, and no mitigation is required.

[22] CEC. 2019c. Notice of Request for Public Comments on the Draft Scoping Order for the *2019 Integrated Energy Policy Report*. Docket No. 19-IEPR-01.

4.7 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.	☐	☐	☐	☒
ii. Strong seismic ground shaking?	☐	☐	☒	☐
iii. Seismic-related ground failure, including liquefaction?	☐	☒	☐	☐
iv. Landslides?	☐	☐	☐	☒
b) Result in substantial soil erosion or the loss of topsoil?	☐	☐	☒	☐
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?	☐	☒	☐	☐
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?	☐	☐	☒	☐
e) Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater?	☐	☐	☐	☒
f) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?	☐	☒	☐	☐

Discussion

The following section is based on the *Updated Geotechnical Evaluation for Proposed Residential Development Orange Avenue Seniors 9470 Moody Street and 5081 Orange Avenue City of Cypress, Orange County, California* (Geotechnical Evaluation) conducted by GeoTek, Inc. (January 4, 2021) and provided in Appendix D of this IS/MND.

Impact Analysis

a) Would the project 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 evidences of known fault? (Refer to Division of Mines and Geology Special Publication 42.)

No Impact. According to the California Geological Survey (CGS 2002), there are no active faults or Alquist-Priolo Fault Zones within the City of Cypress (City). The closest fault to the project site is the Newport-Inglewood Fault, located approximately 5.5 miles southwest of the site. Therefore, surface rupture is not anticipated to occur within the project site or surrounding vicinity. No impact would occur, and no mitigation is required.

ii. Strong seismic ground shaking?

Less Than Significant Impact. According to the California Geological Survey (CGS 2002), there are no active faults or Alquist-Priolo Fault Zones within the City of Cypress. However, the project site is located in the highly seismic Southern California region within the influence of several fault systems. The degree of seismic ground shaking will depend on several factors including the fault location, distance from the City, and the earthquake magnitude. As specified in Regulatory Compliance Measure GEO-1, the proposed project's buildings will be subject to the seismic design criteria of the most current California Building Code requirements that aim to prevent building collapse and reduce the impacts of seismic ground shaking. Adherence to these requirements will address injury and loss of life and building damage after an earthquake. Therefore, with the implementation of Regulatory Compliance Measure GEO-1, impacts related to seismic ground shaking would be less than significant, and no mitigation is required.

Regulatory Compliance Measures and Mitigation Measures:

No mitigation is required. However, the following regulatory compliance measure is an existing regulation that is applicable to the proposed project and is considered in the analysis of potential impacts related to geology and soils. The City of Cypress considers this requirement to be mandatory; therefore, it is not a mitigation measure.

Regulatory Compliance Measure GEO-1 **Compliance with Seismic and Building Standards in the Building Code.** Prior to issuance of the first building permit for the proposed buildings, the City of Cypress (City) Engineer, Building Official, or their designee, and the project soils engineer shall review the building plans to verify that the structural design conforms to the requirements of the Geotechnical Evaluation and the City's latest adopted edition of the California Building Standards Code. Structures and walls shall be designed in accordance with applicable sections of the City's Building Code. In addition, all soil stability recommendations in the geotechnical reports shall be incorporated into the final grading plans.

iii. Seismic-related ground failure, including liquefaction?

Less Than Significant with Mitigation Incorporated. Soil liquefaction is a phenomenon in which cyclic stresses, produced by earthquake-induced ground motion, create excess pore pressures in relatively cohesionless and low plastic soils. These soils may thereby acquire a high degree of

mobility, which can lead to lateral movement, sliding, consolidation and settlement of loose sediments, sand boils, and other damaging deformations. This phenomenon occurs only below the water table, but after liquefaction has developed, the effects can propagate upward into overlying non-saturated soil as excess pore water dissipates.

The factors known to influence liquefaction potential include soil type and grain size, relative density, groundwater level, confining pressures, and both intensity and duration of ground shaking. In general, materials that are susceptible to liquefaction are loose, saturated granular soils having low fine content under low confining pressures and some low plastic silts and clays.

According to the National Resource Conservation Service Web Soil Survey (NRCS 2021), the soil and the underlying geologic structure under the City of Cypress include discontinuous human-transported material over mixed alluvium deposits that may become unstable during intense ground shaking. In addition, according to the Geotechnical Evaluation prepared for the proposed project, the site contains undocumented fill and some layers of loose sands and silty sands that would be prone to liquefaction. Mitigation Measure GEO-1 requires the construction contractor to comply with the recommendations in the Geotechnical Evaluation to reduce the proposed project's impact related to liquefaction. Therefore, with implementation of Mitigation Measure GEO-1, the proposed project's impacts related to liquefaction would be reduced to less than significant.

Mitigation Measure:

Mitigation Measure GEO-1 **Implementation of Geotechnical Evaluation Recommendations.** The Applicant's construction contractor shall implement the recommendations of the Geotechnical Evaluation prepared for the proposed project, as applicable, to the satisfaction of the City of Cypress' (City) Building Official, or designee, including, but not limited to:

- Earthwork and grading should be performed in accordance with the applicable grading ordinances of the City of Cypress and/or the County of Orange, the 2019 California Building Code, and recommendations contained in the Geotechnical Evaluation.
- Site buildings shall be supported by either shallow footings with foundation ties, post-tensioned slabs, or mat foundations.
- Additional testing of the soils shall be performed during construction to evaluate the as-graded conditions.
- Excavation and/or overexcavation to grade and the removal or recompaction of unstable soils shall be included in the grading plans as specified in the Geotechnical Evaluation.

- All other liquefaction recommendations listed in the Geotechnical Evaluation shall be incorporated into the design and construction of the proposed project.

iv. Landslides?

No Impact. According to the City's General Plan Safety Element, landslides have not been recorded within the City boundaries and are not anticipated based on the lack of any significant topographic features. Further, according to the Geotechnical Evaluation, evidence of ancient landslides or slope instabilities at this site was not observed. Both the project site and surrounding properties are flat with no unusual geographic features, and therefore, neither the site nor the surrounding area has the potential for impacts related to landslides. No mitigation is required.

b) Would the project result in substantial soil erosion or the loss of topsoil?

Less Than Significant Impact. During project construction activities, soil would be exposed and disturbed, drainage patterns would be temporarily altered during grading and other construction activities, and there would be an increased potential for soil erosion and siltation compared to existing conditions. However, as described in Section 4.10, Hydrology and Water Quality, the Construction General Permit requires preparation of a Storm Water Pollution Prevention Plan (SWPPP) (see Regulatory Compliance Measure HYD-1 in that section). The SWPPP would detail Erosion Control and Sediment Control Best Management Practices (BMPs) to be implemented during project construction to minimize erosion and retain sediment on site. With compliance with the requirements of the Construction General Permit and with implementation of the construction BMPs, construction impacts related to substantial soil erosion and loss of topsoil would be less than significant. Following construction, the site will be covered with the proposed building, paving, and landscaping. Therefore, operation of the proposed project would not result in substantial soil erosion or loss of topsoil. Potential soil erosion impacts related to construction activities would be less than significant with adherence to the required regulations discussed above. Operation of the proposed project would result in no impacts related to soil erosion or loss of topsoil. No mitigation is required.

c) Would the project 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-site or off-site landslides, lateral spreading, subsidence, liquefaction, or collapse?

Less Than Significant with Mitigation Incorporated. 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. Because the project site is in a flat area, landslides or other forms of natural slope instability do not represent a significant hazard to the project site or the surrounding area. In addition, as discussed in Response 4.6(a)(4), the site is not within an area susceptible to landslides. All excavations required for construction must be performed in accordance with City and State Building Codes, and the State Division of Occupational Safety and Health requirements.

Lateral spreading often occurs on very gentle slopes or flat terrain. The dominant mode of movement is lateral extension accompanied by shear or tensile fracture. This failure is caused by liquefaction and is usually triggered by rapid ground motion, such as that experienced during an earthquake, but can also be artificially induced. When coherent material, either bedrock or soil, rests on materials that liquefy, the upper units may undergo fracturing and extension and may then subside, translate, rotate, disintegrate, or liquefy and flow. The Geotechnical Evaluation indicates that lateral spreading is not a potential concern with respect to the proposed project. Therefore, potential impacts related to lateral spreading would be less than significant, and no mitigation is required.

Subsidence refers to broad-scale changes in the elevation of land. Common causes of land subsidence are pumping water, oil, and gas from underground reservoirs; dissolution of limestone aquifers (sinkholes); collapse of underground mines; drainage of organic soils; and initial wetting of dry soils (hydrocompaction). Subsidence is also caused by heavy loads generated by large earthmoving equipment. As stated in the Geotechnical Evaluation, minor ground subsidence (estimated to be approximately 0.2 ft) is expected to occur. However, this amount of settlement is considered negligible and the project site is not located within an area of known subsidence that may be associated with fluid withdrawal. Therefore, the proposed project would not be subject to potential geotechnical hazards related to subsidence, and no mitigation is required.

As discussed in detail in Response 4.7(a)(iii) above, implementation of Mitigation Measure GEO-1 and adherence to the regulatory standards described in RCM GEO-1 would be required to address the proposed project's impacts with respect to liquefaction. Provided that design and remedial grading and ground improvement (as necessary) are performed in accordance with the applicable requirements in the California Building Code (adopted by the City as its Building Code with certain amendments), and current standards of practice in the area, excessive settlement resulting from liquefaction and compression of existing undocumented fill and some layers of loose sands and silty sands on the project site would be reduced to a less than significant level.

Mitigation Measures: See Mitigation Measure GEO-1 in the response under Threshold 4.7(a)(iii) above.

d) Would the project be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating direct or indirect substantial risks to life or property?

Less Than Significant Impact. According to the Geotechnical Evaluation prepared for the proposed project, surface site soils had a "very low"[23] potential for expansion. No recommendations are provided in the Geotechnical Evaluations related to expansive soils due to this very low potential. Therefore, impacts related to expansive soils for the proposed project would be less than significant. No mitigation is required.

e) Would the project have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater?

[23] The expansion coefficient for the project site soil is 0 < EI < 20, i.e., very low.

No Impact. The proposed project would not include the use of septic tanks or alternative wastewater disposal systems because sanitary sewer and wastewater facilities are available in the vicinity of the project site. Therefore, the project would have no impact with respect to septic tanks or alternative wastewater disposal systems. No mitigation is required.

f) Would the project directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?

Less Than Significant with Mitigation Incorporated. The project site contains Artificial Fill, which has no paleontological sensitivity, and Young Alluvium, Unit 2, which has low paleontological sensitivity from the surface to a depth of 10 ft and high paleontological sensitivity below 10 ft. With a maximum depth of 8 ft during excavation, the proposed project is expected to remain in deposits with no or low paleontological sensitivity. However, in the event that paleontological resources are encountered during construction, Mitigation Measure GEO-2 would require work in the immediate area of the discovery to be halted and a qualified paleontologist to assess the discovery. These procedures would reduce potential impacts to scientifically significant nonrenewable paleontological resources encountered during construction.

Mitigation Measure:

Mitigation Measure GEO-2 **Procedures for Unexpected Paleontological Resources Discoveries.** In the event that paleontological resources are encountered, work in the immediate area of the discovery shall be halted and the Applicant shall retain a professional Paleontologist who meets the qualifications established by the Society of Vertebrate Paleontology to assess the discovery. The qualified, professional Paleontologist shall make recommendations regarding the treatment and disposition of the discovered resources, as well as the need for subsequent paleontological mitigation, which may include, but not be limited to, 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. The City of Cypress shall ensure that the recommendations from the qualified, professional Paleontologist shall be followed by the Applicant.

4.8 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?	☐	☐	☒	☐
b) Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?	☐	☐	☒	☐

Discussion

Greenhouse gases (GHGs) are present in the atmosphere naturally, are released by natural sources, or are formed from secondary reactions taking place in the atmosphere. The gases that are widely seen as the principal contributors to human-induced global climate change are:

- Carbon dioxide (CO_2);
- Methane (CH_4);
- Nitrous oxide (N_2O);
- Hydrofluorocarbons (HFCs);
- Perfluorocarbons (PFCs); and
- Sulfur Hexafluoride (SF_6).

Over the last 200 years, humans have caused substantial quantities of GHGs to be released into the atmosphere. These extra emissions are increasing GHG concentrations in the atmosphere and enhancing the natural greenhouse effect, believed to be causing global warming. While manmade GHGs include naturally occurring GHGs such as CO_2, methane, and N_2O, some gases, like HFCs, PFCs, and SF_6 are completely new to the atmosphere.

In October 2008, the South Coast Air Quality Management District (SCAQMD) released a *Draft Guidance Document – Interim CEQA Greenhouse Gas (GHG) Significance Threshold*[24] that suggested a tiered approach to analyzing GHG emissions in a project level analysis. In the Draft Guidance Document, the SCAQMD provided numerical thresholds that can be applied to smaller projects (like the proposed project). Although the interim GHG significance thresholds are 3,000 metric tons (MT) per year of carbon dioxide equivalents (CO_2e) for residential and commercial land uses where the SCAQMD is the Lead Agency. If emissions exceed the numerical screening threshold, a more detailed review of the project's GHG emissions is warranted. The SCAQMD has proposed an efficiency target for projects that exceed the bright-line threshold. The current recommended approach is per-capita

[24] South Coast Air Quality Management District (SCAQMD). 2008. *Draft Guidance Document – Interim CEQA Greenhouse Gas (GHG) Significance Threshold*. October. Website: http://www.aqmd.gov/docs/default-source/ceqa/handbook/greenhouse-gases-(ghg)-ceqa-significance-thresholds/ghgattachmente.pdf (accessed May 2021).

efficiency targets. The SCAQMD is not recommending use of a percent emissions reduction target. Instead, the SCAQMD proposes a 2020 efficiency target of 4.8 MT CO_2e per year per service population (residents plus employees) for project-level analyses.

Because the proposed project would begin operations in the post-2020 timeframe, the 2020 numerical screening threshold of 3,000 MT CO_2e and the efficiency target of 4.8 MT CO_2e per year per service population would need to be adjusted to reflect the State's post-2020 GHG reduction goals.

The California Air Resources Board (CARB) has completed a Scoping Plan, which will be utilized by the SCAQMD to establish the 2030 GHG efficiency threshold. The SCAQMD has yet to publish a quantified GHG efficiency threshold for the 2030 target. A scaled threshold consistent with State goals detailed in Senate Bill (SB) 32, Executive Order (EO) B-30-15, and EO S-3-05 to reduce GHG emissions by 40 percent below 1990 levels by 2030 and 80 percent below 1990 levels by 2050, respectively, was developed for 2024, when the proposed project is anticipated to be operational. Though the SCAQMD has not published a quantified threshold beyond 2020, this assessment uses a threshold of 2,520 MT CO_2e and an efficiency target of 4.0 MT CO_2e per year per service population, which was calculated for the buildout year of 2024 based on the GHG reduction goals of SB 32 and EO B-30-15.

For the purpose of this analysis, the proposed project will be compared to the adjusted screening-level Tier 3 Numerical Screening Threshold of 2,520 MT CO_2e per year.

Impact Analysis

a) Would the project generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?

Less Than Significant Impact. This following analysis describes the proposed project's construction- and operation-related GHG emissions and contribution to global climate change. The SCAQMD has not addressed emission thresholds for construction in its *CEQA Air Quality Handbook* (April 1993, currently being revised); however, the SCAQMD requires quantification and disclosure. Thus, this section discusses construction emissions.

Construction Greenhouse Gas Emissions. Demolition and construction activities associated with the proposed project would produce combustion emissions from various sources. During construction, GHGs would be emitted through the operation of construction equipment and from worker and builder supply vendor vehicles, each of which typically use fossil-based fuels to operate. The combustion of fossil-based fuels creates GHGs such as CO_2, CH_4, and N_2O. Furthermore, CH_4 is emitted during the fueling of heavy equipment. Exhaust emissions from on-site construction activities would vary daily as construction activity levels change.

The SCAQMD does not have an adopted threshold of significance for construction-related GHG emissions. However, lead agencies are required to quantify and disclose GHG emissions that would occur during construction. The SCAQMD suggests that construction GHG emissions be amortized over the life of the project (defined as 30 years), added to the operational emissions, and compared to the applicable interim GHG significance threshold tier.

Using CalEEMod, it is estimated that the proposed project would generate a total of approximately 1,113.0 MT CO_2e during construction of the project. When annualized over the 30-year life of the project, annual emissions would be 37.1 MT CO_2e.

Operational Emissions. Long-term operation of the proposed project would generate GHG emissions from area, mobile, stationary, waste, and water sources as well as indirect emissions from sources associated with energy consumption. Mobile-source GHG emissions would include project-generated vehicle trips associated with trips to the proposed project. Area-source emissions would be associated with activities such as landscaping and maintenance on the project site, and other sources. Waste source emissions generated by the proposed project include energy generated by landfilling and other methods of disposal related to transporting and managing project-generated waste. In addition, water source emissions associated with the proposed project are generated by water supply and conveyance, water treatment, water distribution, and wastewater treatment.

Following guidance from the SCAQMD, GHG emissions were estimated using CalEEMod. Trip generation rates used in CalEEMod for the proposed project were based on the project's trip generation estimates compiled by LSA. The project would generate 363 ADT. In addition, the CalEEMod analysis assumes the proposed project would be consistent with 2019 Title 24 standards, install high-efficiency lighting, install low-flow water fixtures and irrigation systems, and comply with California Department of Resources Recycling and Recovery (CalRecycle) requirements for waste reduction diverted from landfills.

Table 4.8.A shows the calculated GHG emissions for the proposed project. Appendix A provides additional calculation details. As shown in Table 4.8.A, mobile sources are the largest source of GHG emissions for the proposed project at approximately 67 percent of the total project emissions. Energy sources are the next largest category at approximately 24 percent. Water sources are approximately 5 percent of the total emissions and area sources are approximately 3 percent of the total emissions. Waste sources are approximately 1 percent of the total emissions.

As discussed above, according to SCAQMD, a project would have less than significant GHG emissions if it would result in operational-related GHG emissions of less than 2,520 MT CO_2e per year. Based on the analysis results, the proposed project would result in 667.8 MT CO_2e per year, which would be well below the scaled numeric threshold of 2,520 MT CO_2e for operational year 2024. Therefore, operation of the proposed project would not generate substantial GHG emissions, and impacts related to operational GHG emissions would be less than significant. No mitigation is required.

Table 4.8.A: GHG Emissions (metric tons per year)

Emission Type	Operational Emissions				
	CO_2	CH_4	N_2O	CO_2e	Percentage of Total
Area Source	21.7	<0.1	<0.1	21.8	3
Energy Source	147.2	<0.1	<0.1	148.0	24
Mobile Source	424.5	<0.1	0.0	425.0	67
Waste Source	2.3	0.1	0.0	5.7	1
Water Source	24.8	0.2	<0.1	30.2	5
Total Operational Emissions				**630.7**	**100**
Amortized Construction Emissions				37.1	-
Total Annual Emissions				**667.8**	**-**
SCAQMD Threshold				**2,520**	-
Exceeds Threshold?				**No**	**-**

Source: LSA (June 2021).
GHG = greenhouse gas
SCAQMD = South Coast Air Quality Management District

b) Would the project conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?

Less Than Significant Impact. The City, as a lead agency, may assess the significance of GHG emissions by determining a project's consistency with a local GHG reduction plan that qualifies under Section 15183.5 of the *State CEQA Guidelines*. The City of Cypress has not adopted a GHG reduction plan. In addition, the City has not completed the GHG inventory, benchmarking, and goal-setting process required to identify a reduction target and to take advantage of the streamlining provisions contained in the *State CEQA Guidelines* amendments adopted SB 97.

Since no other local or regional climate action plan is in place, the proposed project was analyzed for consistency with the goals of Assembly Bill (AB) 32, the AB 32 Scoping Plan, EO B-30-15, SB 32, and AB 197.

California's major initiative for reducing GHG emissions is AB 32, passed by the State Legislature on August 31, 2006. AB 32 is aimed at reducing GHG emissions to 1990 levels by 2020. AB 32 requires the CARB to prepare a Scoping Plan that outlines the main State strategies for meeting the 2020 deadline and to reduce GHGs that contribute to global climate change. The AB 32 Scoping Plan has a range of GHG reduction actions, which include direct regulations, alternative compliance mechanisms, monetary and nonmonetary incentives, voluntary actions, market-based mechanisms (e.g., cap-and-trade system), and an AB 32 implementation fee to fund the program.

EO B-30-15 added the immediate target of reducing GHG emissions to 40 percent below 1990 levels by 2030. The CARB released a second update to the Scoping Plan, the 2017 Scoping Plan,[25] to reflect the 2030 target set by EO B-30-15 and codified by SB 32. SB 32 affirms the importance of addressing climate change by codifying into statute the GHG emissions reduction target of at least 40 percent below 1990 levels by 2030 contained in EO B-30-15. SB 32 builds on AB 32 and keeps us on the path toward achieving the State's 2050 objective of reducing emissions to 80 percent below 1990 levels.

[25] California Air Resources Board (CARB). 2017. *California's 2017 Climate Change Scoping Plan*. November.

The companion bill to SB 32, AB 197, provides additional direction to the CARB related to the adoption of strategies to reduce GHG emissions. Additional direction in AB 197 that is intended to provide easier public access to air emission data collected by the CARB was posted in December 2016.

As identified above, the AB 32 Scoping Plan contains GHG reduction measures that work toward reducing GHG emissions, consistent with the targets set by AB 32 and EO B-30-15, and codified by SB 32 and AB 197. The measures applicable to the proposed project include energy efficiency measures, water conservation and efficiency measures, and transportation and motor vehicle measures, as discussed below.

Energy-efficient measures are intended to maximize energy-efficiency building and appliance standards, pursue additional efficiency efforts including new technologies and new policy and implementation mechanisms, and pursue comparable investment in energy efficiency from all retail providers of electricity in California. In addition, these measures are designed to expand the use of green building practices to reduce the carbon footprint of California's new and existing inventory of buildings. As identified above, the proposed project would comply with the latest Title 24 standards of the California Code of Regulations (CCR), regarding energy conservation and green building standards. Therefore, the proposed project would comply with applicable energy measures.

Water conservation and efficiency measures are intended to continue efficiency programs and use cleaner energy sources to move and treat water. Increasing the efficiency of water transport and reducing water use would reduce GHG emissions. As noted above, the project would be required to comply with the latest Title 24 standards of the CCR, which includes a variety of different measures, including reduction of wastewater and water use. Therefore, the proposed project would not conflict with any of the water conservation and efficiency measures.

The goal of transportation and motor vehicle measures is to develop regional GHG emission reduction targets for passenger vehicles. Specific regional emission targets for transportation emissions would not directly apply to the proposed project. However, vehicles traveling to the project site would comply with the Pavley II (Low-Emission Vehicle [LEV] III) Advanced Clean Cars Program. The second phase of Pavley standards will reduce GHG emissions from new cars by 34 percent from 2016 levels by 2025, resulting in a 3 percent decrease in average vehicle emissions for all vehicles by 2020. As vehicles traveling to the project site would comply with the Pavley II (LEV III) Advanced Clean Cars Program, the proposed project would not conflict with the identified transportation and motor vehicle measures.

Therefore, as demonstrated above, the proposed project would comply with existing State regulations adopted to achieve the overall GHG emission reduction goals identified in the AB 32 Scoping Plan, EO B-30-15, SB 32, and AB 197. Therefore, the proposed project would be consistent with applicable plans and programs designed to reduce GHG emissions and would not conflict with plans, policies, or regulations adopted for the purpose of reducing GHG emissions. Therefore, impacts would be less than significant, and no mitigation is required.

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4.9 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?	☐	☐	☒	☐
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?	☐	☐	☒	☐
c) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?	☐	☐	☒	☐
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?	☐	☐	☒	☐
e) For a project located within an airport land use plan or, where such a plan has not been adopted, within 2 miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?	☐	☐	☒	☐
f) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?	☐	☐	☐	☒
g) Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?	☐	☐	☐	☒

Discussion

The following section is based on the *Phase I Environmental Site Assessment Report* (2020), prepared by Black Rock Geosciences (November 2020) and provided in Appendix E of this IS/MND.

Impact Analysis

a) Would the project create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?

Less Than Significant Impact. Hazardous materials are chemicals that could potentially cause harm during an accidental release or mishap, and are defined as being toxic, corrosive, flammable, reactive, and an irritant, or strong sensitizer.[26] Hazardous substances include all chemicals regulated under the United States Department of Transportation's "hazardous materials" regulations and the United States Environmental Protection Agency (EPA) "hazardous waste" regulations. Hazardous

[26] A "sensitizer" is a chemical that can cause a substantial proportion of people or animals to develop an allergic reaction in normal tissue after repeated exposure to a chemical.

wastes require special handling and disposal because of their potential to damage public health and the environment. The probable frequency and severity of consequences from the routine transport, use, or disposal of hazardous materials is affected by the type of substance, the quantity used or managed, and the nature of the activities and operations.

Construction of the proposed project would temporarily increase the regional transport, use, and disposal of construction-related hazardous materials and petroleum products (e.g., diesel fuel, lubricants, paints and solvents, and cement products containing strong basic or acidic chemicals). These materials are commonly used at construction sites, and the construction activities would be required to comply with applicable State and federal regulations for proper transport, use, storage, and disposal of excess hazardous materials and hazardous construction waste. In addition, Regulatory Compliance Measures HYD-1 and HYD--2 (refer to Section 4.10, Hydrology and Water Quality, of this IS/MND) require compliance with the waste discharge permit requirements to avoid potential impacts to water quality due to spills or runoff from hazardous materials used during construction. Therefore, with adherence to the regulatory standards included in Regulatory Compliance Measures HYD-1 and HYD-2, impacts related to the routine transport, use, or disposal of hazardous materials during construction would be less than significant.

The proposed project includes the development of a residential community. Residential uses typically do not present a hazard associated with the accidental release of hazardous substances into the environment because residents are not anticipated to use, store, dispose or transport large volumes of hazardous materials. Hazardous substances associated with residential uses are typically limited in both amount and use such that they can be contained without impacting the environment.

As a residential development, long-term operations activities typical of the proposed residential uses involve the use and storage of small quantities of potentially hazardous materials in the form of cleaning solvents, fertilizers, and pesticides. For example, maintenance activities related to landscaping include the use of fertilizers and light equipment (e.g., lawn mowers and edgers) that may require fuel. As stated previously, these types of activities do not involve the use of a large or substantial amount of hazardous materials. Further, such materials would be contained, stored, and used in accordance with manufacturers' instructions and handled in compliance with applicable federal, State, and local regulations. In addition, operation of the proposed project would not store, transport, generate, or dispose of large quantities of hazardous substances. Therefore, potential impacts from the routine transport, use of disposal of hazardous materials resulting from operation of the proposed project would be less than significant, and no mitigation would be required.

The Orange County Fire Authority (OCFA) Hazardous Material Division and the Orange County Environmental Health Department both identify types and amounts of waste generated in Orange County and establish programs for managing waste. The OCFA maintains a Hazardous Material Management Plan, which assures that adequate treatment and disposal capacity is available to manage the hazardous waste generated within the County and address issues related to the disposal, handling, processing, storage, and treatment of local hazardous materials and waste products.

The proposed project would be reviewed by the OCFA for hazardous material use, safe handling, and storage of materials. Prior to the issuance of grading permits, conditions of approval would be applied to the proposed project by the OCFA to reduce hazardous material impacts and insure that any hazardous waste that is generated on site would be transported to an appropriate disposal facility by a licensed hauler in accordance with State and federal law. Therefore, due to the type and nature of the proposed project, its implementation would result in less than significant impacts related to the routine transport, use, or disposal of hazardous materials; no mitigation is required.

b) Would the project 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?

Less Than Significant Impact. The Phase I Environmental Site Assessment (ESA) prepared for the proposed project included site reconnaissance to visually assess the project site and surrounding area's current utilization; and a review of regulatory agency reports, aerial photographs, and other historic record sources. The purpose of the Phase I ESA was to identify and assess environmental characteristics of the project site that could impact the present or future uses of the project site.

According to the Phase I ESA, one underground 5,000-gallon gasoline storage tank and an adjoining underground 550-gallon waste oil storage tank were installed north of the maintenance building in approximately 1982. Both tanks were removed from the site in January 1994 and approximately 348 tons of gasoline-impacted soil caused by a previously reported leak was removed in October 1994. Following removal of the oil, two groundwater wells were installed on site and groundwater was tested for gasoline-related contaminants, which were not detected in the samples. In December 2002, soil and groundwater samples were collected from the immediate vicinity of the former gasoline tank in order to assess the residual contaminant concentrations in this area. No detectable gasoline-related contaminants were detected from these samples, and it was concluded that the Orange County Health Care Agency (OCHCA) had closed the related Leaking Underground Storage Tank (LUST) case. The Phase I ESA further concluded that no additional soil or groundwater investigations in the vicinity of the former underground gasoline and waste oil storage tanks were required.

The Phase I ESA also indicated that a second underground waste oil storage tank was formerly located immediately north of the vehicle maintenance building. This tank and its contents were removed.

A wastewater clarifier is immediately adjacent to the former location of the second underground waste oil storage tank and a second wastewater clarifier associated with a vehicle washing area is located immediately east of the vehicle maintenance building.

Two hydraulic lift systems are located within the western portion of the vehicle maintenance building.

The Phase I ESA noted that the soil and/or groundwater beneath the former tanks, clarifiers, and two lifts within the western portion of the vehicle maintenance building were tested in 2017. All of

the collected soil and groundwater samples were reported with either no detectable contaminant concentrations or trace concentrations (well below agency screening levels).

Lead is a toxic metal that was used for many years in household products. Lead may cause a range of health defects, from behavioral problems and learning disabilities to seizures and death. Lead-based paint (LBP) was used extensively in buildings constructed before 1950. In 1978, LBP was banned by the federal government and was phased out of use in the mid- to late 1970s. It is considered likely that asbestos-containing materials were used within the buildings constructed before 1980. However, asbestos-containing building materials and lead-based paint were phased out in the mid- to late 1970s.

Similarly, the use of asbestos in many building products was banned by the EPA by the late 1970s and asbestos-containing materials (ACMs) were phased out of use in the mid- to late 1970s. Common ACMs found in buildings include floor tiles and roofing materials. ACMs represent a concern when they are subject to damage that results in the release of fibers. Friable ACMs, which can be crumbled by hand pressure and are, therefore, susceptible to damage, are of particular concern. Non-friable ACMs are a potential concern if they are damaged by maintenance work, demolition, or other activities. Based on the age of the building on the project site, the Phase I ESA noted there is a potential for ACMs to be present in buildings constructed prior to 1980.

Therefore, an LBP and an ACM survey would be required prior to demolition activities, as described in Regulatory Compliance Measure HAZ-1. Should LBP and ACMs be discovered prior to demolition of the existing structures on the project site, precautions would be necessary to ensure the materials are properly removed and disposed of in accordance with State and federal law. With implementation of Regulatory Compliance Measure HAZ-1, possible impacts related to LBP and ACMs would be less than significant, and no mitigation is required.

For the reasons described above, the proposed project would not 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. Therefore, impacts would be less than significant, and no mitigation is required.

Regulatory Compliance Measures and Mitigation Measures:

The following regulatory compliance measure includes existing regulations that are applicable to the proposed project and are considered in the analysis of potential impacts related to hazards and hazardous materials. The City of Cypress considers these requirements to be mandatory; therefore, they are not considered mitigation measures.

Regulatory Compliance Measure HAZ-1 **Predemolition Surveys and Abatement of Asbestos-Containing Materials.** Prior to commencement of demolition activities, the City of Cypress Director of Community Development, or designee, shall verify that predemolition surveys for asbestos-containing materials (ACMs) (including sampling and analysis of all suspected building materials) are performed on buildings constructed prior to 1980. All inspections, surveys, and

analyses shall be performed by appropriately licensed and qualified individuals in accordance with applicable regulations (i.e., ASTM International E 1527-05, and Code of Federal Regulations (CFR) Title 40, Subchapter R, Toxic Substances Control Act [TSCA], Part 716).

Wherever evidence of ACMs is present in areas proposed for demolition, all such materials shall be removed, handled, and properly disposed of by appropriately licensed contractors according to all applicable regulations during demolition of structures (40 CFR, Subchapter R, TSCA, Parts 745, 761, and 763). During demolition, air monitoring shall be completed by appropriately licensed and qualified individuals in accordance with applicable regulations both to ensure adherence to applicable regulations (e.g., South Coast Air Quality Management District [SCAQMD]) and to provide safety to workers and the adjacent community. The Applicant shall provide documentation (e.g., all required waste manifests, sampling, and air monitoring analytical results) to the Orange County Fire Authority showing that abatement of any ACMs identified in these structures has been completed in full compliance with all applicable regulations and approved by the appropriate regulatory agencies (40 CFR, Subchapter R, TSCA, Parts 716, 745, 761, 763, and 795 and California Code of Regulations [CCR] Title 8, Article 2.6).

c) Would the project emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?

Less Than Significant Impact. The project site is currently located on the same site as Cypress School District (District) facilities; however, existing District facilities would be demolished and relocated as part of the construction and implementation of the proposed project. Oxford Academy is located across the project site along Orange Avenue. As noted in Response 4.9(a), the proposed project is not anticipated to release hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste in significant quantities. Construction activities associated with the proposed project would use a limited amount of hazardous and flammable substances/oils during heavy equipment operation for site excavation, grading, and construction. The amount of hazardous chemicals present during construction is limited and would be in compliance with existing government regulations. Future residential land uses would not require the use, storage, disposal, or transport of large volumes of hazardous materials that could cause serious environmental damage in the event of an accident. Although hazardous substances would be present and utilized at these residences, such substances are generally present now in the existing development, typically found in small quantities, and can be cleaned up without affecting the environment. Therefore, impacts

related to hazardous emissions or handling of hazardous or acutely hazardous materials, substances, or waste within 0.25 mile of an existing or proposed school would be less than significant, and no mitigation is required.

d) Would the project 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?

Less Than Significant Impact. On November 17, 2020, as part of the Phase I ESA, Environmental Data Resources, Inc. (EDR) conducted a search of available environmental records for the project site and properties up to 1.0 mile away from the project site. Nine properties within 1.0 mile of the project site were reported to have released, or have the potential to release, hazardous materials into the subsurface soil or groundwater. However, the Phase I ESA concluded that these sites do not pose a potential hazard to the project site.

According to the EDR report, the project site was also listed in several environmental databases. The project site was listed in the HAZNET database due to the off-site transportation and off-site disposal of various hazardous materials. The project site was listed in the LUST and Historical "Cortese" Hazardous Waste & Substances Sites List (HIST CORTESE) databases as a result of the release of gasoline from the 5,000-gallon underground storage tank. As discussed in Response 4.8(b), the underground storage tank and contaminated soil were removed in 1994. The removal of the tank was listed in the Underground Storage Tank (UST) database, the California Facility Inventory Database of USTs (CA FID UST), the Historical UST Registered Database (HIST UST), and the Statewide Environmental Evaluation and Planning System UST (SWEEPS UST) database. The LUST case was reported as having been closed by the OCHCA in 2003. Additionally, as discussed in further detail in Response 4.8(b), no soil or groundwater contamination was detected on the project site. Therefore, because the project site was remediated and the case was closed and follow-up investigation was conducted to confirm that no further soil or groundwater contamination has been documented, impacts related to the project site's status on the list of hazardous materials sites would be less than significant, and no mitigation is required.

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 for people residing or working in the project area?

Less Than Significant Impact. The project site is located approximately 1.75 miles north of the Joint Forces Training Base (JFTB) Los Alamitos. However, according to the Airport Land Use Commission's 2016 Airport Environs Land Use Plan for JFTB Los Alamitos (AELUP), the project site is not located within an impact zone.[27] However, the project site is located in an AELUP height restriction zone for JFTB Los Alamitos. Height limitations are imposed on projects within a height restriction zone so that structures or trees (1) do not obstruct the airspace required for take off, flight, or landing of aircraft at an airport, or (2) are not otherwise hazardous to the landing or taking off of aircrafts. Structures

[27] Orange County Airport Land Use Commission. 2017. Airport Environs Land Use Plan for Joint Forces Training Base Los Alamitos. Website: https://files.ocair.com/media/2021-02/JFTB%2CLosAlamitos-AELUP2017.pdf?VersionId=jhDzARCp3ECzHQ6jiMzrb06mM5H0Nv89 (accessed June 25, 2021).

on the project site are restricted to 350 ft in height. The tallest proposed structures would have a maximum height of approximately 29 ft. Therefore, the proposed project would not exceed the AELUP height limitations, and the proposed project would not result in a safety hazard for people residing or working in the vicinity of the project site. Additionally, the proposed project would not impact flight patterns or pose a hazard to air traffic. Impacts would be less than significant, and no mitigation is required.

f) Would the project impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?

No Impact. Although the proposed project would result in additional residents within the City, the project site is not located along an emergency evacuation route according to emergency evacuation route maps associated with the City's General Plan Safety Element.[28] Therefore, the proposed project would not interfere with emergency operations and evacuations, and there would be no impact on emergency response. No mitigation is required.

g) Would the project expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?

No Impact. The project site is located within a fully urbanized area. There are no wildlands adjacent or in the vicinity of the project site, and the project site is not designated as a Fire Hazard Severity Zone on the statewide California Department of Forestry and Fire Protection (CAL FIRE) Map.[29] Therefore, there would be no risk of loss, injury, or death involving wildland fires. No impact would occur, and no mitigation is required.

[28] City of Cypress General Plan, Safety Element, Emergency Evacuation Routes map (Exhibit SAF-5), October 2, 2001.

[29] California Department of Forestry and Fire Protection (CAL FIRE). 2007. Draft Fire Hazard Severity Zones in LRA. Website: https://osfm.fire.ca.gov/media/6737/fhszs_map30.pdf (accessed June 25, 2021).

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4.10 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?	☐	☐	☒	☐
b) Substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level (e.g., the production rate of pre-existing nearby wells would drop to a level which would not support existing land uses or planned uses for which permits have been granted)?	☐	☐	☒	☐
c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of stream or river, in a manner which would result in substantial erosion or siltation on- or off-site?	☐	☐	☒	☐
d) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site?	☐	☐	☒	☐
e) 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?	☐	☐	☒	☐
f) Otherwise substantially degrade water quality?	☐	☐	☒	☐
g) Place housing within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map?	☐	☐	☐	☒
h) Place within a 100-year flood hazard area structures which would impede or redirect flood flows?	☐	☐	☐	☒
i) Expose people or structures to a significant risk of loss, injury or death involving flooding, including flooding as a result of the failure of a levee or dam?	☐	☐	☒	☐
j) Inundation by seiche, tsunami, or mudflow?	☐	☐	☐	☒
k) Result in an increase in pollutant discharges to receiving waters? Consider water quality parameters such as temperature, dissolved oxygen, turbidity and other typical stormwater pollutants (e.g., heavy metals, pathogens, petroleum derivatives, synthetic organics, sediment, nutrients, oxygen-demanding substances, and trash)	☐	☐	☒	☐
l) Result in significant alteration of receiving water quality during or following construction?	☐	☐	☒	☐
m) Could the proposed project result in increased erosion downstream?	☐	☐	☒	☐
n) Result in increased impervious surfaces and associated increased runoff?	☐	☐	☒	☐
o) Create a significant adverse environmental impact to drainage patterns due to changes in runoff flow rates or volumes?	☐	☐	☒	☐

p)	Be tributary to an already impaired water body, as listed on the Clean Water Act Section 303(d) list? If so, can it result in an increase in any pollutant for which the water body is already impaired?	☐	☐	☒	☐
q)	Be tributary to other environmentally sensitive areas? If so, can it exacerbate already existing sensitive conditions?	☐	☐	☐	☒
r)	Have a potentially significant environmental impact on surface water quality to either marine, fresh, or wetland waters?	☐	☐	☒	☐
s)	Have a potentially significant adverse impact on groundwater quality?	☐	☐	☒	☐
t)	Cause or contribute to an exceeded applicable surface or groundwater receiving water quality objectives or degradation of beneficial uses?	☐	☐	☒	☐
u)	Impact aquatic, wetland, or riparian habitat?	☐	☐	☒	☐
v)	Would the project include new or retrofitted stormwater treatment control Best Management Practices (e.g., water quality treatment basin, constructed treatment wetlands), the operation of which could result in significant environmental effects (e.g., increased vectors or odors)?	☐	☐	☒	☐

Discussion

The following section is based on the *Preliminary Water Quality Management Plan* (WQMP) (C&V Consulting, Inc., 2021b) provided in Appendix F of this IS/MND, and the *Preliminary Hydrology Study* (C&V Consulting, Inc., 2021a), provided in Appendix G of this IS/MND.

Impact Analysis

a) Would the project violate any water quality standards or waste discharge requirements?

Or

f) Would the project otherwise substantially degrade water quality?

Or

k) Would the project result in an increase in pollutant discharges to receiving waters? Consider water quality parameters such as temperature, dissolved oxygen, turbidity and other typical stormwater pollutants (e.g., heavy metals, pathogens, petroleum derivatives, synthetic organics, sediment, nutrients, oxygen-demanding substances, and trash)

Or

l) Would the project result in significant alteration of receiving water quality during or following construction?

Or

r) Would the project have a potentially significant environmental impact on surface water quality to either marine, fresh, or wetland waters?

Less Than Significant Impact.

***Construction*.** Pollutants of concern during construction include sediments, trash, petroleum products, concrete waste (dry and wet), sanitary waste, and chemicals. Each of these pollutants on its own or in combination with other pollutants can have a detrimental effect on water quality. During construction, the entirety of the project site would be graded and excavated and 6.3 acres of soil would be disturbed. During construction activities, soil would be exposed and disturbed, and there would be an increased potential for soil erosion and sedimentation compared to existing conditions. In addition, chemicals, liquid products, petroleum products (e.g., paints, solvents, and fuels), and concrete-related waste may be spilled or leaked and have the potential to be transported via stormwater runoff into receiving waters. Sediment from increased soil erosion and chemicals from spills and leaks have the potential to be discharged to downstream receiving waters during storm events, which can affect water quality and impair beneficial uses.

Because construction of the proposed project would disturb greater than 1 acre of soil, the proposed project is subject to the requirements of the *General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities,* Order No. 2009-0009-DWQ, NPDES No. CAS000002, as amended by Order Nos. 2010-0014-DWQ and 2012-0006-DWQ (Construction General Permit), as specified in Regulatory Compliance Measure HYD-1. As also specified in Regulatory Compliance Measure HYD-1, a Stormwater Pollution Prevention Plan (SWPPP) would be prepared and construction Best Management Practices (BMPs) detailed in the SWPPP would be implemented during construction, in compliance with the requirements of the Construction General Permit. The SWPPP would detail the BMPs to be implemented during 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. Compliance with the requirements of the Construction General Permit, including incorporation of construction BMPs to target and reduce pollutants of concern in stormwater runoff, would ensure that construction impacts related to waste discharge requirements, water quality standards, degradation of water quality, increased pollutant discharge, and alteration of receiving water quality, or impacts on surface water quality to marine, fresh, or wetland waters, would be less than significant.

According to the Geotechnical Evaluation (Appendix D), borings encountered groundwater at depths of 8 to 10 ft below ground surface (bgs). Due to the presence of shallow groundwater, it is likely that groundwater dewatering would be required during excavation activities. Groundwater may contain high levels of total dissolved solids, nitrate, salinity, or other constituents, or high or low pH levels that could be introduced to surface waters when dewatered groundwater is discharged to receiving waters. If groundwater dewatering is necessary, groundwater would be discharged to either the sanitary sewer system or stormdrain system. If discharged to the sanitary sewer system, a permit from the City of Cypress Public Works Department would be required, as specified in Regulatory Compliance Measure HYD-2, to ensure that there is sufficient capacity available to accommodate the discharge to prevent sanitary sewer overflow, which can result in a discharge of pollutants to surface waters. If groundwater is discharged to the storm drain system, coverage under the Santa

Ana RWQCB's NPDES Permit *General Waste Discharge Requirements for Discharges to Surface Waters that Pose an Insignificant (De Minimis) Threat to Water Quality* (Order No. R8-2020-0006, NPDES No. CAG998001) would be required, as also specified in Regulatory Compliance Measure HYD-2. This permit requires testing and treatment (as necessary) of groundwater encountered during groundwater dewatering prior to release to the stormdrain system. As a result, groundwater dewatering would not introduce pollutants to receiving waters at levels that would violate water quality standards or waste discharge requirements, degrade water quality, increase pollutant discharge, or alter the quality of the receiving water. Impacts to surface water quality from groundwater dewatering would be less than significant.

Operation. Expected pollutants of concern from long-term operation of the proposed project include suspended solids/sediment, nutrients, heavy metals, pathogens (bacteria/virus), pesticides, oil and grease, toxic organic compounds, and trash and debris. According to the *Preliminary Water Quality Management Plan* prepared for the proposed project, potential sources of these pollutants include the following:

- **Suspended Solids/Sediment:** proposed landscaped areas
- **Nutrients:** proposed landscaped areas
- **Heavy Metals:** uncovered parking areas
- **Pathogens (bacteria/virus):** proposed residence and pets
- **Pesticides:** proposed landscaped areas
- **Oil and Grease:** uncovered parking areas
- **Toxic Organic Compounds:** uncovered parking areas
- **Trash and Debris:** proposed residence

The proposed project would comply with the requirements of the Santa Ana RWQCB's NPDES Permit *Waste Discharge Requirements for the County of Orange, Orange County Flood Control District, and the Incorporated Cities of Orange County within the Santa Ana Region Areawide Urban Storm Water Runoff Orange County* (Order No. R8-2009-0030, NPDES No. CAS618030, as amended by Order No. R8-2010-0062) (North Orange County MS4 Permit). The North Orange County MS4 Permit requires that a WQMP be prepared for priority new development and redevelopment projects. The preparation of a WQMP and compliance with the North Orange County MS4 Permit is specified in Regulatory Compliance Measure HYD-3.

WQMPs specify the BMPs that would be implemented to capture, treat, and reduce pollutants of concern in stormwater runoff. The *Preliminary Water Quality Management Plan* prepared for the project specifies the Source Control, LID BMPs, and Treatment Control BMPs proposed for the project. Source Control BMPs are preventative measures that are implemented to prevent the introduction of pollutants into stormwater. LID BMPs mimic a project site's natural hydrology by using design measures that capture, filter, store, evaporate, detain, and infiltrate runoff rather than allowing runoff to flow directly to piped or impervious storm drains. Treatment Control BMPs are structural BMPs designed to treat and reduce pollutants in stormwater runoff prior to releasing it to receiving waters.

The BMPs specified in the Preliminary WQMP would be implemented and maintained, as specified in Regulatory Compliance Measure HYD-3. The proposed project BMPs are detailed below.

Proposed Structural Source Control BMPs include storm drain stenciling and signage; design and construct trash and waste storage areas to reduce pollution introduction, and; efficient irrigation systems and landscape design, water conservation, and smart controllers. Proposed Non-structural Source Control BMPs include education for property owners, tenants, and occupants; activity restrictions; common area landscape management; BMP maintenance; Title 22 CCR Compliance regarding hazardous waste management practices; uniform fire code implementation; common area litter control; employee training; common area catch basin inspection, and; street sweeping private streets and parking lots.

Proposed LID BMPs include seven proposed stormwater biofiltration systems (Modular Wetland Systems), also utilized as biotreatment BMPs. Stormwater runoff in the proposed condition would be collected by a series of area drains and proposed sump curb inlet catch basins, and would be conveyed to the seven proposed Modular Wetland Systems. The Modular Wetland Systems would treat street, roof, and landscape runoff for the proposed project, as well as reduce project-related flow rates into the existing storm drains by retaining and treating stormwater on the site. The proposed Modular Wetland Systems and catch basins would be designed with internal peak bypass and upstream diversion systems for conveyance of larger storm events. Treated and overflow stormwater from the Modular Wetland Systems would be conveyed via a proposed private underground storm drain system to two public points of connection, then to an existing City public 42-inch storm drain system within Orange Avenue. Flows would then be conveyed from the 42-inch storm drain system to the Lincoln Storm Drain and Carbon Creek Channel, then to Coyote Creek, a principal tributary of San Gabriel River, ultimately discharging to the Pacific Ocean.

The proposed BMPs would target and reduce pollutants of concern from runoff from the project site in compliance with the North Orange County MS4 Permit requirements. Compliance with the requirements of the North Orange County MS4 Permit, including incorporation of operational BMPs to target pollutants of concern (as specified in Regulatory Compliance Measure HYD-3), would ensure that water quality impacts related to waste discharge requirements, water quality standards, degradation of water quality, increased pollutant discharge, alteration of receiving water quality, or impacts on surface water quality to marine, fresh, or wetland waters during operation of the proposed project would be less than significant.

Regulatory Compliance Measures and Mitigation Measures:

The following regulatory compliance measures are existing regulations that are applicable to the proposed project and are considered in the analysis of potential impacts related to hydrology and water quality. The City of Cypress considers these requirements to be mandatory; therefore, they are not considered mitigation measures.

Regulatory Compliance Measure HYD-1 **Construction General Permit.** Prior to commencement of construction activities, the Applicant shall obtain coverage under the *National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges Associated with Construction and*

Land Disturbance Activities (Construction General Permit), NPDES No. CAS000002, Order No. 2009-0009-DWQ, as amended by Order No. 2010-0014-DWQ and Order No. 2012-0006-DWQ, or any other subsequent permit. This shall include submission of Permit Registration Documents (PRDs), including permit application fees, a Notice of Intent (NOI), a risk assessment, a site plan, a Stormwater Pollution Prevention Plan (SWPPP), a signed certification statement, and any other compliance-related documents required by the permit, to the State Water Resources Control Board via the Stormwater Multiple Application and Report Tracking System (SMARTS). Construction activities shall not commence until a Waste Discharge Identification Number (WDID) is obtained for the project from the SMARTS and provided to the Director of the City of Cypress Community Development Department, or designee, to demonstrate that coverage under the Construction General Permit has been obtained. Project construction shall comply with all applicable requirements specified in the Construction General Permit, including, but not limited to, preparation of a SWPPP and implementation of construction site best management practices (BMPs) to address all construction-related activities, equipment, and materials that have the potential to impact water quality for the appropriate risk level identified for the project. The SWPPP shall identify the sources of pollutants that may affect the quality of stormwater and shall include BMPs (e.g., Sediment Control, Erosion Control, and Good Housekeeping BMPs) to control the pollutants in stormwater runoff. Construction Site BMPs shall also conform to the requirements specified in the latest edition of the Orange County Stormwater Program *Construction Runoff Guidance Manual for Contractors, Project Owners, and Developers* to control and minimize the impacts of construction and construction-related activities, materials, and pollutants on the watershed. Upon completion of construction activities and stabilization of the project site, a Notice of Termination shall be submitted via SMARTS.

Regulatory Compliance Measure HYD-2

Groundwater Dewatering Permit. If groundwater dewatering is required during construction or excavation activities and the dewatered groundwater is

discharged to the sanitary sewer system, the Applicant shall obtain a discharge permit from the Director of the City of Cypress Public Works Department. If the dewatered groundwater is discharged to the stormdrain system, the Applicant shall obtain coverage under the *General Waste Discharge Requirements for Discharges to Surface Waters that Pose an Insignificant (De Minimis) Threat to Water Quality (*Order No. R8-2020-0006, NPDES No. CAG998001) which covers discharges to surface waters that pose an insignificant (de minimis) threat to water quality within. This shall include submission of a Notice of Intent for coverage under the permit to the RWQCB at least 45 days prior to the start of dewatering. The Applicant shall provide the Waste Discharge Identification Number (WDID) to the Director of the City's Public Works Department, or designee, to demonstrate proof of coverage under the *De Minimis* Permit. Groundwater dewatering shall not be initiated until a WDID is received from the Santa Ana Regional Water Quality Control Board (RWQCB) and is provided to the Director of the City's Public Works Department, or designee. Groundwater dewatering activities shall comply with all applicable provisions in the permit, including water sampling, analysis, treatment (if required), and reporting of dewatering-related discharges. Upon completion of groundwater dewatering activities, a Notice of Termination shall be submitted to the Santa Ana RWQCB.

Regulatory Compliance Measure HYD-3

Water Quality Management Plan. Prior to the issuance of grading or building permits, the Applicant shall submit a Final Water Quality Management Plan (WQMP) to the City of Cypress Engineer, or designee, for review and approval in compliance with the requirements of the *Waste Discharge Requirements for the County of Orange, Orange County Flood Control District, and the Incorporated Cities of Orange County within the Santa Ana Region Areawide Urban Storm Water Runoff Orange County (Order No. R8-2009-0030, NPDES No. CAS618030, as amended by Order No. R8-2010-0062) (North Orange County MS4 Permit)*. The Final WQMP shall be prepared consistent with the requirements of the *Technical Guidance Document for Water Quality Management Plans* (December 2013) and the Water Quality Management Plan template, or

subsequent guidance manuals. The Final WQMP shall specify the BMPs to be incorporated into the project design to target pollutants of concern in runoff from the project area. The City shall ensure that the BMPs specified in the Final WQMP are incorporated into the final project design.

b) Would the project substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level (e.g., the production rate of pre-existing nearby wells would drop to a level which would not support existing land uses or planned uses for which permits have been granted)?

Less Than Significant Impact. According to the Geotechnical Evaluation (Appendix D) prepared for the proposed project, borings encountered groundwater at depths of 8 to 10 ft bgs. Because of the presence of shallow groundwater, it is likely that groundwater dewatering would be required during construction activities. However, groundwater dewatering would be localized and temporary, and the volume of groundwater removed would not be substantial. In addition, any volume of water removed during groundwater dewatering would be minimal compared to the size of the Coastal Plain of the Orange County Groundwater Basin, which has a surface area of 350 sq mi and a storage capacity of 38,000,000 acre-feet.[30] Construction and operation of the proposed project would not involve direct groundwater extraction. Increased water use would not substantially affect groundwater supplies because the groundwater basin has been sustainably managed by Orange County Water District (OCWD) over the last 10 years, and it is anticipated that the Coastal Plain of the Orange County Groundwater Basin will continue to be sustainably managed with implementation of the Basin 8-1 Alternative. The Basin 8-1 Alternative establishes objectives and criteria for groundwater management within the Coastal Plain of the Orange County Groundwater Basin, as required by the Sustainable Groundwater Management Act (SGMA).[31] Therefore, construction and operational impacts related to a decrease in groundwater supplies or interference with groundwater recharge would be less than significant, and no mitigation is required.

c) Would the project substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of stream or river, in a manner which would result in substantial erosion or siltation on- or off-site?

Or

m) Could the proposed project result in increased erosion downstream?

Construction. During project construction activities, soil would be exposed and disturbed, drainage patterns would be temporarily altered during grading and other construction activities, and there would be an increased potential for soil erosion and siltation compared to existing conditions.

[30] California Department of Water Resources (DWR). 2004. California's Groundwater Bulletin 118. Coastal Plains of Orange County Groundwater Basin.

[31] Orange County Water District. 2017. Basin 8-1 Alternative – OCWD Management Area. January 1, 2017.

Additionally, during a storm event, soil erosion and siltation could occur at an accelerated rate. Project construction would not alter the course of a stream or river. As discussed above, the Construction General Permit requires preparation of a SWPPP (Regulatory Compliance Measure HYD-1). The SWPPP would detail Erosion Control and Sediment Control BMPs to be implemented during project construction to minimize erosion and retain sediment on site. With compliance with the requirements of the Construction General Permit and with implementation of the construction BMPs, construction impacts related to on-site, off-site, or downstream erosion or siltation would be less than significant, and no mitigation is required.

Operation. According to the Preliminary WQMP prepared for the proposed project, impervious surface area on-site would increase by approximately 2.03 acres (a 34 percent increase), which would increase on-site stormwater flows. Although the proposed project would increase impervious surface area, impervious surface areas associated with development of the proposed project site are not prone to erosion or siltation, because no loose soil would be included in these areas. The remaining acreage of the approximately 6.3-acre project site would consist of pervious surface area, which would contain landscaping that would minimize on-site erosion and siltation by stabilizing the soil. Therefore, on-site erosion and siltation impacts would be minimal.

As a result of the 2.03-acre increase in impervious surface area, the proposed project would increase runoff from the site during storm events, which can increase off-site erosion and siltation. As discussed previously, the proposed BMPs include Modular Wetland Systems, which would be designed to reduce the volume of stormwater discharged to the local storm drain system off-site.

Significant redevelopment projects are subject to specific hydromodification[32] requirements of the North Orange County MS4 Permit and must implement measures for site design, source control, runoff reduction, stormwater treatment, and baseline hydromodification management. However, according to the Preliminary WQMP, the project site is not located in an area of hydrologic condition of concern (HCOC)[33] and is exempt from hydromodification requirements. Specifically, according to the Orange County Susceptibility Analysis map for the San Gabriel-Coyote Creek, the project site is not located within a potential area of erosion, habitat, and physical structure susceptibility because downstream receiving waters are stabilized channels. Because the downstream receiving waters are not susceptible to hydromodification, the proposed project does not have a potential to result in downstream erosion or siltation. For these reasons, operational impacts related to substantial on- or off-site and downstream erosion or siltation would be less than significant, and no mitigation is required.

d) Would the project substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site?

[32] Hydromodification is defined as hydrologic changes resulting from increased runoff from increases in impervious surfaces. Hydromodification impacts can included changes in downstream erosion and sedimentation.

[33] Areas designated as hydrologic conditions of concern are watersheds of unarmored or soft-armored drainages that are vulnerable to geomorphology changes due to hydromodification.

Or

o) Would the project create a significant adverse environmental impact to drainage patterns due to changes in runoff flow rates or volumes?

Less Than Significant Impact.

Construction. As discussed above, project construction would comply with the requirements of the Construction General Permit and would include the preparation and implementation of a SWPPP. The SWPPP would include construction BMPs to control and direct on-site surface runoff and would include detention facilities, if required, to ensure that stormwater runoff from the construction site does not exceed the capacity of the stormwater drainage systems. With implementation of construction BMPs as specified in Regulatory Compliance Measure HYD-1, construction impacts related to a substantial increase in the rate or amount of surface runoff, flow, and volume that would result in flooding would be less than significant, and no mitigation is required.

Operation. Although the proposed project would increase the amount of impervious surface at the project site by approximately 2.03 acres, the proposed project would not substantially alter the existing on-site drainage patterns or alter the course of a stream or river. However, the increase in impervious surface area would increase stormwater runoff compared to existing conditions. As discussed in the response under Threshold 4.10(a), the proposed project includes Modular Wetland Systems and catch basins to treat and reduce stormwater runoff from the project site.

As demonstrated by the hydraulic modeling conducted as part of the *Preliminary Hydrology Study,* the Modular Wetland Systems would be designed to accommodate the Design Capture Volume of 16,306 cubic feet for the entire project site. The Modular Wetland Systems would treat the required volume within each of the seven drainage areas respectively, and would reduce the peak flow rate below the 10-year, 25-year, and 100-year pre-project peak flow rates. In addition, as specified in Regulatory Compliance Measure HYD-4, a Final Hydrology Study would be prepared based on final project plans and would be approved by the City. The Hydrology Study would confirm that the proposed project drainage facilities comply with City and County requirements. Furthermore, as runoff from the site would be reduced compared to the existing condition, the proposed project would not contribute to the downstream capacity exceedences or existing flooding. With implementation of the proposed BMPs, operational impacts related to a substantial increase in the rate or amount of surface runoff, flow, and volume that would result in flooding would be less than significant, and no mitigation is required.

Regulatory Compliance Measure:

The following regulatory compliance measure is an existing regulation that is applicable to the proposed project and is considered in the analysis of potential impacts related to hydrology and water quality. The City of Cypress considers this requirement to be mandatory; therefore, it is not a mitigation measure.

Regulatory Compliance Measure HYD-4

Final Hydrology and Hydraulic Analysis. The Applicant shall submit a Final Hydrology Study to the City of Cypress Director of Engineering, or his/her designee, for review and approval prior to issuance of grading and building permits. The Final Hydrology Study shall be prepared consistent with the requirements of the *Orange County Hydrology Manual* (Orange County Environment Agency 1986) and *Orange County Hydrology Manual Addendum No. 1* (Orange County Environment Agency 1996), or subsequent guidance manuals. The Final Hydrology Study shall demonstrate that the on-site drainage facilities and post-project Best Management Practices (BMPs) (e.g., Modular Wetland Systems) are designed in compliance with the requirements of the *Waste Discharge Requirements for the County of Orange, Orange County Flood Control District, and the Incorporated Cities of Orange County within the Santa Ana Region Areawide Urban Storm Water Runoff Orange County (Order No. R8-2009-0030, NPDES No. CAS618030, as amended by Order No. R8-2010-0062) (North Orange County MS4 Permit)*. The Final Hydrology Study shall also demonstrate that the on-site drainage facilities and post-construction BMPs are adequately sized to accommodate stormwater runoff from the design storm so that post-development peak flow rates for the 10-year 24-hour frequency storm, 25-year 24-hour frequency storm, and 100-year 24-hour frequency storm does not exceed the pre-development flow rate. The City Director of Engineering, or designee, shall ensure that the drainage facilities specified in the Final Hydrology Study are incorporated into the final project design.

e) Would the project 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?

Construction. As discussed above, construction of the proposed project has the potential to introduce pollutants to the stormdrain system from erosion, siltation, and accidental spills. However, as specified in Regulatory Compliance Measure HYD-1, the Construction General Permit requires preparation of a SWPPP, which would identify the construction BMPs to be implemented during construction to reduce impacts to water quality, including those impacts associated with soil erosion, siltation, and spills. In addition, any groundwater extracted during groundwater dewatering activities that is discharged to surface waters would be tested and treated (if necessary) to ensure that any discharges meet the water quality limits specified in the applicable NPDES permit (as

specified in Regulatory Compliance Measure HYD-2). Regulatory Compliance Measures HYD-1 and HYD-2 are existing NPDES requirements with which the proposed project is required to comply. These measures would prevent substantial additional sources of polluted runoff being discharged to the stormdrain system through implementation of construction BMPs that target pollutants of concern in runoff from the project site as well as testing and treatment (if required) of groundwater prior to its discharge to surface waters.

Additionally, the SWPPP would include construction BMPs to control and direct surface runoff on site and would include detention measures if required to ensure that stormwater runoff from the construction site does not exceed the capacity of the stormwater drainage systems. For these reasons, construction impacts related to creation or contribution of runoff water that would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff would be less than significant, and no mitigation is required.

Operation. As discussed above, operation of the proposed project has the potential to introduce pollutants to the stormdrain system from the proposed on-site uses. However, as specified in Regulatory Compliance Measures HYD-3 and HYD-4, permanent operational BMPs that target and reduce pollutants of concern in stormwater runoff would be implemented and maintained throughout the life of the proposed project. Regulatory Compliance Measures HYD-3 and HYD-4 are existing NPDES requirements with which the proposed project is required to comply. These measures would prevent substantial additional sources of polluted runoff being discharged to the stormdrain system through implementation of operational BMPs to target pollutants of concern in runoff from the project site. Additionally, as specified in Regulatory Compliance Measure HYD-4, the Final Hydrology Study would demonstrate compliance with City and County requirements, and would verify that the proposed Modular Wetland System BMPs would reduce the peak flow rate below the 10-year, 25-year, and 100-year pre-project peak flow rates to ensure that stormwater runoff from the project site does not exceed the capacity of the downstream storm drain systems. For these reasons, operational impacts related to creation or contribution of runoff water that would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff would be less than significant, and no mitigation is required.

g) Would the project place housing within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map?

Or

h) Would the project place within a 100-year flood hazard area structures which would impede or redirect flood flows?

No Impact. The project site is not located within a 100-year floodplain. According to the Federal Emergency Management Agency (FEMA) Federal Insurance Rate Map (FIRM) No. 06059C0108 (December 3, 2009), the project site is located within Zone X, which comprises areas of 0.2 percent annual chance flood (500-year flood). As the project site is not located within a 100-year floodplain, the proposed project would not place housing or structures within a 100-year flood hazard area. No impact would occur, and no mitigation is required.

i) Would the project expose people or structures to a significant risk of loss, injury or death involving flooding, including flooding as a result of the failure of a levee or dam?

Less Than Significant Impact. The levee inundation zone of Coyote Creek/Carbon Creek is located west of the project site; however, the project site is not located within this inundation area.[34] Therefore, the project site is not located within the inundation zone of a levee. Additionally, the project site is not located in an area subject to flooding from a 100-year storm. However, according to the Safety Element of the City of Cypress General Plan, the project site is located within the inundation zone of Prado Dam.[35]

Prado Dam was designed in the 1930s, but increased its functioning capability due to Seven Oaks Dam, which was completed in November 1999, and is approximately 40 miles upstream on the Santa Ana River. During a flood, Seven Oaks Dam stores water destined for Prado Dam for as long as the reservoir pool at Prado Dam is rising. When the flood threat at Prado Dam has passed, Seven Oaks Dam begins to release its stored flood water at a rate that does not exceed the downstream channel capacity. Working in tandem, the Prado and Seven Oaks Dams provide increased flood protection to Orange County.

Prado Dam is maintained and inspected to ensure its integrity and to ensure that risks are minimized. In addition, construction of the Santa Ana River Mainstem Project was initiated in 1989, and is scheduled for completion in 2021. The Santa Ana River Mainstem Project will increase levels of flood protection to more than 3.35 million people in Orange, San Bernardino, and Riverside Counties. Improvements to 23 miles of the Lower Santa Ana River channel, from Prado Dam to the Pacific Ocean, are 95 percent complete, with the remaining bank protection improvements in Yorba Linda currently under construction. Improvements to the Santa Ana River channel include construction of new levees and dikes. In addition, the Santa Ana River Mainstem Project includes improvements to Prado Dam that are currently underway and are estimated to be completed in 2021. The Prado Dam embankment has been raised and the outlet works have been reconstructed to convey additional discharges. Remaining improvements to Prado Dam include acquisition of additional land for the expansion of the Prado Reservoir, construction of protective dikes, and raising of the spillway.[36]

Although the new structures would be constructed in an inundation zone, the proposed project would not increase the chance of inundation from failure of Prado Dam. Additionally, the entire City of Cypress is within a dam inundation zone. The potential for dam failure is remote and the City's emergency evacuation plans would be implemented if these dams were susceptible to rupture during heavy rains or other events. Therefore, impacts of the proposed project related to the exposure of people and structures to significant risk associated with flooding as a result of dam failure would be less than significant. No mitigation is required.

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34 U.S. Army Corps of Engineers (USACE). 2015. Periodic Inspection Report No. 1, Generalized Executive Summary. June 4.

35 City of Cypress. 2001. City of Cypress General Plan Safety Element. October 5.

36 Orange County Public Works. 2019. Orange County Flood Division. Santa Ana River Project. Website: http://www.ocflood. com/sarp (accessed June 18, 2021).

j) Would the project be subject to inundation by seiche, tsunami, or mudflow?

No Impact. According to the Safety Element of the City's General Plan, the project site is located within the inundation zone of Prado Dam.[37] There are no open bodies of water in the vicinity of the project site and the proposed project is therefore not located within an inundation zone of a seiche. The project site is located approximately 7 miles northeast of the Pacific Ocean and is not located within a tsunami inundation zone, according to the Orange County Tsunami Inundation Maps.[38] The levee inundation zone of Coyote Creek/Carbon Creek is located south of the project site; however, the project site is not located within this inundation area. Therefore, no impact from inundation by seiche, tsunami, or mudflow would occur, and no mitigation is required.

n) Would the project result in increased impervious surfaces and associated increased runoff?

Less Than Significant Impact. The proposed project would increase the impervious surface area on-site by approximately 2.03 acres. As a result of the 2.03-acre increase in impervious surface area, the proposed project would increase stormwater runoff from the site during storm events. As discussed previously, the proposed BMPs include Modular Wetland Systems, which would be designed to retain stormwater runoff from the project site and would reduce the volume of polluted stormwater discharged to the local storm drain system off-site. Additionally, as stated in the *Preliminary Hydrology Study* prepared for the proposed project, the Modular Wetland System BMPs would reduce the peak flow rate below the 10-year, 25-year, and 100-year pre-project peak flow rates. As specified in Regulatory Compliance Measure HYD-4, a Final Hydrology Study would also be required to demonstrate that the final design of the proposed project meets these requirements. With implementation of Regulatory Compliance Measure HYD-4, impacts related to the increase of impervious surfaces and associated increased runoff would be less than significant, and no mitigation is required.

p) Would the project be tributary to an already impaired water body, as listed on the Clean Water Act Section 303(d) list? If so, can it result in an increase in any pollutant for which the water body is already impaired?

Less Than Significant Impact. After entering the stormdrain system in Orange Avenue, runoff from the project site eventually discharges to the Lincoln Storm Drain and Carbon Creek Channel, then to Coyote Creek, a principal tributary of San Gabriel River, ultimately discharging to the Pacific Ocean. Coyote Creek is impaired for dissolved copper, indicator bacteria, iron, malathion, pH, and toxicity.

As discussed above, construction of the proposed project has the potential to introduce pollutants to the stormdrain system from erosion, siltation, and accidental spills. During construction activities, chemicals, liquid products, petroleum products (e.g., paints, solvents, and fuels), and concrete-related waste may be spilled or leaked. Therefore, construction has the potential to contribute to pH impairments. Grading and earthmoving equipment are sources of chemicals, liquid products, and petroleum products if the equipment leaks and could contribute to the metals (dissolved copper and

[37] City of Cypress. 2001. City of Cypress General Plan Safety Element. October 5.

[38] California Department of Conservation. 2019. Orange County Tsunami Inundation Maps. Website: https://www.conservation.ca.gov/cgs/tsunami/maps/orange (accessed on June 18, 2021).

iron), and pH impairments in downstream receiving waters. If concrete-related wastes are spilled or leaked, they could also affect the pH of downstream receiving waters. Temporary or portable sanitary facilities provided for construction workers could be a source of sanitary waste and contribute to downstream indicator bacteria impairments. However, sanitary waste generated from temporary or portable sanitary facilities would be disposed of in compliance with all applicable regulations. The CWA 303(d) list does not specify the source of toxicity in Coyote Creek. However, project construction is not anticipated to contribute to the toxicity impairment as construction activities would be required to comply with applicable State and federal regulations for proper transport, use, storage, and disposal of excess hazardous materials and hazardous construction waste. Additionally, as malathion is a pesticide most commonly used in agriculture, residential landscaping, and for mosquito eradication, project construction is not anticipated to contribute to the malathion impairment. As specified in Regulatory Compliance Measure HYD-1, compliance with the Construction General Permit requires preparation of a SWPPP to identify construction BMPs to be implemented during project construction to reduce impacts to water quality. Construction BMPs would include, but not be limited to, Erosion and Sediment Control BMPs designed to minimize erosion and retain sediment on-site, as well as Good Housekeeping BMPs to prevent spills, leaks, and discharge of construction debris and waste into receiving waters. Implementation of construction BMPs would reduce pollutants of concern in stormwater runoff, and would reduce the potential of contributing to receiving water impairments. In addition, during groundwater dewatering, Regulatory Compliance Measure HYD-2 would ensure that pollutants are not introduced to receiving waters and that water quality standards and waste discharge requirements are met.

During operation of the proposed project, expected pollutants of concern include suspended solids/sediment, nutrients, heavy metals, pathogens (bacteria/virus), pesticides, oil and grease, toxic organic compounds, and trash and debris. Pets utilizing the landscaped areas would be a potential source of bacteria (e.g., fecal matter) which could contribute to the indicator bacteria impairment. Vehicles operating within the project site and metal roofs could be a source of metals (dissolved copper and iron). Therefore, there is the potential for operational pollutants to contribute to the indicator bacteria, dissolved copper, and iron impairments in receiving waters. In addition, although malathion could be used for pesticide purposes during operation, it would be used in small doses, if at all, and would therefore not substantially contribute to the malathion impairment.

As specified in Regulatory Compliance Measures HYD-3 and HYD-4, post-construction BMPs would be implemented and maintained during operation to target and reduce pollutants in stormwater runoff from the project site during operation. The Source Control and LID BMPs specified in the WQMP would target and reduce pollutants of concern in stormwater runoff from the project site, including those contributing to downstream water quality impairments. Therefore, with implementation of Regulatory Compliance Measures HYD-3 and HYD-4, impacts related to an increase in pollutants for which the receiving waterbody is already impaired as listed on the CWA Section 303(d) list would be less than significant, and no mitigation is required.

q) Would the project be tributary to other environmentally sensitive areas? If so, can it exacerbate already existing sensitive conditions?

No Impact. According to the North Orange County MS4 Permit, Environmentally Sensitive Areas are areas such as those designated in the Ocean Plan as Areas of Special Biological Significance (ASBS) or waterbodies listed on the CWA Section 303(d) list of impaired waters. The project site is not tributary to an ASBS.[39] In addition, the proposed project does not meet the priority development project definition of "a development of 2,500 sf of impervious surface or more, adjacent to (within 200 ft) or discharging directly into Environmentally Sensitive Areas." The nearest CWA Section 303(d) impaired waterbody is the Bolsa Chica Channel, which is located approximately 8.5 miles downstream of the project site. In addition, the proposed project would not discharge directly into this CWA Section 303(d) impaired water. Therefore, implementation of the proposed project would not result in any impacts to environmentally sensitive areas. No mitigation is required.

s) Would the project have a potentially significant adverse impact on groundwater quality?

Or

t) Would the project cause or contribute to an exceeded applicable surface or groundwater receiving water quality objectives or degradation of beneficial uses?

Less Than Significant Impact. Although groundwater dewatering may be required, dewatered groundwater would not be discharged back to groundwater and instead would be discharged to either the sanitary sewer system or stormdrain system. As a result, groundwater dewatering would not substantially degrade groundwater quality or result in the exceedance of water quality objectives or degradation of beneficial uses.

Infiltration of stormwater has the potential to affect groundwater quality in areas of shallow groundwater. As stated previously, groundwater table is considered to be present at a depth of 8 to 10 ft. Therefore, due to the shallow groundwater table, stormwater may infiltrate during construction and operation of the proposed project, and has a potential to affect groundwater quality because there is a direct path for pollutants to reach the groundwater table. Proposed construction BMPs, as required by the Construction General Permit and as specified in Regulatory Compliance Measure HYD-1, would reduce infiltration of pollutants to groundwater during construction. Proposed operational BMPs include Modular Wetland Systems, which would capture and treat stormwater runoff on-site, and would reduce the volume of stormwater and the infiltration of pollutants into groundwater during operation. Therefore, minimal infiltration would occur on-site during operation. Project construction and operation would not involve groundwater injection. Additionally, infiltration BMPs are not proposed. Because minimal infiltration would occur and no groundwater injection would occur, project construction and operation would not substantially degrade groundwater quality or result in the exceedance of water quality objectives or degradation of beneficial uses. Impacts would be less than significant, and no mitigation would be required.

[39] State Water Resources Control Board (SWRCB). 2019. California's Areas of Special Biological Significance. Website: https://www.Waterboards.ca.gov/water_issues/programs/ocean/asbs_map.shtml (accessed June 21, 2021).

u) Would the project impact aquatic, wetland, or riparian habitat?

Less Than Significant Impact. The project site is currently developed and located in an urban area. As discussed further in Section 4.4, Biological Resources, no natural streams, federally protected wetlands, or riparian habitat are located on the project site. Carbon Creek Channel, a downstream receiving water, is a concrete-lined trapezoidal channel, and does not provide aquatic, wetland, or riparian habitat. Although the Pacific Ocean, the ultimate receiving water, supports aquatic and riparian habitat, the proposed project would not directly discharge into the Pacific Ocean, and would implement construction and operational BMPs, as specified in Regulatory Compliance Measures HYD-1 and HYD-3, to reduce pollutant loading to receiving waters. With implementation of Regulatory Compliance Measures HYD-1 and HYD-3, development of the proposed project would have a less than significant impact on aquatic, wetland, or riparian habitat. No mitigation is required.

v) Would the project include new or retrofitted stormwater treatment control Best Management Practices (e.g., water quality treatment basin, constructed treatment wetlands), the operation of which could result in significant environmental effects (e.g., increased vectors or odors)?

Less Than Significant Impact. As discussed above, the proposed project would include implementation of post-construction BMPs (Modular Wetland Systems) to reduce impacts related to hydrology and water quality. These post-construction BMPs would not result in additional impacts not already evaluated throughout this IS/MND. The post-construction BMPs would be underground and would be designed and routinely inspected and maintained to reduce impacts related to vectors and odors. Additionally, as specified in the Preliminary WQMP, BMP maintenance would include inspections 48 hours following a storm event to verify no standing water exists and to minimize stagnation, which would minimize odors and vectors. Therefore, impacts related to BMPs would be less than significant, and no mitigation is required.

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4.11 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?	☐	☐	☒	☐
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?	☐	☐	☒	☐

Impact Analysis

a) Would the project physically divide an established community?

Less Than Significant Impact. The proposed project site has been used for administrative and maintenance purposes by the Cypress School District (District) for over 50 years. The proposed project would replace those existing uses with a new residential use that is consistent with and has been designed to blend in with the surrounding residential neighborhoods. Therefore, the proposed project would not introduce an inconsistency with the existing uses or new nuisances to the neighborhood. All of the external impacts of the proposed project have been mitigated to a less than significant level. Therefore, the proposed project would have a less than significant impact on surrounding communities and would not result in their physical division. No mitigation is required.

b) Would the project 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?

Less Than Significant Impact. The main documents regulating land use on the project site and in the immediate vicinity of the proposed project are the City of Cypress (City) General Plan and Zoning Code. The proposed project's relationship to these planning documents and the proposed project's consistency with the Southern California Association of Governments' (SCAG) Connect SoCal Plan are provided below.

SCAG Connect SoCal Plan (2020–2045 Regional Transportation Plan/Sustainable Communities Strategy [RTP/SCS]). The 2020–2045 RTP/SCS is a long-range planning document that provides a common foundation for regional and local planning, policymaking, and infrastructure goals in the SCAG region. The core vision for the 2020–2045 RTP/SCS, which is formally named the Connect SoCal Plan, is to increase mobility options and achieve a more sustainable growth pattern. Table 4.11.A provides a consistency analysis of the goals from the Connect SoCal Plan that are relevant to the proposed project. In order to eliminate repetitive goals and focus on key issues, goals that are not relevant to the proposed project are not included in Table 4.11.A. As stated in Table 4.11.A, the proposed project would be consistent with applicable goals in the Connect SoCal Plan, and no mitigation is required.

City of Cypress General Plan. The General Plan is a comprehensive plan intended to guide the physical development of the City, and it serves as a blueprint for future growth and development. As a blueprint for the future, the plan contains policies and programs designed to provide decision-makers with a solid basis for decisions related to land use and development. The Cypress General Plan Land Use Policy Map designates the project site as "Community Services and Facilities (Education Facilities)." The City's Zoning Ordinance is the primary implementation tool for its General Plan Land Use Policy Map, which contains more detailed information about permitted land uses.

Table 4.11.B provides a consistency analysis of the goals and policies from the City's General Plan that are relevant to the proposed project. As stated in Table 4.11.B, the proposed project would be consistent with all of the applicable General Plan goals and policies.

Zoning Ordinance. The City's Zoning Ordinance is the primary implementation tool for its General Plan Land Use Element (2001) and the goals and policies therein. For this reason, the Zoning Map must be consistent with the General Plan Land Use Map. The General Plan Land Use Map indicates the general location and extent of future land uses in Cypress. The Zoning Ordinance, which includes the Zoning Map, contains more detailed information about permitted land uses, building intensities, and required development standards.

The project site currently has the zoning designation of Public and Semi-Public (PS-1A). Allowable land uses within the Community Services and Facilities designation include public parks, educational facilities, public buildings, and other key community facilities. The PS-1A zone was established to set aside properties to be developed with public uses, other than street rights-of-way. This zoning district is also intended to identify and preserve areas of historic and community significance for the enjoyment of future generations. As part of the project approval, the approval of a Conditional Use Permit would be required to allow for the construction of the residential units, which fall under the category of "Senior Housing – Affordable," which is a conditionally allowed use within the PS-1A zone. The project does not propose any amendments to the City's General Plan, or the City's Zoning Ordinance. Therefore, the proposed project is consistent with the City's Zoning Ordinance.

Table 4.10.A: Connect SoCal Plan Consistency Analysis

Relevant Connect SoCal Plan Goals	Consistency Analysis
Connect SoCal Goal 1: Encourage regional economic prosperity and global competitiveness.	**Consistent.** The development of up to 50 affordable senior condominium units and 48 market-rate senior condominium units in the City of Cypress would improve the region's economic prosperity and global competitiveness by ensuring that the housing needs of the City's population are met. Therefore, the proposed project would be consistent with Goal 1 in the 2020–2045 Connect SoCal Plan.
Connect SoCal Goal 5: Reduce greenhouse gas emissions and improve air quality.	**Consistent.** The proposed project is designed to provide pedestrian connections to surrounding land uses. Additionally, as described in Section 4.3, Air Quality, of this IS/MND, construction and operation of the proposed project would result in less than significant air quality impacts. Additionally, as described in Section 4.8, Greenhouse Gas, of this IS/MND, the proposed project would comply with the latest Title 24 standards of the California Code of Regulations, regarding energy conservation and green building standards, and would not conflict with plans, policies, or regulations adopted for the purpose of reducing GHG emissions. Because the proposed project would not degrade air quality and would comply with applicable plans, policies, and regulations adopted for the purpose of reducing GHG emissions, the proposed project would be consistent with Goal 5 in the Connect SoCal Plan.
Connect SoCal Goal 6: Support healthy and equitable communities.	**Consistent.** The proposed project is designed to provide pedestrian connections to surrounding land uses. As demonstrated in Section 4.11, Land Use and Planning; Section 4.3, Air Quality; Section 4.13, Noise; and Section 4.17, Transportation, the project is designed to be compatible with surrounding land uses. Additionally, out of the 98 proposed senior dwelling units, 50 would be affordable senior condominium units, which would increase the supply of affordable senior housing in the City. Because the proposed project would support healthy and equitable communities, the proposed project would be consistent with Goal 6 in the 2020–2045 Connect SoCal Plan.
Connect SoCal Goal 9: Encourage development of diverse housing types in areas that are supported by multiple transportation options.	**Consistent.** The proposed project would result in the development of up to 50 affordable senior condominium units and 48 market-rate senior condominium units in the City. The proposed project would be located along a primary arterial street (Moody Street) and a secondary arterial street (Orange Avenue). New residents would be able to walk to surrounding land uses and nearby bus stations on Lincoln Avenue and Ball Road. Therefore, the proposed project would be consistent with Goal 9 in the 2020–2045 Connect SoCal Plan.

Source: Southern California Association of Governments (SCAG). 2020–2045 Connect SoCal Plan.
GHG= greenhouse gas
IS/MND = Initial Study/Mitigated Negative Declaration

Table 4.10.B: General Plan Consistency Analysis

Relevant General Plan Goals/Policies	Consistency Analysis
Land Use Element	
Goal LU-1: Create a well balanced land use pattern that accommodates existing and future needs for housing, commercial, industrial and open space/ recreation uses, while providing adequate community services to City residents.	**Consistent.** The proposed project would develop 98 dwelling units in an area of the City that is currently characterized by primarily residential and institutional uses. As discussed further in Section 4.15, Public Services, and Section 4.19, Utilities and Service Systems, the affected public service providers were contacted during preparation of this IS/MND to determine potential project-related impacts to those public service providers. As described in Sections 4.15 and 4.19, the project's impacts to utilities and other public services would be less than significant. Therefore, project implementation would contribute to a well-balanced land use pattern that accommodates the City's existing and future needs for housing and commercial uses, while providing adequate community services to City residents. Therefore, the proposed project would be consistent with General Plan Land Use Element Goal LU-1.
Policy LU-1.2: Allow for multi-family infill in designated areas to satisfy regional housing needs.	**Consistent.** The proposed project would develop housing on an infill parcel currently used for administrative and maintenance operations by the Cypress School District. As described in further detail in Section 4.14, Population and Housing, the development of new housing on the project site would help the City meet its regional housing needs requirements. Therefore, the proposed project would be consistent with General Plan Land Use Element Policy LU-1.2.
Goal LU-2: Ensure that new development is compatible with surrounding land uses, the circulation network, availability of public facilities, and existing development constraints.	**Consistent.** As demonstrated in this Section 4.11, Land Use and Planning; Section 4.3, Air Quality; and Section 4.13, Noise, the project is designed to be compatible with surrounding land uses. As discussed further in Section 4.17, Transportation, the proposed project would have less than significant impacts on the local circulation network. According to Section 4.15, Public Services, and Section 4.19, Utilities and Service Systems, the proposed project would not have a significant impact on public facilities in light of existing development constraints. Therefore, the proposed project would be consistent with General Plan Land Use Element Goal LU-2.
Policy LU-2.4: Mitigate traffic congestion and unacceptable levels of noise, odors, dust, and light and glare which affect residential areas and sensitive receptors, where feasible.	**Consistent.** As discussed in Section 4.15, Transportation, the proposed project would not generate significant adverse impacts related to traffic and transportation. As discussed in Section 4.1, Aesthetics; Section 4.2, Air Quality; and Section 4.13, Noise, sensitive receptors at the nearby church and residential neighborhoods would not experience unacceptable levels of noise, odors, dust, light, or glare as a result of project implementation. Therefore, the proposed project would be consistent with General Plan Land Use Element Policy LU-2.4.

Table 4.10.B: General Plan Consistency Analysis

Relevant General Plan Goals/Policies	Consistency Analysis
Policy LU-2.7: Encourage the provision of pedestrian linkages between adjacent commercial uses and commercial and residential uses to encourage pedestrian activity and reduce vehicle trips.	**Consistent.** The proposed project would provide internal sidewalks on at least one side of the internal loop roadway and on the private street that would run the northern and eastern boundaries of the project site. Pedestrian connections to Moody Street and Orange Avenue would also be provided to reduce walking distances from those streets to the interior of the project site. Additional sidewalks would connect the various residential buildings to the proposed open space and community amenities and a 5 ft wide meandering public sidewalk would replace the existing standard sidewalk along Orange Avenue, providing pedestrian linkages to encourage pedestrian activity and reduce vehicle trips. Therefore, the proposed project would be consistent with General Plan Land Use Element Policy LU-2.7.
Goal LU-5: Ensure that public facilities and services are available to accommodate development allowed under the General Plan and Zoning Ordinance.	**Consistent.** As discussed further in Section 4.15, Public Services, public facilities and services in the City of Cypress would not be significantly impacted by the proposed project. With implementation of mitigation measures or adherence to regulatory standards, project implementation would not disrupt or impair current fire, police, library, or education service levels. As discussed in Section 4.16, Recreation, the proposed project's new residents would generate an incremental increase in demand for park facilities; however, this increased demand would be offset by the payment of park fees required by Regulatory Compliance Measure REC-1. Therefore, the proposed project would be consistent with General Plan Land Use Element Goal LU-5.
Policy LU-5.5: Continue to make incremental improvements to the City's flood control and drainage system.	**Consistent.** As discussed in Section 4.10, Hydrology and Water Quality, the proposed project would result in less than significant impacts related to causing a substantial increase in the rate or amount of surface runoff in a manner that would result in flooding during construction or operation. The proposed project's stormwater detention system would be designed to reduce the peak flow rate below the 10-year, 25-year, and 100-year pre-project peak flow rates and meet the City's discharge requirements. Therefore, the proposed project would be consistent with General Plan Land Use Element Policy LU-5.5.
Policy LU-17.1: Increase the fiscal benefits to the City by attracting new retail, restaurant and entertainment businesses that can better serve the local population and employment.	**Consistent.** The proposed project would build 98 residential units, which would encourage the addition of new local-serving retail establishments to serve new residents. Therefore, the proposed project would be consistent with General Plan Land Use Element Policy LU-17.1.
Circulation Element	
Goal CIR-1: Maintain a safe, efficient, economical, and aesthetically pleasing transportation system providing for the movement of people, goods, and services to serve the existing and future needs of the City of Cypress.	**Consistent.** As discussed in Section 4.17, Transportation, the proposed project would result in less than significant impacts related to traffic at all study area intersections. Therefore, the proposed project would be consistent with General Plan Circulation Element Goal CIR-1.

Table 4.10.B: General Plan Consistency Analysis

Relevant General Plan Goals/Policies	Consistency Analysis
Policy CIR-1.3: Encourage development which contributes to a balanced land use, which in turn serves to reduce overall trip lengths (i.e., jobs/housing balance, locate retail in closer proximity to resident/patrons).	**Consistent.** The proposed project would develop 98 dwelling units in an area of the City that is currently characterized by a mix of residential and commercial uses. Therefore, project implementation would contribute to a well-balanced land use pattern that accommodates the City's existing and future needs for housing and commercial uses, while providing adequate community services to City residents. Therefore, the proposed project would be consistent with General Plan Circulation Element Policy CIR-1.3.
Policy CIR-2.8: Enhance the sidewalk environment to encourage pedestrian activities through streetscape and transit enhancement programs.	**Consistent.** Pedestrian access throughout the project site would be provided by internal sidewalks on at least one side of the internal loop roadway and on the private street that would run the northern and eastern boundaries of the project site. Pedestrian connections to Moody Street and Orange Avenue would also be provided to reduce walking distances from those streets to the interior of the project site. Additional sidewalks would connect the various residential buildings to the proposed open space and community amenities and a 5 ft wide meandering public sidewalk would replace the existing standard sidewalk along Orange Avenue. Therefore, the proposed project would be consistent with General Plan Circulation Element Policy CIR-2.8.
Conservation/Open Space/Recreation Element	
Goal COSR-3: Conserve energy resources through the use of available technology and conservation practices.	**Consistent.** As described in Section 4.6, Energy, the proposed project would comply with the energy efficiency standards included in Title 24, which would significantly reduce energy usage. Therefore, the proposed project would be consistent with General Plan Conservation/Open Space/Recreation Element Goal COSR-3.
Goal COSR-5: Preserve Cypress' archaeologic and paleontologic resources.	**Consistent.** As described in Section 4.7, Geology and Soils, the proposed project would implement Mitigation Measure GEO-2, which would require that a qualified paleontologist be contacted in the event that any paleontological resources are discovered during ground-disturbing activities so the discovery can be assessed for scientific importance. The qualified paleontologist shall then make recommendations regarding treatment and disposition of the discovery, the need for paleontological monitoring, and preparation of the appropriate report. Implementation of Mitigation Measure GEO-2 would ensure that impacts to paleontological resources are reduced to a level that is less than significant. As described in Section 4.5, Cultural Resources, the proposed project would implement Mitigation Measure CUL-1, which would require that a qualified professional archaeologist provide cultural resources awareness training prior to the commencement of ground-disturbing activities. If construction personnel encounter any archaeological deposits during construction activities, a qualified professional archaeologist will be contacted to assess the nature of the find, with the archaeological resources assessed and/or protected as they are discovered. Implementation of Mitigation Measure CUL-1 would ensure that impacts to archaeological resources are reduced to a

Table 4.10.B: General Plan Consistency Analysis

Relevant General Plan Goals/Policies	Consistency Analysis
	level that is less than significant. Therefore, the proposed project would be consistent with General Plan Conservation/Open Space/Recreation Element Goal COSR-5.
Policy COSR-6.1: Continue to require new developments to provide recreational opportunities for their residents in accordance with the City's park standard, three acres of parkland per 1,000 residents.	**Consistent.** As discussed in Section 4.16, Recreation, the proposed project's new residents would generate an incremental increase in demand for park facilities; however, this increased demand would be offset by the payment of park fees required by Regulatory Compliance Measure REC-1. In addition, the proposed project would include private recreational amenities. Therefore, the proposed project would be consistent with General Plan Conservation/Open Space/Recreation Element Policy COSR-6.1.
Housing Element	
Goal HOU-3: Encourage the provision of a wide range of housing by location, type of unit, and price to meet the existing and future needs of Cypress residents. Establish a balanced approach to meeting housing needs of both renter and owner households.	**Consistent.** The proposed project would develop 50 affordable senior condominium units and 48 market-rate senior condominium units. The development of these housing units would help the City meet existing and future needs of Cypress residents. As described in further detail in Section 4.12, Population and Housing, the development of new housing on the project site would help the City meet its regional housing needs requirements. Therefore, the proposed project would be consistent with General Plan Housing Element Goal HOU-3.
Goal HOU-4: Provide adequate housing sites through appropriate land use, zoning, and specific plan designations to accommodate the City's share of regional housing needs.	**Consistent.** As described in further detail in Section 4.12, Population and Housing, the development of new housing on the project site would help the City meet its regional housing needs requirements. Therefore, the proposed project would be consistent with General Plan Housing Goal HOU-4.
Safety Element	
Goal SAF-1: Protect residents, workers, and visitors from flood hazards, including dam inundation.	**Consistent.** As described in further detail in Section 4.10, Hydrology and Water Quality, the proposed project would not result in significant impacts related to flooding. Additionally, the project site has a low likelihood of flooding and the proposed on-site storm drain system would be adequately sized to accommodate stormwater runoff so that on-site flooding would not occur. Therefore, the proposed project would be consistent with General Plan Safety Element Goal SAF-1.
Goal SAF-2: Protect life and property in Cypress from seismic events and resulting hazards.	**Consistent.** As discussed in further detail in Section 4.7, Geology and Soils, with the implementation of Mitigation Measure GEO-1, which requires compliance with the recommendations in the project Geotechnical Assessment, all impacts related to geological hazards would be less than significant. As such, the proposed project would be consistent with General Plan Safety Element Goal SAF-2.
Goal SAF-5: Protect life and property in Cypress from urban fires. Maintain the Orange County Fire Authority's high level of service to community businesses and residents.	**Consistent.** As discussed in further detail in Section 4.15, Public Services, the proposed project requires the Applicant to enter into a Secured Fire Protection Agreement with the Orange County Fire Authority. The Secured Fire Protection Agreement with the County Fire Authority would ensure adequate service to the project site. As such, the proposed project would be consistent with General Plan Safety Element Goal SAF-5.

Table 4.10.B: General Plan Consistency Analysis

Relevant General Plan Goals/Policies	Consistency Analysis
Goal SAF-6: Maintain the police department's high quality of service to the City.	**Consistent.** As discussed in further detail in Section 4.15, Public Services, the proposed project is expected to be adequately served by existing police facilities. Additionally, the Cypress Police Department would review the site plan during the project approval phase and would impose standard conditions of approval. As such, the proposed project would be consistent with General Plan Safety Element Goal SAF-6.
Noise Element	
Goal N-2: Incorporate noise considerations into land use planning decisions.	**Consistent.** As discussed in further detail in Section 4.13, Noise, the proposed uses on the project site would be compatible with surrounding uses based on noise standards established by the City. Therefore, the proposed project would result in the development of land uses consistent with the City's noise standards, and the proposed project would be consistent with General Plan Noise Element Goal N-2.
Air Quality Element	
Goal AQ-1: Reduce air pollution through proper land use and transportation planning.	**Consistent**. As discussed in further detail in Section 4.3, Air Quality, of this IS/MND, construction and operation of the proposed project would result in less than significant air quality impacts. Because the proposed project would not degrade air quality, and would provide pedestrian connections, the proposed project would be consistent with General Plan Air Quality Element Goal AQ-2.
Growth Management Element	
Goal GM-1: Reduce traffic congestion.	**Consistent.** As discussed in Section 4.17, Transportation, based on the low daily and peak-hour trip generation for the project, the project is not anticipated to result in any LOS or operational deficiencies to the surrounding circulation system. Therefore, the proposed project would be consistent with General Plan Growth Management Element Goal GM-1.
Policy GM-4.1: To the extent feasible, utilize information on the jobs/housing balance in the City and region as a factor in land use decision-making.	**Consistent.** According to the Growth Forecast prepared for the 2020–2045 Connect SoCal Plan, the City of Cypress had a jobs-to-household ratio of 1.74, which is slightly higher than that of Orange County overall (1.67). This means that the City experiences a minor influx of workers from surrounding communities. The proposed project's addition of 98 new housing units would slightly lower the City's jobs-to-household ratio from 1.74 to 1.73. Generally speaking, however, the Orange County region suffers from a surplus of jobs and a deficit of housing to serve the workers employed in those jobs. Consistent with the referenced policy, this information will be provided to City decision-makers prior to considering approval of the proposed project. Therefore, the proposed project would be consistent with General Plan Growth Management Element Policy GM-4.1.

Source: City of Cypress General Plan (2001).
ft = foot/feet
IS/MND = Initial Study/Mitigated Negative Declaration
LOS = level of service

Summary. Approval of the proposed project would not introduce any inconsistences with the 2020–2045 Connect SoCal Plan, the City's General Plan, or the Cypress Municipal Code with approval of a Conditional Use Permit. Therefore, the proposed project would result in less than significant impacts related to potential conflicts with applicable land use plans, policies, and regulations. No mitigation is required.

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4.12 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?	☐	☐	☐	☒
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?	☐	☐	☐	☒

Impact Analysis

a) Would the project 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?

No Impact. The Surface Mining and Reclamation Act (SMARA) enacted by California Legislature in 1975 provides guidelines to assist with classification and designation of mineral lands. These areas were designated under the basis of several geologic factors, but do not give regard to existing land uses and ownership. These Mineral Resource Zones (MRZs) are divided into the following four categories:

- **MRZ-1:** An area where adequate information indicates that no significant mineral deposits are present, or where it is judged that little likelihood exists for their presence.
- **MRZ-2:** An area where adequate information indicates that significant mineral deposits are present, or where it is judged that a high likelihood exists for their presence.
- **MRZ-3:** An area containing mineral deposits of which their significance cannot be properly evaluated.
- **MRZ-4:** An area where information is not adequate enough to be able to assign to any other MRZ zone.

Of these four categories, lands classified as MRZ-2 are of the greatest importance. Such areas are underlain by demonstrated mineral resources or are located where geologic data indicate that significant measured or indicated resources are present. MRZ-2 areas are designated by the State of California Mining and Geology Board as being "regionally significant." Such designations require that a lead agency's land use decisions involving designated areas are to be made in accordance with its mineral resource management policies and that it consider the importance of the mineral resource to the region or the State as a whole, not just to the lead agency's jurisdiction.

The project site has been classified by the California Division of Mines and Geology (CDMG) as MRZ-4, indicating that the project site is in an area where information is inadequate for assignment

to any other mineral resource zone.[40] The City of Cypress (City) is not within the proximity of any MRZ-2 zones, and is surrounded by an MRZ-1 zone, indicating the absence of significant mineral deposits in the area.[41] Furthermore, according to the City's General Plan Conservation/Open Space/Recreation Element (2001), there are no mineral resources as defined by the CDMG within the City. Therefore, no significant impacts related to the loss of availability of a known mineral resource that would be of value to the region and to the residents of the State would result from project implementation, and no mitigation is required.

b) Would the project 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?

No Impact. As stated in Response 4.12(a), the project site is clearly shown to not be a part of a mineral resource zone containing any known valuable mineral resources, which would suggest a high unlikelihood of minerals being extracted at the project site. Therefore, no impact would occur, and no mitigation is required.

[40] California Department of Conservation (DOC). Division of Mines and Geology. 1981. Mineral Land Classification Map. Los Alamitos Quadrangle. Special Report 143, Plate 3.17.

[41] Ibid.

4.13 NOISE

	Potentially Significant Impact	Less Than Significant with Mitigation	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?	☐	☒	☐	☐
b) Generation of excessive groundborne vibration or groundborne noise levels?	☐	☐	☒	☐
c) For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within 2 miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?	☐	☐	☐	☒

Technical Background

The following provides an overview of the characteristics of sound and the regulatory framework that applies to noise within the vicinity of the proposed project site.

Characteristics of Sound

Noise is usually defined as unwanted sound. Noise consists of any sound that may produce physiological or psychological damage and/or interfere with communication, work, rest, recreation, or sleep. Several noise measurement scales exist that are used to describe noise in a particular location. A decibel (dB) is a unit of measurement that indicates the relative intensity of a sound. Sound levels in decibels are calculated on a logarithmic basis. An increase of 10 dB represents a tenfold increase in acoustic energy, while 20 dB is 100 times more intense, and 30 dB is 1,000 times more intense. Each 10 dB increase in sound level is perceived as approximately a doubling of loudness; similarly, each 10 dB decrease in sound level is perceived as half as loud. Sound intensity is normally measured through the A-weighted sound level (dBA). This scale gives greater weight to the frequencies of sound to which the human ear is most sensitive. The A-weighted sound level is the basis for 24-hour sound measurements, which better represent how humans are more sensitive to sound at night.

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

There are many ways to rate noise for various time periods, but an appropriate rating of ambient noise affecting humans also accounts for the annoying effects of sound. The equivalent continuous sound level (L_{eq}) is the total sound energy of time-varying noise over a sample period. However, the predominant rating scales for human communities in the State of California are the L_{eq}, the community noise equivalent level (CNEL), and the day-night average level (L_{dn}) based on A-weighted

decibels. CNEL is the time-varying noise over a 24-hour period, with a 5 dBA weighting factor applied to the hourly L_{eq} for noises occurring from 7:00 p.m. to 10:00 p.m. (defined as relaxation hours), and a 10 dBA weighting factor applied to noises occurring from 10:00 p.m. to 7:00 a.m. (defined as sleeping hours). L_{dn} is similar to the CNEL scale but without the adjustment for events occurring during the evening hours. CNEL and L_{dn} are within 1 dBA of each other and are normally interchangeable. The City of Cypress (City) uses the CNEL noise scale for long-term noise impact assessment. Other noise rating scales of importance when assessing the annoyance factor include the maximum instantaneous noise level (L_{max}), which is the highest exponential time-averaged sound level that occurs during a stated time period. The noise environments discussed in this analysis for short-term noise impacts are specified in terms of maximum levels denoted by L_{max}, which reflects peak operating conditions and addresses the annoying aspects of intermittent noise.

Noise impacts can be described in three categories. The first category includes audible impacts that refer to increases in noise levels noticeable to humans. Audible increases in noise levels generally refer to a change of 3 dB or greater because 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 dB and 3 dB. This range of noise levels has been found to be noticeable only in laboratory environments. The last category includes changes in noise levels 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.

Characteristics of Vibration

Vibration refers to ground-borne noise and perceptible motion. Ground-borne vibration is almost exclusively a concern inside buildings and is rarely perceived as a problem outdoors where the motion may be discernible. However, without the effects associated with the shaking of a building, there is less adverse reaction. Vibration energy propagates from a source through intervening soil and rock layers to the foundations of nearby buildings. The vibration then propagates from the foundation throughout the remainder of the structure. Building vibration may be perceived by occupants as motion of building surfaces, the rattling of items on shelves or hanging on walls, or a low-frequency rumbling noise. The rumbling noise is caused by the vibrating walls, floors, and ceilings radiating sound waves. Building damage is not a factor for normal operation and construction activities with the occasional exception of blasting and pile driving during construction. Annoyance from vibration often occurs when the vibration exceeds the threshold of perception by 10 VdB or less. This is an order of magnitude below the damage threshold for normal buildings.

Typical sources of ground-borne vibration are construction activities (e.g., blasting, pile driving, and operating heavy-duty earthmoving equipment), steel-wheeled trains, and occasional traffic on rough roads. Problems with ground-borne vibration and noise from these sources are usually localized to areas within approximately 100 ft of the vibration source, although there are examples of ground-borne vibration causing interference out to distances greater than 200 ft. When roadways are smooth, vibration from traffic, even heavy trucks, is rarely perceptible. For most projects, it is assumed that the roadway surface will be smooth enough that ground-borne vibration from street traffic will not exceed the impact criteria; however, construction activities have the potential to result in ground-borne vibration that could be perceptible and annoying. Ground-borne noise is not

likely to be a problem because noise arriving via the normal airborne path usually will be greater than ground-borne noise.

Ground-borne vibration has the potential to disturb people as well as damage buildings. Although it is very rare for ground-borne vibration to cause even cosmetic building damage, it is not uncommon for construction processes such as blasting and pile driving to cause vibration of sufficient amplitudes to damage nearby buildings (FTA 2018). Ground-borne vibration is usually measured in terms of vibration velocity, either the root-mean-square (RMS) velocity or peak particle velocity (PPV). RMS is best for characterizing human response to building vibration, and PPV is used to characterize the potential for damage. Decibel notation acts to compress the range of numbers required to describe vibration. Vibration velocity level in decibels is defined as:

$$Lv = 20 \log10 [V/Vref]$$

where Lv is the velocity in decibels (VdB), "V" is the RMS velocity amplitude, and "Vref" is the reference velocity amplitude, or 1 x 10-6 inches per second (inch/sec) used in the United States. Table 4.13.A illustrates the human response to various vibration levels, as described in the Federal Transit Administration's (FTA) *Transit Noise and Vibration Impact Assessment Manual* (FTA Manual) (2018).

Table 4.13.A: Human Response to Different Levels of Ground-Borne Noise and Vibration

Vibration Velocity Level	Noise Level		Human Response
	Low Freq[1]	Mid Freq[2]	
65 VdB	25 dBA	40 dBA	Approximate threshold of perception for many humans. Low-frequency sound usually inaudible; mid-frequency sound excessive for quiet sleeping areas.
75 VdB	35 dBA	50 dBA	Approximate dividing line between barely perceptible and distinctly perceptible. Many people find transit vibration at this level unacceptable. Low-frequency noise acceptable for sleeping areas; mid-frequency noise annoying in most quiet occupied areas.
85 VdB	45 dBA	60 dBA	Vibration acceptable only if there are an infrequent number of events per day. Low-frequency noise unacceptable for sleeping areas; mid-frequency noise unacceptable even for infrequent events with institutional land uses (e.g., schools and churches).

Source: FTA. *Transit Noise and Vibration Impact Assessment Manual,* Table 7-1 (2018).
[1] Approximate noise level when vibration spectrum peak is near 30 Hz.
[2] Approximate noise level when vibration spectrum peak is near 60 Hz.
dBA = A-weighted decibels Hz = Hertz
Freq = Frequency VdB = vibration velocity decibels

Factors that influence ground-borne vibration and noise include the following:

- **Vibration Source.** Vehicle suspension, wheel types and condition, railroad track/roadway surface, railroad track support system, speed, transit structure, and depth of vibration source
- **Vibration Path.** Soil type, rock layers, soil layering, depth to water table, and frost depth
- **Vibration Receiver.** Foundation type, building construction, and acoustical absorption

Among the factors listed above, there are significant differences in the vibration characteristics when the source is underground compared to at the ground surface. In addition, soil conditions are known to have a strong influence on the levels of ground-borne vibration. Among the most important factors are the stiffness and internal damping of the soil and the depth to bedrock.

Experience with ground-borne vibration indicates: (1) vibration propagation is more efficient in stiff, clay soils than in loose, sandy soils; and (2) shallow rock seems to concentrate the vibration energy close to the surface and can result in ground-borne vibration problems at large distances from a railroad track. Factors including layering of the soil and the depth to the water table can have significant effects on the propagation of ground-borne vibration. Soft, loose, sandy soils tend to attenuate more vibration energy than hard, rocky materials. Vibration propagation through groundwater is more efficient than through sandy soils.

Applicable Noise Standards

The applicable noise standards governing the project site are the criteria in the City's Noise Element of the General Plan (Noise Element) and Chapter 13, Article VII, of the City's Municipal Code.

City of Cypress General Plan Noise Element

California Government Code Section 65302(g) requires that a noise element be included in the General Plan of each county and city in the State. The Noise Element of the City's General Plan is intended to identify sources of noise and provide objectives and policies that ensure that noise from various sources does not create an unacceptable noise environment. Overall, the City's Noise Element describes the noise environment (including noise sources) in the City, and addresses noise mitigation regulations, strategies, and programs, as well as delineates federal, State, and City jurisdiction relative to rail, automotive, aircraft, and nuisance noise.

The City's noise standards are correlated with land use zoning classifications in order to maintain identified ambient noise levels and to limit, mitigate, or eliminate intrusive noise that exceeds the ambient noise levels within a specified zone. The City has adopted local guidelines based, in part, on the community noise compatibility guidelines established by the State Department of Health Services for use in assessing the compatibility of various land use types with a range of noise levels. These guidelines are set forth in the City's General Plan Noise Element.

In accordance with Table N-3 of the Noise Element of the City General Plan, the exterior noise level standard for residential uses, including single-family and multi-family development, is 60 dBA CNEL. This standard is limited to the private yards of single-family homes and the private patios or balconies of multi-family uses that are served by means of an exit from inside each dwelling; however, private patios or balconies that are six (6) ft deep or less are exempt from this standard. For residential uses, the City's interior noise level standard is 45 dBA CNEL.

City of Cypress Municipal Code

The Cypress Municipal Code (CMC) Chapter 13, Article VII, Sections 13-64 through 13-79, established noise standards and enforcement procedures to enforce the reduction of "obnoxious or offensive" noises.

More specifically, Chapter 13, Article VII, Sections 13-67 through 13-69, establish the noise zone designations, exterior noise level standards, and interior noise level standards. Section 13-67 specifies that the residential properties are assigned to the following noise zones:

- **Noise Zone 1:** All residential properties zoned RS-15000 or RS-6000 (low-density residential uses with a maximum of 5 dwelling units per gross acre).
- **Noise Zone 2:** All residential property not in Noise Zone 1.

Section 13-68 (a), as shown in Table 4.13.B, presents the exterior noise level standards for Noise Zone 2, which would apply to the proposed project.

Table 4.13.B: Exterior Noise Level Standards

Noise Zone	Noise Level (dBA L_{eq})	Time Period
1	55	7:00 a.m. – 10:00 p.m.
	50	10:00 p.m. – 7:00 a.m.
2	60	7:00 a.m. – 10:00 p.m.
	55	10:00 p.m. – 7:00 a.m.

Source: City of Cypress Municipal Code Section 13-68 (a) (1976).
dBA = A-weighted decibels L_{eq} = Average Hourly Noise Level

In the event the alleged offensive noise consists of impact noise, simple tone noise, speech, music, or any combination thereof, each of the above noise levels shall be reduced by five (5) dB(A).

Section 13-68 of the Cypress Municipal Code goes on to state in subsection (b) that

> "It shall be unlawful for any person at any location within the incorporated area of the city to create any noise, or to allow the creation of any noise on property owned, leased, occupied or otherwise controlled by such person, when the foregoing causes the noise level, when measured on any other residential property, either incorporated or unincorporated, to exceed:"
>
> 1. The noise standard for a cumulative period of more than 30 minutes in any hour; or
> 2. The noise standard plus 5 dB(A) for a cumulative period of more than 15 minutes in any hour; or
> 3. The noise standard plus 10 dB(A) for a cumulative period of more than 5 minutes in any hour; or

4. The noise standard plus 15 dB(A) for a cumulative period of more than 1 minute in any hour; or
5. The noise standard plus 20 dB(A) for any period of time.

Subsection (c) also specifies that,

> "In the event the ambient noise level exceeds either of the first four (4) noise limit categories above, the cumulative period applicable to said category shall be increased to reflect said ambient noise level. In the event the ambient noise level exceeds the fifth noise limit category, the maximum allowable noise level under said category shall be increased to reflect the maximum ambient noise level."

Section 13-69 (a), as shown in Table 4.13.C, presents the interior noise level standards for all residential zones.

Table 4.13.C: Interior Noise Level Standards

Noise Zone	Noise Level (dBA L_{eq})	Time Period
1 and 2	55	7:00 a.m. – 10:00 p.m.
	45	10:00 p.m. – 7:00 a.m.

Source: City of Cypress Municipal Code (1976).
dBA = A-weighted decibels L_{eq} = Average Hourly Noise Level

In the event the alleged offensive noise consists of impact noise, simple tone noise, speech, music, or any combination thereof, each of the above noise levels shall be reduced by five (5) dB(A).

Section 13-69 (b) of the Cypress Municipal Code states that

> "It shall be unlawful for any person at any location within the incorporated area of the city to create any noise, or to allow the creation of any noise on property owned, leased, occupied or otherwise controlled by such person, when the foregoing causes the noise level, when measured on any other residential property, either incorporated or unincorporated, to exceed:"

1. The interior noise standard for a cumulative period of more than 5 minutes in any hour; or
2. The interior noise standard plus 5 dB(A) for a cumulative period of more than 1 minute in any hour; or
3. The interior noise standard plus 10 dB(A) for any period of time.

Subsection (c) also specifies that,

> "In the event the ambient noise level exceeds either of the first two (2) noise limit categories above, the cumulative period applicable to said category shall be

> increased to reflect said ambient noise level. In the event the ambient noise level exceeds the third noise limit category, the maximum allowable noise level under said category shall be increased to reflect the maximum ambient noise level."

Section 13-70, Special Provisions, of the City Municipal Code specifies that construction activities are exempt from the provisions listed above, however, it regulates the timing of construction activities. According to the Municipal Code, construction activities shall not take place between the hours of 8:00 p.m. and 7:00 a.m. on weekdays, before 9:00 a.m. and after 8:00 p.m. on Saturday, or at any time on Sunday or a federal holiday.

Section 13-71, Schools, hospitals and churches; special provisions, of the Municipal Code states

> "It shall be unlawful for any person to create any noise which causes the noise level at any school, hospital or church while the same is in use, to exceed the noise limits as specified in section 13-68 prescribed for the assigned noise zone in which the school, hospital or church is located, or which noise level unreasonably interferes with the use of such institutions or which unreasonably disturbs or annoys patients in the hospital, provided conspicuous signs are displayed in three (3) separate locations within one-tenth (0.1) of a mile of the institution indicating the presence of a school, church or hospital."

Applicable Vibration Standards

Due to the lack of vibration standards within the City's General Plan or Municipal Code, vibration standards included in the FTA Manual are used in this analysis for ground-borne vibration impacts, as shown in Table 4.13.D.

The criteria for environmental impact from ground-borne vibration and noise are based on the maximum levels for a single event. Table 4.13.D lists the potential vibration damage criteria associated with construction activities, as suggested in the FTA Manual.

Table 4.13.D: Construction Vibration Damage Criteria

Building Category	PPV (inch/sec)
Reinforced concrete, steel, or timber (no plaster)	0.50
Engineered concrete and masonry (no plaster)	0.30
Nonengineered timber and masonry buildings	0.20
Buildings extremely susceptible to vibration damage	0.12

Source: FTA. *Transit Noise and Vibration Impact Assessment Manual*, Table 12-3 (2018).
[1] RMS vibration velocity in decibels (VdB) re 1 micro-inch/second.
inch/sec = inches per second
L_V = velocity in decibels
PPV = peak particle velocity
RMS = root-mean-square
VdB = vibration velocity in decibels

The FTA Manual guidelines show that a vibration level of up to 0.5 inch/sec in PPV is considered safe for buildings consisting of reinforced concrete, steel, or timber (no plaster), and would not

result in any construction vibration damage. For a nonengineered timber and masonry building, the construction vibration damage criterion is 0.2 inch/sec in PPV.

Thresholds of Significance

A project would 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 the goals of the community in which the project is located. The following noise level increases were used to determine whether or not the project would result in a significant noise impact:

For off-site transportation-related impacts:

- Where the existing ambient noise level is less than 65 dBA and a project-related permanent increase in ambient noise levels of 3 dBA CNEL or greater occurs.
- Where the existing ambient noise level is greater than 65 dBA and a project-related permanent increase in ambient noise levels of 1 dBA CNEL or greater occurs.

For non-transportation-related stationary source impacts, including operations:

- If current noise levels experienced at the surrounding sensitive uses are less than the hourly daytime noise level standards, then an exceedance of the standards listed in Table 4.13.B would constitute a potentially significant impact.
- If current noise levels experienced at the surrounding sensitive uses are greater than the hourly daytime noise level standard listed in Table 4.13.B, then a perceptible increase of 3 dBA or more would constitute a potentially significant impact.

For construction-related impacts:

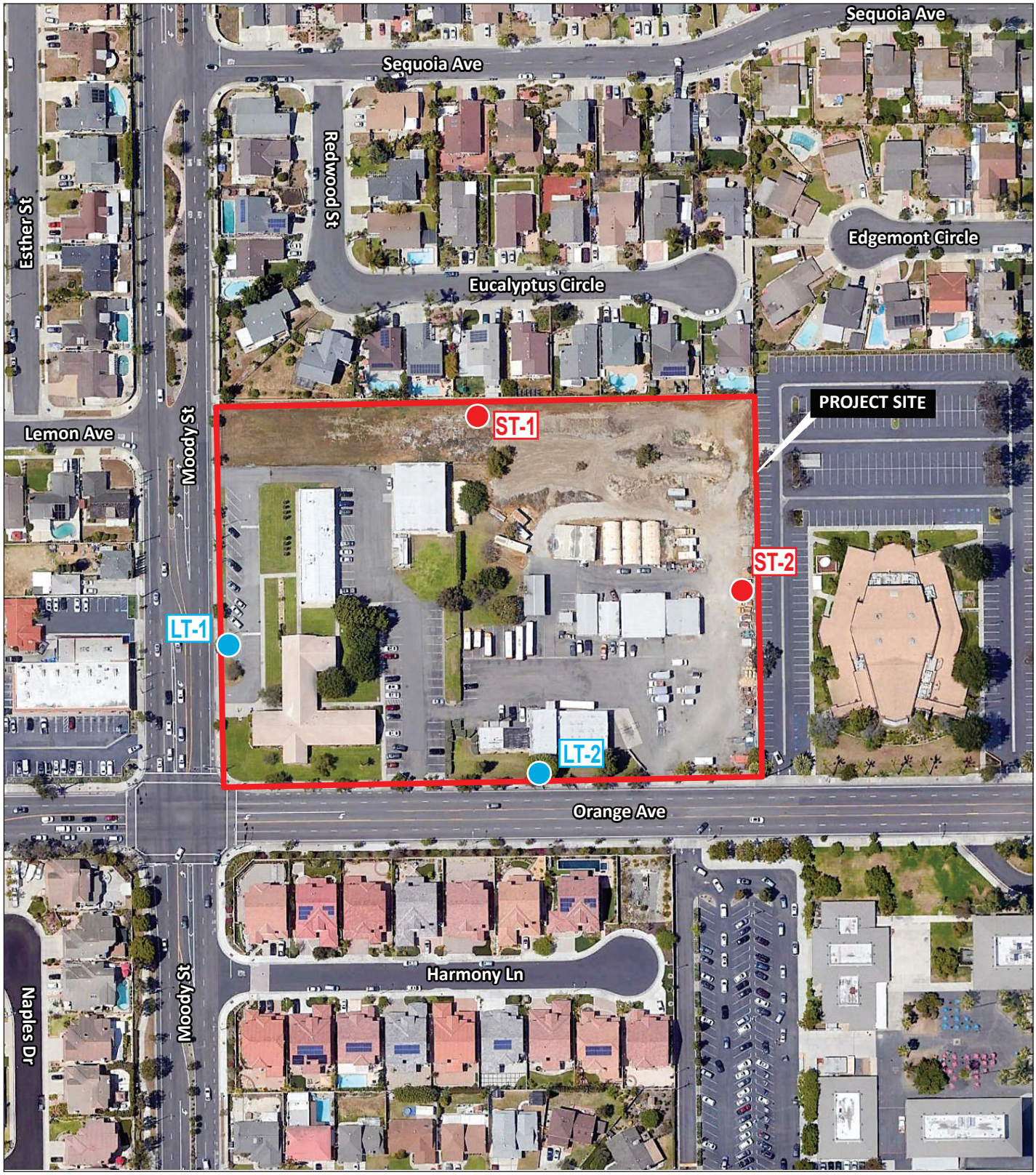
- Compliance with the City's Municipal Code and exceedance of the FTA standards listed above and in Table 4.13.D.

Existing Noise Environment

The existing noise levels at the project site and surrounding uses are dominated by traffic on Orange Avenue and Moody Street, activities at the existing maintenance facility, and parking lot activities at the surrounding church, office, and school uses.

Existing Noise Level Measurements

In order to assess the existing noise conditions in the area, noise measurements were gathered along the perimeter of the project site, the locations of which are shown in Figure 4.13-1. Two long-term 24-hour measurements (LT-1 and LT-2) were taken from May 12, 2021, to May 13, 2021 at the project site's western and southern property lines, respectively. Additionally, two short-term noise level measurements were taken to supplement the long-term measurements.



LSA

FIGURE 4.13-1

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FEET

N

LT# Long-term Noise Monitoring Location (24 hours)

ST# Short-term Noise Monitoring Location (20 minutes)

Citrus Square Project
Noise Monitoring Locations

SOURCES: Google Earth, 4/2/2018; LSA, 2021

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The first short-term noise level measurement, ST-1, was located along the eastern boundary of the project site. The second short-term noise level measurement, ST-2, was located approximately 350 ft east of the Moody Street centerline at the northern boundary of the project site. The results of the noise measurements are shown in Table 4.13.E below. As shown in Table 4.13.E, noise levels in the vicinity of the project site currently range from 68.3 dBA to 70.1 dBA CNEL.

Existing Traffic Noise Contours

The guidelines included in the Federal Highway Administration (FHWA) Highway Traffic Noise Prediction Model (1977; FHWA RD-77-108) were used to evaluate highway traffic-related noise conditions along roadway segments in the project vicinity. This model requires various parameters, including traffic volumes, vehicle mix, vehicle speed, and roadway geometry to compute typical equivalent noise levels during daytime, evening, and nighttime hours. The resultant noise levels are weighted and summed over 24-hour periods to determine the CNEL values. Existing traffic noise contours along modeled roadway segments are shown in Table 4.13.F. These noise levels represent the worst-case scenario, which assumes that no shielding is provided between the traffic and the locations where the noise contours are drawn. The standard vehicle mix for Southern California roadways was used for traffic on these roadway segments.

Impact Analysis

a. Would the project result in 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?

Less Than Significant with Mitigation Incorporated.

Short-Term Construction Noise Impacts

Short-term noise impacts would be associated with demolition of the existing structures, excavation, grading, and construction of the proposed structures. Construction-related short-term noise levels would be higher than existing ambient noise levels in the vicinity of the project site at the present time, but would no longer occur once construction of the proposed project is completed.

Two types of short-term noise impacts could occur during construction of the proposed project. First, construction crew commutes and the transport of construction equipment and materials to the project site would incrementally increase noise levels on access roads leading to the site. Although there would be a relatively high single-event noise exposure potential causing intermittent noise nuisance (passing trucks at 50 ft would generate up to a maximum of 84 dBA), the effect on longer-term (hourly or daily) ambient noise levels would be small when compared to existing average daily traffic (ADT) volumes of 10,510 vehicles on Orange Avenue (LSA 2021)[42]. Because construction-related vehicle trips would not approach the daily traffic volumes of 10,510 vehicles on Orange Avenue, traffic noise would not increase by 3 dBA. A noise level increase of less than 3 dBA would not be perceptible to the human ear in an outdoor environment.

[42] ADT volumes are rounded to the nearest 10. To represent 2021 conditions, a 1 percent growth per year (3 percent total growth) was applied to the 2018 ADT volumes.

Table 4.13.E: Existing Noise Level Measurements

Location	Description	Daytime Noise Levels[1] (dBA L_{eq})	Evening Noise Levels (dBA L_{eq})	Nighttime Noise Levels[2] (dBA L_{eq})	Daily Noise Level (dBA CNEL)
LT-1	9470 Moody Street, on a light pole next to the sidewalk near Moody Street.	67.4-72.3	65.9-67.4	52.7-64.9	70.1
LT-2	5081 Orange Avenue, approximately 20 ft from the edge of the outside lane of Orange Avenue, on a tree.	65.2-74.0	62.9-66.0	51.4-63.1	68.3
ST-1[3]	East edge of project site, 16 ft from the eastern wall.	48.1-56.8	45.7-48.8	34.3-45.9	51.1
ST-2[3]	North edge of the project site, 15 ft south of the wall.	47.2-55.9	44.8-47.9	33.3-45.0	50.2

Source: LSA (June 2021).
[1] Daytime Noise Levels = noise levels during the hours of 7:00 a.m. to 10:00 p.m.
[2] Nighttime Noise Levels = noise levels during the hours of 10:00 p.m. to 7:00 a.m.
[3] Hourly noise levels were calculated based on a 15-minute short-term measurement and then adjusting it to the pattern of nearest long-term measurement.
CNEL = Community Noise Equivalent Level
dBA = A-weighted decibel
ft = foot/feet
L_{eq} = the average noise level during a specific hour
LT = long-term measurement
ST = short-term measurement

Table 4.13.F: Existing Traffic Noise Levels

Roadway Segment	ADT	Centerline to 70 dBA CNEL (ft)	Centerline to 65 dBA CNEL (ft)	Centerline to 60 dBA CNEL (ft)	CNEL (dBA) 50 ft from Centerline of Outermost Lane
Orange Avenue - from Denni Street to Moody Street	8,270	< 50	56.7	117	63.7
Orange Avenue - from Moody Street to Grindlay Street	10,510	< 50	67.5	138	64.3
Orange Avenue - from Grindlay Street to Walker Street	11,720	< 50	72.0	148	64.8
Moody Street - from Lincoln Avenue to Orange Avenue	17,510	< 50	91.9	193	66.5
Moody Street - from Orange Avenue to Ball Road	15,060	< 50	83.7	174	65.9

Source: Compiled by LSA (June 2021).
Note: Traffic noise within 50 ft of the roadway centerline should be evaluated with site-specific information.
ADT = average daily traffic
CNEL = Community Noise Equivalent Level
dBA = A-weighted decibels
ft = foot/feet

Therefore, short-term, construction-related impacts associated with worker commute and equipment transport to the project site would be less than significant.

In addition to the reference maximum noise level, the usage factor provided in Table 4.13.G is utilized 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. Utilizing the following equation, a composite noise level can be calculated when multiple sources of noise operate simultaneously:

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

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.

Table 4.13.G: Typical Maximum Construction Equipment Noise Levels (L_{max})

Type of Equipment	Acoustical Usage Factor	Suggested Maximum Sound Levels for Analysis (dBA L_{max} at 50 ft)
Air Compressor	40	80
Backhoe	40	80
Cement Mixer	50	80
Concrete/Industrial Saw	20	90
Crane	16	85
Excavator	40	85
Forklift	40	85
Generator	50	82
Grader	40	85
Loader	40	80
Pile Driver	20	101
Paver	50	85
Roller	20	85
Rubber Tire Dozer	40	85
Scraper	40	85
Tractor	40	84
Truck	40	84
Welder	40	73

Source: Federal Highway Administration. *Highway Construction Noise Handbook* (2006).
dBA = A-weighted decibel(s)
ft = foot/feet
L_{max} = maximum instantaneous noise level

Using information from the assumptions applied in the CalEEMod emissions modeling for the proposed project (refer to Section 4.3, Air Quality, and Section 4.7, Greenhouse Gas Emissions, for additional information), the hourly construction noise level during the building construction phase, which is expected to take approximately 21 months, was calculated. The following list of equipment is expected to be utilized during the building construction phase:

- 1 crane
- 3 forklifts
- 1 generator set
- 1 tractor
- 1 loader
- 1 backhoe
- 1 welder

Based on the information in Table 4.13.G, the maximum noise level generated by the three loudest pieces of equipment, the crane, tractor and forklift, were calculated. As shown in Appendix H, the combination of this equipment, taking into account the usage factor of each piece of equipment, would result in a combined noise level of 88.3 dBA L_{eq} at a distance of 35 ft, which represents the distance from equipment at the project site to the nearest noise-sensitive uses to the north.

Noise level projections were also calculated from the center of the construction activity to the nearest residences due to the spreading of equipment expected. At a distance of 230 ft from the nearest property line, construction noise levels would be expected to approach 67.9 dBA L_{eq}. Compliance with the allowed hours in the City's Noise Ordinance would ensure that construction noise does not disturb residents during typical sleeping hours or during hours when ambient noise levels are likely to be lower (i.e., at night). In addition, the proposed project would implement several best practices for reducing construction noise, including, but not limited to, maximizing the distance between noise sources and sensitive receptors during construction activities, equipping construction equipment with properly operating and maintained noise mufflers, and establishing a noise disturbance coordinator for the proposed project. These best practices are included in Standard Condition NOI-1, provided below. Although construction noise would be higher than the ambient noise in the vicinity of the project site, it would cease to occur once project construction is completed. Additionally, with the incorporation of Standard Condition NOI-1, all feasible and reasonable measures to reduce construction noise would be implemented, and a less than significant impact would occur.

Long-Term Off-Site Traffic Noise Impacts

The FHWA Highway Traffic Noise Prediction Model (FHWA RD-77-108) was used to evaluate traffic-related noise conditions in the vicinity of the project site. This model requires various parameters, including traffic volumes, vehicle mix, vehicle speed, and roadway geometry to compute typical equivalent noise levels during daytime, evening, and nighttime hours. The resultant noise levels are weighted and summed over 24-hour periods to determine the Community Noise Equivalent Level (CNEL) values. The existing and existing plus project traffic volumes in the project area were obtained from the traffic analysis prepared for the proposed project. Table 4.13.H lists the existing and existing plus project traffic noise levels adjacent to roadway segments in the project site vicinity. These noise levels represent worst-case scenarios, which assume that no shielding is provided between the traffic and the location where the noise contours are drawn. The FHWA Noise Model Printouts are provided in Appendix H.

The results indicate that the increase in noise associated with project-related traffic would be very small, ranging from 0.0 to 0.1 dBA along the segments analyzed. These noise level increases are not perceptible by the human ear; therefore, off-site traffic noise impacts would be less than significant. No mitigation is required.

Long-Term Off-Site Stationary Noise Impacts

The proposed project includes construction of a surface level parking lot along the project site's northern and eastern property lines. Representative parking activities, such as persons conversing and slamming doors, would generate approximately 70 dBA L_{max} at 50 ft. The closest sensitive uses to the proposed parking lot are single-family homes located at a distance of approximately 25 ft from the closest parking spaces, where they would be exposed to intermittent parking lot noise of up to 76 dBA L_{max}. This level exceeds the City's 70 dBA L_{max} nighttime noise threshold. However, taking into account the existing 6.5 ft high wall along the northern boundary of the project site, noise levels would be reduced by 8.7 dBA. Therefore, parking lot noise would be reduced to a level below the City's 70 dBA L_{max} nighttime noise threshold for Noise Zone 1, which includes low-density residential properties.

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Table 4.13.H: Existing (2021) and Existing With Project Traffic Noise Levels

Roadway Segment	Existing Year Without Project					Existing Year With Project						
	ADT	Centerline to 70 CNEL (ft)	Centerline to 65 CNEL (ft)	Centerline to 60 CNEL (ft)	CNEL (dBA) 50 ft from Centerline of Outermost Lane	ADT	Change in ADT	Centerline to 70 CNEL (ft)	Centerline to 65 CNEL (ft)	Centerline to 60 CNEL (ft)	CNEL (dBA) 50 ft from Centerline of Outermost Lane	Increase over Existing CNEL (dBA) 50 ft from Centerline of Outermost Lane
Orange Avenue - from Denni Street to Moody Street	8,270	< 50	57	117	63.7	8,280	10	< 50	57	117	63.7	0.0
Orange Avenue - from Moody Street to Grindlay Street	10,510	< 50	68	138	64.3	10,560	50	< 50	68	138	64.3	0.0
Orange Avenue - from Grindlay Street to Walker Street	11,720	< 50	72	148	64.8	11,770	50	< 50	72	149	64.8	0.0
Moody Street - from Lincoln Avenue to Orange Avenue	17,510	< 50	92	193	66.5	17,610	100	< 50	92	193	66.6	0.1
Moody Street - from Orange Avenue to Ball Road	15,060	< 50	84	174	65.9	15,100	40	< 50	84	175	65.9	0.0

Source: Compiled by LSA (February 2021).
Notes: Traffic noise within 50 ft of the roadway centerline should be evaluated with site-specific information. Noise modeling performed using "Soft" setting and Southern California default traffic percentages.
ADT = average daily traffic
CNEL = Community Noise Equivalent Level
dBA = A-weighted decibels
ft = foot/feet

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Additionally, the proposed project would have heating, ventilation, and air conditioning (HVAC) equipment. For the proposed Building A (affordable senior housing) located near the existing single-family homes to the north, it is anticipated that the HVAC equipment would be located at ground level approximately 70 ft from the existing 6.5 ft high property line wall. The nearest noise-sensitive receptor is located approximately 80 ft from the proposed HVAC location, and based on a 6 dBA reduction per doubling of distance, the unmitigated noise level would be reduced by 24 dBA L_{eq} using a 5 ft reference distance. Additionally, the proposed 6 ft high wall would provide 7 dBA of noise reduction.

In order to avoid a significant impact, noise levels generated by HVAC equipment should be 50 dBA or less at the sensitive receptor. Taking into account the distance and noise barrier reduction, the baseline noise level of the HVAC equipment should be 82 dBA or less (50 dBA + 7 dBA +24 dBA = 81 dBA) when measured at a distance of 5 ft. Research of several manufacturers' (e.g., Trane) technical data revealed that that there are residential air conditioners with noise levels with an approximate range from 42.3 to 60.3 dBA L_{eq} when measured at a distance of 5 ft. Should the Applicant install HVAC equipment that has a noise level rating of 81 dBA or higher when measured at 5 ft without adequate noise shielding, a potentially significant impact would occur.

Potential impacts can therefore be addressed through Mitigation Measure NOI-1, as detailed below, which requires (1) the selection of HVAC equipment that has a noise level rating of 81 dBA or less when measured at 5 ft, or (2) the construction of a parapet wall around the HVAC equipment to reduce potential noise to levels consistent with City regulations.

With implementation of Mitigation Measure NOI-1, the noise level impacts from the proposed HVAC systems would be reduced to less than the existing quietest nighttime noise levels and, therefore, would be reduced to a less than significant level.

Long-Term On-Site Traffic Noise Impacts

The proposed on-site residential uses would be exposed to traffic noise impacts primarily from Orange Avenue and Moody Street. Although CEQA does not require an analysis of the effects of the environment on the project, the following analysis is provided to disclose noise levels experienced by future residents. The analysis is also provided to determine consistency with the City's General Plan Noise Element standards.

In order to assess the future on-site traffic noise impacts, as shown in Table 4.13.I, information from the City's Circulation Element was utilized to assess the buildout traffic noise conditions. Table CIR-1 of the Circulation Element provides daily roadway capacities by roadway type. In order to determine the buildout volume which represents the highest noise levels for each roadway segment, an average of the daily capacity associated with Levels of Service (LOS) C and D was utilized as that represents the condition where the most traffic is flowing the fastest.

Table 4.13.I: Future Buildout Traffic Noise Level Contours

Roadway Segment	ADT[1]	Centerline to 70 dBA CNEL (ft)	Centerline to 65 dBA CNEL (ft)	Centerline to 60 dBA CNEL (ft)	CNEL (dBA) 50 ft from Centerline of Outermost Lane
Orange Avenue - from Moody Street to Grindlay Street	21,250	< 50	104	219	67.4
Moody Street - from Lincoln Avenue to Orange Avenue	31,900	66	134	286	69.1

Source: Compiled by LSA (February 2021).

[1] Average of the daily capacity for each roadway segment associated with LOS C and D, as provided in Table CIR-1 of the Cypress General Plan Circulation Element.

ADT = average daily traffic
CNEL = Community Noise Equivalent Level
dBA = A-weighted decibels
ft = foot/feet
LOS = level of service

LOS C represents stable operating conditions. Occasionally, drivers may have to wait through more than one red signal indication, and backups may develop behind turning vehicles. Most drivers feel somewhat restricted, but not objectionably so. LOS D encompasses a zone of increasing restriction approaching instability at the intersection. Delays to approaching vehicles may be substantial during short peaks within the peak period; however, enough cycles with lower demand occur to permit periodic clearance of developing queues, thus preventing excessive backups.

Orange Avenue is classified as a four-lane undivided secondary arterial with an LOS C/D volume of 21,250 while Moody Street is classified as a four-lane divided primary arterial with an LOS C/D volume of 31,900.

In order to provide the future traffic noise levels at the façade of the residences on the project site, the following equation is used to attenuate for distance:

$$CNEL\ (at\ distance\ X) = CNEL\ (at\ 50\ feet) - 15 * \log_{10}\left(\frac{X}{50}\right)$$

In general, this equation shows that doubling the distance would decrease noise levels by 4.5 dBA while halving the distance would increase noise levels by 4.5 dBA.

Based on the *Conceptual Site Plan* by Bassenian Lagoni Architects (March 2021), on-site exterior traffic noise levels under buildout conditions were calculated and are presented in Table 4.13.J.

Table 4.13.J: Future Buildout Traffic Noise Level Contours

Roadway	Receptor Location	CNEL (dBA) 50 ft from Centerline of Outermost Lane	Distance from Centerline of Outermost Lane to Receptor (ft)	CNEL (dBA) at Receptor Location
Orange Avenue	Buildings 5, 6, 7, and 8	67.4	40	68.9
	Building B		40	68.9
Moody Street	Buildings 1 and 5	69.1	50	69.1
	Building 4	69.1	85	65.6

Source: Compiled by LSA (February 2021).
ADT = average daily traffic
CNEL = Community Noise Equivalent Level
dBA = A-weighted decibels
ft = foot/feet

As shown above in Table 4.13.J, exterior noise levels from traffic sources are projected to be 65.6 to 69.1 dBA CNEL. As stated above, only exterior patios and balconies with a depth of 6 ft or greater are considered noise-sensitive locations by the City's Noise Element, and the proposed project only has patios and balconies that are less than 6 ft in depth; therefore, exterior noise impacts would not exceed the City's standards. For the other modeled locations, traffic noise levels are projected to be less than the 60 dBA CNEL; therefore, exterior traffic noise levels would remain below the City's exterior noise level standards for transportation noise. Based on this, the long-term on-site traffic noise impacts would be less than significant. No mitigation is required.

Cumulative operational noise impacts could occur as a result of increased traffic volumes on local roadways due to future growth in the project area. Cumulative traffic noise impacts are based on the difference between existing traffic volumes and future traffic volumes after build out of the proposed project and in combination with related projects currently being proposed or built in the vicinity of the project site. An increase of 3 dBA CNEL at any roadway location is considered a significant impact. As shown in Table 4.13.H, project-related traffic would have mostly small (0.1 dBA or less) noise level increases along roadway segments in the project vicinity for the Existing and Existing Plus Project scenarios. Because none of the roadway segments in the vicinity of the project site are expected to experience a noise level increase greater than 3 dBA CNEL, the proposed project would not contribute substantially to cumulative roadway noise impacts and would have a less than cumulatively considerable impact.

Long-Term On-Site Stationary Noise Impacts

The proposed on-site residential uses would be exposed to noise impacts associated with the existing church to the east. Based on the results of the long-term noise monitoring presented in Table 4.13.E, noise level impacts from parking lot activities from the church to the east have the potential to approach 62 dBA L_{eq} during daytime hours. The existing church in not expected to have regular operations during nighttime hours.

Taking into account the proposed 6 ft high wall along the project site's eastern property line, parking lot activities would be reduced by approximately 7 dBA as shown in Appendix H. The reduction

provided by the property line walls would reduce on-site noise levels to below the City's exterior daytime noise level standard resulting in a less than significant impact.

Long-Term On-Site Interior Traffic Noise Impacts

As presented above, based on the future on-site traffic noise impacts, the exterior noise levels at the project site are expected to approach 68.9 to 69.1 dBA CNEL at the southern and western façades of the senior housing buildings that are 40 to 50 ft from roadways. Therefore, a reduction of 24.1 dBA is necessary to achieve the 45 dBA CNEL interior noise standard. For the units at Building 4, which are proposed to be approximately 85 ft from Moody Street, exterior traffic noise levels are expected to approach 65.6 dBA CNEL, thus a reduction of 20.6 dBA is necessary to achieve the 45 dBA CNEL interior noise standard.

The following analysis is based on a windows and doors closed condition, which requires mechanical ventilation (e.g., air conditioning) for all residential units so that windows and doors can remain closed for a prolonged period of time to maintain the interior noise standard of 45 dBA CNEL. INSUL, a software program for predicting interior noise environments from wall construction and window selections, was used to assess a standard exterior-to-interior noise level reduction for the proposed project. The assumed specifications for the proposed wall assembly are as follows:

- 7/8-inch stucco exterior
- 2-inch by 6-inch wood studs, 24 inches off center, filled with a minimum of 3.5-inch thick fiberglass insulation
- Single layer of 5/8-inch Type-X gypsum board
- Champion Series 7100 Vinyl Windows, STC-28 (sound transmission class rating), making up approximately 1/3 of the wall assembly area. (Note that windows with the same STC ratings from other window manufacturers would provide similar noise reduction.)

It is expected that the above assembly would provide an overall noise reduction of approximately 27 dBA CNEL. With a windows closed condition, interior noise levels at the sensitive rooms of the senior housing buildings would be approximately 42.1 dBA CNEL (i.e., 69.1 dBA – 27 dBA = 42.1 dBA), which is below the 45 dBA CNEL interior noise standard with windows closed for noise-sensitive land uses. Additionally, with a windows closed condition, interior noise levels at the sensitive rooms of Building 4 would be approximately 38.6 dBA CNEL (i.e., 65.6 dBA – 27 dBA = 38.6 dBA), which is also below the 45 dBA CNEL interior noise standard with windows closed for noise-sensitive land uses. If the assumed specifications for the proposed wall assembly are not followed, a potentially significant impact could occur.

Once final architectural plans are available, in order to confirm the minimum amount of exterior to interior noise reduction is achieved, a memorandum, as required as part of Mitigation Measure NOI-2, as provided below, shall be prepared to confirm that the final architectural details are consistent with the assumptions made above.

With implementation of Mitigation Measure NOI-2, the proposed project would comply with interior noise standards and a less than significant impact would occur.

Significance Prior to Mitigation: Potentially Significant Impact.

Standard Condition:

In addition to compliance with the construction hours specified in the City's Municipal Code, the following Standard Condition NOI-1 would reduce construction noise to the extent feasible and reasonable.

Standard Condition NOI-1 **Construction Noise and Vibration.** Prior to issuance of building permits, the City of Cypress (City) Director of Community Development Department, or designee, shall verify that grading and construction plans include the following requirements:

- Ensure that the greatest distance between noise sources and sensitive receptors during construction activities has been achieved.
- Construction equipment, fixed or mobile, shall be equipped with properly operating and maintained noise mufflers consistent with manufacturers' standards.
- Construction staging areas shall be located away from off-site sensitive uses during the later phases of project development.
- The construction contractor shall place all stationary construction equipment so that emitted noise is directed away from sensitive receptors nearest the project site whenever feasible.
- The construction contractor shall use on-site electrical sources to power equipment rather than diesel generators where feasible.
- All residential units located within 300 feet (ft) of the construction site shall be sent a notice regarding the construction schedule. A sign, legible at a distance of 50 ft, shall also be posted at the construction site. All notices and the signs shall indicate the dates and duration of construction activities, as well as provide a telephone number for the "noise disturbance coordinator."
- A "noise disturbance coordinator" shall be established. The disturbance coordinator shall be responsible for responding to any local complaints about construction noise. The disturbance

coordinator shall determine the cause of the noise complaint (e.g., starting too early, bad muffler, etc.) and shall be required to implement reasonable measures to reduce noise levels. All notices that are sent to residential units within 300 ft of the construction site and all signs posted at the construction site shall list the telephone number for the disturbance coordinator.

Mitigation Measures:

The following mitigation measures are required to reduce short-term and long-term noise impacts:

Mitigation Measure NOI-1 **HVAC Equipment.** Prior to issuance of construction permits, the City of Cypress (City) Director of Community Development, or designee, shall verify that that the approved plans indicate that mechanical equipment (e.g., heating, ventilation, and air conditioning [HVAC]) shall have a sound rating of less than 70.7 A-weighted decibels (dBA) when measured at 5 feet (ft), or shall be structurally insulated to assure compliance with the City Noise Ordinance.

Mitigation Measure NOI-2 **Final Acoustical Memorandum**. Prior to issuance of any certificates of occupancy, the project Applicant shall submit a Final Acoustical Memorandum, prepared by a qualified acoustical consultant, to the City of Cypress. The City Building Official, or designee, shall verify that the Final Acoustical Memorandum demonstrates that all units with exterior façades, including all bedrooms, living areas, bathrooms, toilets, closets, and corridors, comply with the City's interior noise standard (45 dBA Community Noise Equivalent Level [CNEL]).

b. Would the project result in generation of excessive groundborne vibration or groundborne noise levels?

Less Than Significant Impact. Construction activities can generate varying degrees of ground vibration, depending on the equipment and methods used. The operation of construction equipment generates vibrations that spread through the ground and diminish in amplitude with distance from the source. The effect on buildings located in the vicinity of the construction site often varies depending on soil type, ground strata, and construction characteristics of the receptor buildings. The results from vibration can range from no perceptible effects at the lowest vibration levels to low rumbling sounds and perceptible vibration at moderate levels, to slight damage at the highest levels. Ground-borne vibration from construction activities rarely reaches the levels that damage structures. As described above, the FTA has published standard vibration velocities for construction equipment operations. Table 4.13.K lists the vibration source amplitudes for construction equipment.

Table 4.13.K: Vibration Source Amplitudes for Construction Equipment

Equipment	Reference PPV/L_V at 25 ft	
	PPV (in/sec)	L_V (VdB)[1]
Pile Driver (Impact), Typical	0.644	104
Pile Driver (Sonic), Typical	0.170	93
Vibratory Roller	0.210	94
Hoe Ram	0.089	87
Large Bulldozer[2]	**0.089**	**87**
Caisson Drilling	0.089	87
Loaded Trucks	**0.076**	**86**
Jackhammer	**0.035**	**79**
Small Bulldozer	**0.003**	**58**

Source: FTA. *Transit Noise and Vibration Impact Assessment Manual* (2018).

[1] RMS vibration velocity in decibels (VdB) is 1 µin/sec.

[2] Equipment shown in **bold** is expected to be used on site.

µin/sec = micro-inches per second
ft = foot/feet
FTA = Federal Transit Administration
inch/sec = inches per second
LV = velocity in decibels
PPV = peak particle velocity
RMS = root-mean-square
VdB = vibration velocity decibels

Table 4.13.K shows the PPV values at 25 ft from the construction vibration source. Bulldozers and other heavy-tracked construction equipment (except for pile drivers and vibratory rollers) generate approximately 0.089 in/sec PPV of ground-borne vibration when measured at 25 ft, based on the FTA Manual. The greatest levels of vibration are anticipated to occur during the site preparation phase, which is expected to use a bulldozer and a loaded truck. All other phases are expected to result in lower vibration levels. The distance to the nearest buildings for vibration impact analysis is measured between the nearest off-site buildings and the project site boundary (assuming the construction equipment would be used at or near the project site boundary) because vibration impacts occur normally within the buildings. The formula for vibration transmission is provided below.

$$PPV_{equip} = PPV_{ref} \times (25/D)^{1.5}$$

The closest buildings to the project site are the existing single-family homes to the north, approximately 20 ft from the edge of construction, which have a PPV damage threshold of 0.2 inch/sec. Based on the reference data provided in the Table 4.13.K, vibration impacts created by heavy construction activities associated with the proposed project would approach 0.124 inch/sec at a distance of 20 ft.

In addition to standard construction activities, the proposed project would also include jackhammering along the project site's southern boundary. The nearest residences south of the project site are approximately 100 ft away on the opposite side of Orange Avenue. Based on the reference data provided in the Table 4.13.K, vibration impacts created by jackhammering activities associated with the proposed project would approach 0.004 inch/sec at a distance of 100 ft.

The level for both scenarios would not exceed the 0.2 PPV inch/sec threshold at which there is virtually no risk resulting in architectural damage, and therefore, construction vibration impacts would be less than significant.

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

Less Than Significant Impact. The project site is located 1.75 miles north of the Joint Forces Training Base (JFTB) Los Alamitos. According to the *Land Use Plan for Joint Forces Training Base Los Alamitos* (Orange County Airport Land Use Commission 2016), the project site is not within the 60 dBA CNEL or 65 dBA CNEL noise contours for JFTB Los Alamitos and therefore, less than significant noise impacts related to airports are anticipated, and no mitigation is required.

4.14 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)?	☐	☐	☒	☐
b) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?	☐	☐	☐	☒

Impact Analysis

a) Would the project 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)?

Less Than Significant Impact. The proposed project would include the development of 50 affordable condominium units and 48 market-rate condominium units, for a total of 98 residential dwelling units. Occupancy of all 98 units would be restricted to households with at least one member 62 years of age or older. The development of these units may slightly increase the City of Cypress' (City) residential population. According to the California Department of Finance's City/County Population and Housing Estimates, the City had an average household size of 2.99 persons per household as of January 2021. Based on this average household size (2.99 persons per household) and the new residential dwelling units proposed as part of the project (98 units), the project is estimated to add approximately 293[43] new residents with implementation of the proposed project. The addition of 293 new residents would represent approximately 0.61 percent of the City's 2010 population of 47,802 (U.S. Census Bureau 2010), 0.6 percent of the City's 2021 population of 48,531 (California Department of Finance 2021), and 0.57 percent of the City's 2045 population estimate of 51,300 (SCAG 2020).[44] According to Pew Research analysis of 2017 ACS data[45] regarding the distribution of people across household sizes among different age groups for the entire United States, only approximately 21 percent of all residents between the ages of 65 and 74 live in households with 3 or more persons and approximately 19 percent of all residents age 75 or over live

[43] 98 dwelling units x 2.99 persons per household = 293.02 (rounded to 293) new residents.

[44] Southern California Association of Governments (SCAG). 2020a. 2020–2045 Regional Transportation Plan/ Sustainable Communities Strategy (RTP/SCS) Final, Current Context Demographics and Growth Forecast. Technical Report, adopted September 3, 2020. Website: https://scag.ca.gov/sites/main/files/file-attachments/0903fconnectsocal_demographics-and-growth-forecast.pdf?1606001579 (accessed June 16, 2021)

[45] Pew Research Center. 2019. The number of people in the average U.S. household is going up for the first time in over 160 years. Website: https://www.pewresearch.org/fact-tank/2019/10/01/the-number-of-people-in-the-average-u-s-household-is-going-up-for-the-first-time-in-over-160-years/ (accessed June 27, 2021).

in households with 3 or more persons. Therefore, it is likely that applying the City's average household size of nearly 3 persons per household conservatively estimates the population growth associated with the proposed project.

The proposed project will include the demolition and removal of existing driveways, parking areas, structures, landscaping and soil stockpiles at the project site to allow for the development of 98 attached condominium dwelling units in ten separate buildings at a maximum density of 15.5 dwelling units per acre. This density would comply with the applicable development standards included in the City's Zoning Ordinance. The population increase that would result from the implementation of the proposed project is not considered significant because it would only comprise a small portion (less than 1 percent) of the City's total population, does not represent a substantial increase in population, and is within the Southern California Association of Governments' (SCAG) growth projections.

In addition, as required by the California State Housing Element law, SCAG has determined the projected housing need for its region for the 2021–2029 Housing Element Cycle as part of the Regional Housing Needs Assessment (RHNA) process, and has allocated this housing need to each jurisdiction by income category. The RHNA allocation represents the minimum number of housing units for which each jurisdiction is required to provide "adequate sites" through zoning. Table 4.14.A provides information about the City's RHNA allocation for the 2021–2029 Housing Element Cycle, including the percentages of area median income that correspond with each income category.

Further, it should be noted that SCAG's Regional Council adopted the 6th Cycle RHNA methodology on March 5, 2020. With the adoption of SCAG's Connect SoCal plan on September 3, 2020, SCAG distributed the draft RHNA Allocation to local jurisdictions on September 4, 2020.[46] According to the RHNA Final Allocations approved by the HCD on March 22, 2021 and modified on June 3, 2021, the City of Cypress has a total estimated RHNA of 3,936 units.[47] Therefore, the total RHNA for the City of Cypress is nearly five times larger than the projected housing growth included in the Connect SoCal plan growth forecasts that indicate the number of households in the City is projected to increase by 800 units between 2016 and 2045.[48]

As shown in Table 4.14.A, the City is required to demonstrate that it is able to accommodate the construction of a total of 3,936 new housing units during the 2021–2029 Housing Element Cycle. Of these units, the majority (1,506 units) should be affordable to above moderate income-level households.

[46] SCAG. 2021. Regional Housing Needs Assessment (RHNA). Website: https://scag.ca.gov/rhna (accessed June 16, 2021).

[47] SCAG. 2021b. SCAG 6th Cycle Final RHNA Allocation. Website: https://scag.ca.gov/sites/main/files/file-attachments/6th-cycle-rhna-final-allocation-plan.pdf?1623447417 (accessed June 16, 2021).

[48] SCAG. 2020c. Current Context, Demographics and Growth Forecast Technical Report: Adopted on September 3, 2020. Website: https://scag.ca.gov/sites/main/files/file-attachments/0903fconnectsocal_demographics-and-growth-forecast.pdf?1606001579 (accessed June 16, 2021).

Table 4.14.A: City of Cypress Regional Housing Need Allocation (2021–2029)

Income Level	Percent of Area MFI	No. of Units
Very Low	0–50%	1,150
Low	51–80%	657
Moderate	81–120%	623
Above Moderate	>120%	1,506
	TOTAL	**3,936**

Source: City of Cypress 2021–2029 Housing Element Update Study Session. Website: https://www.cypressca.org/home/showpublisheddocument?id=10071 (accessed June 16, 2021).
MFI = median family income

Both the market-rate and affordable housing units (a total of 98 dwelling units) included in the proposed project would help the City meet the need for affordable and above moderate income units included in the 6th Cycle RHNA allocation. Because there is a need for additional housing over SCAG projections and the City is required by State law (Government Code Section 65580, et seq.) to plan for its fair share of the projected housing construction needs in the region, the population growth resulting from the proposed project would not constitute substantial unplanned population growth in the area.

Additionally, the project site is bordered on all sides by urban uses, including single-family residential, institutional, and commercial development. The project does not propose to expand any surrounding utility infrastructure in the vicinity of the project site. Therefore, the proposed project would not directly or indirectly induce population growth through the extension of roads or other infrastructure. Accordingly, potential impacts related to substantial inducement of population growth, either directly or indirectly, would be less than significant, and no mitigation is required.

b) Would the project displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?

No Impact. In its existing condition, the project site is developed with the Cypress School District's administrative and maintenance facilities. No housing currently exists on the project site, and implementation of the proposed project would not displace any housing or associated populations. Instead, the proposed project intends to provide the City with an additional 98 housing units, which, as discussed in Response 4.14(a), would add approximately 293 residents to the City's population. Therefore, there would be no impact related to the displacement of substantial numbers of existing people or housing. No mitigation is required.

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4.15 PUBLIC SERVICES

	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project:				
a) 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?	☐	☐	☒	☐
ii. Police protection?	☐	☐	☒	☐
iii. Schools?	☐	☐	☒	☐
iv. Parks?	☐	☐	☒	☐
v. Other public facilities?	☐	☐	☒	☐

Impact Analysis

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 *fire protection*?

Less Than Significant Impact. The Orange County Fire Authority (OCFA) is a Joint Powers Authority that serves the City of Cypress (City), and is responsible for reducing the loss of lives and property from fire, medical, and environmental emergencies. The OCFA is a regional fire service agency that provides fire suppression, emergency medical services, hazardous materials response, wildland firefighting, technical rescue, and airport rescue firefighting services, and a variety of other public services to its service area of 1,984,758 residents that includes 23 cities in Orange County (County) and all unincorporated areas in the County. Currently, OCFA has a total of 79 stations located throughout Orange County.[49]

The City of Cypress is located within Operations Division 7, which also serves the cities of Buena Park, La Palma, and Stanton along with portions of several unincorporated communities.[50] As a regional fire agency, OCFA engages in service agreements with other local and regional fire agencies.

OCFA Fire Station No. 17, located at 4991 Cerritos Avenue in Cypress, is approximately 1 mile south of the project site and would be designated as the "first-in" station that would be the first to serve

[49] Orange County Fire Authority (OCFA). 2021. Fiscal Year 2019–2020 Adopted Budget. Website: https://www.ocfa.org/Uploads/Transparency/OCFA%202019-2020%20Adopted%20Budget.pdf (accessed June 23, 2021)

[50] OCFA. 2020. Operations Division 7. Website: https://www.ocfa.org/AboutUs/Departments/OperationsDirectory/Division7.aspx (accessed June 24, 2021).

the project in the event of an emergency. Fire Station No. 17 is staffed by six captains, six engineers, and 12 firefighters and is equipped with a fire truck and paramedic engine. Fire Station No. 17 was substantially rebuilt and expanded in 2012 with added capacity to accommodate the existing and future fire protection and paramedic needs in the service area. In 2020, the City of Cypress generated 3,099 calls for service.[51]

"Second call" stations are fire stations that support the "first-in" station. Fire Station Nos. 13 and 63 would be designated as the "second call" stations to support Fire Station No. 17. Fire Station No. 13, located at 7822 Walker Street in La Palma, is approximately 2 miles northeast of the project site and is staffed by three captains, three engineers, and six firefighters. Fire Station No. 63, located at 9120 Holder Street in Buena Park, is approximately 1.4 miles northeast of the project site and is staffed by three captains, three apparatus engineers, and six firefighters. Fire Station No. 63 is equipped with a paramedic engine.

According to the City's General Plan Safety Element, it is the OCFA's goal to have the first responding company for a fire call to reach the emergency scene within 8 minutes and paramedics to reach the scene within 5 minutes, at least 90 percent of the time. In Fiscal Year 2019–2020, OCFA responded to emergency calls within 9 minutes and 15 seconds 90 percent of the time across all service areas.[52] Although the ratio of firefighters per 10,000 residents increased slightly in the last two fiscal years from 5.39 to 5.86 firefighters for every 10,000 residents, during the past 10 year time frame emergency call load has increased by 83 percent, due in part to the City of Santa Ana joining the OCFA in April of 2012 and the City of Garden Grove joining in August 2019.[53] As a residential project, the proposed project would not be anticipated to result in an excessive increase in calls for service. In addition, as discussed in Section 4.17, Transportation, the proposed project would not result in inadequate emergency access.

Further, the City's Safety Element (2001) states that separation and setback requirements, adopted in the City's Municipal Code, assist in minimizing the risk of urban fire spread. The proposed project would be consistent with the City's setback requirements. In addition, as discussed in further detail in Section 4.20, Wildfire, the project site is not located within a Very High Fire Hazard Severity Zone (VHFHSZ). Further, the City's Safety Element (2001) states that separation and setback requirements, adopted in the City's Municipal Code, assist in minimizing the risk of urban fire spread.

The proposed project would adhere to the development standards described in the City's Municipal Code related to public safety. The proposed project would also be designed to comply with all OCFA requirements, including providing adequate fire flow/structure protection to the project site and providing adequate access for emergency vehicles. Additionally, the proposed project would comply with current editions of the California Building Code, California Fire Code, and related codes.

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51 OCFA. Station Statistics. Website: https://www.ocfa.org/Uploads/Transparency/OCFA%20Annual%20Report%202020.pdf (accessed June 24, 2021).

52 OCFA. Fiscal Year 2020/2021 Adopted Budget. Website: https://ocfa.org/Uploads/Transparency/OCFA%202020-2021%20Adopted%20Budget.pdf (accessed June 24, 2021).

53 Ibid.

As stated in Section 4.14, Population and Housing, the proposed project would not induce substantial population growth in the City and therefore would be able to be served by Fire Station No. 17. Written correspondence with the OCFA indicated that OCFA uses a fair share approach to mitigate fire service response impacts and facility/equipment needs. As described in correspondence from OCFA, the Applicant is requested to enter a Secured Fire Protection Agreement. The Secured Fire Protection Agreement with the OCFA would ensure adequate service to the project site. The OCFA would review and comment on the site plan prior to approval. As part of the review, the OCFA would impose standard conditions of approval, which would ensure all impacts regarding fire protection would be less than significant. Therefore, the proposed project would not require the construction of new fire protection facilities or the upgrade of existing facilities, which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times, or other performance objectives for fire protection. Therefore, impacts associated with fire protection services would be less than significant, and no mitigation is required.

b) 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 *police protection*?

Less Than Significant Impact. The Cypress Police Department (CPD) provides police protection services throughout the City. The CPD has one station located within the Cypress Civic Center at 5275 Orange Avenue, approximately 0.3 mile east of the project site. Correspondence received by the CPD dated June 24, 2021, stated that the CPD is currently undergoing a complete interior renovation and seismic retrofit, with an expected completion in fall 2021. During construction, most police operations are being conducted from the Cypress Senior Center, which is located at 9031 Grindlay Street in Cypress.[54] Management and supervision of the CPD is provided by 1 chief, 3 commanders, 1 civilian manager, 10 sergeants, and 1 civilian supervisor. Of the CPD's 55 sworn personnel, 41 are dedicated to the delivery of patrol services. In addition to the 55 officers, the department is supported 23 civilian employees and numerous volunteers.[55] The officer-to-resident ratio in 2019 was 1.0 CPD officer per 1,000 residents.

The services provided by the department include a detective bureau, canine teams, narcotics team, vice and intelligence, motorcycle officers, Personnel & Training, Positive Actions thru Character Education (P.A.C.E.) program, S.W.A.T. and a Lead Patrol Officer program. In addition, the CPD has established Community Policing, or Cypress Policing, as the philosophy for providing public safety services.

Police dispatch services for the City of Cypress are provided by the West Cities Police Communications Center, also known as West-Comm. West-Comm is a consolidated police dispatch

54 Cypress Police Department (CPD). 2021. Response to Police Protection Questionnaire. Received June 24, 2021.

55 City of Cypress. Cypress Police Department Overview. Website: https://www.cypressca.org/government/departments/police/inside-cypress-pd/the-community-we-serve#overview (accessed June 24, 2021).

center, formed by a Joint Powers Authority between the cities of Cypress, Los Alamitos and Seal Beach. Located at the Seal Beach Police Department, West-Comm serves a combined population of approximately 90,000 and handles approximately 100,000 calls for service each year. In 2020, the CPD responded to 24,929 calls for service, including 12,215 emergency calls and 12,714 officer-initiated calls.[56] This volume of calls for 2020 represents an overall 23 percent decrease in calls for service throughout the City compared to 2019.

As discussed in Response 4.13(a) in Section 4.13, Population and Housing, the proposed project is estimated to increase the City's population by 293 residents. When considered with the existing population, the project-related population increase would have no impact on the CPD's ratio of police officers per 1,000 residents. Therefore, the increase in population associated with the proposed project would be minimal compared to the number of police officers currently employed by the City, and would not trigger the need for new or physically altered police facilities.

Correspondence received from the CPD (provided in Appendix I) has also confirmed that current staffing and resources are capable of responding efficiently to the slight increase expected in call volumes from the proposed project. Further, the proposed project would include adequate lighting throughout all residential structures on the project site, and would implement clearly visible addresses/unit numbering, both of which are crime prevention design features requested by the CPD for the proposed project in its correspondence. Although the proposed project would incrementally contribute to demand for additional police protection services, impacts to police services would be less than significant, and no mitigation is required.

c) 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 *schools*?

Less Than Significant Impact. The provision of education and school facilities in the City is the responsibility of the Cypress School District (District), which serves the City's kindergarten through sixth-grade students, and the Anaheim Union High School District (AUHSD), which serves the City's junior high and high school students (grades 7 through 12).

The District currently operates six elementary schools; five of these elementary schools are located within the City of Cypress and one is located in the City of La Palma. The District's 2020–2021 enrollment was 3,540.[57] Additionally, all of the District schools offer on-site privately owned and operated childcare and preschool services.

[56] City of Cypress. Cypress 10-Year Calls for Service Trend. 2020. Website: https://www.cypressca.org/home/showdocument?id=10173 (accessed June 24, 2021).

[57] California Department of Education. DataQuest. Enrollment Data 2020–2021. Website: https://dq.cde.ca.gov/dataquest/ (accessed June 24, 2021).

The AUHSD encompasses 46 square miles and has schools in the cities of Anaheim, Cypress, Buena Park, La Palma, and Stanton. AUHSD is composed of eight high schools, eight junior high schools, and four specialized campuses.

The project site is within the attendance boundaries of the following schools: Clara J. King Elementary (0.8 mile north of the site), Lexington Junior High (0.7 mile west of the site), and Cypress High School (1.3 mile southeast of the site).

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. As a senior residential community, the proposed project would not include a school-age population. Nevertheless, the Applicant would be required to pay school fees to reduce any impacts of new residential development on school services as provided in Section 65995 of the California Government Code (refer to Regulatory Compliance Measure PS-1, below). The fees are collected by the AUHSD and shared equally with the District.

Pursuant to the provisions of Government Code Section 65996, a project's impact on school facilities is fully mitigated through payment of the requisite school facility development fees current at the time a building permit is issued. Therefore, with payment of the required fees, as outlined in Regulatory Compliance Measure PS-1, potential impacts to school services and facilities associated with implementation of the proposed project would be less than significant. No mitigation is required.

Regulatory Compliance Measure PS-1 **Payment of School Fees.** Prior to issuance of any building permits, the Applicant shall provide proof to the Director of the City of Cypress Community Development Department, or designee, that payment of school fees to the Anaheim Union High School District has been made in compliance with Section 65995 of the California Government Code.

d) 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 *parks*?

Less Than Significant Impact. Please refer to Section 4.16, Recreation, of this Draft IS/MND for a detailed discussion related to the proposed project's potential impacts to parks and recreational facilities. As discussed previously in Section 4.14, Population and Housing, the proposed project could add approximately 293 new residents to the City's population, which could incrementally increase usage of City parks and recreational facilities. As described in Section 4.16, the addition of approximately 293 new senior residents would result in limited use of existing recreational facilities in the project vicinity. As a senior community, the increased demand for park facilities, such as playgrounds, tot lots, and soccer and baseball fields, is expected to be minimal. This minor demand

would be offset by the proposed project's community recreation areas, including a pool and spa, fire pit area, a pickleball court, a bocce ball court, 1,900 sf indoor amenity space on the first floor of Building A, and two lawn areas/flex space with adjacent seating, which would be available only to residents and their guests. In addition to providing private recreational amenities, the Applicant would be required to pay fees as identified in Regulatory Compliance Measure REC-1 (provided in Section 4.16). Therefore, because the proposed project does not require the construction or expansion of public recreation facilities and because in-lieu park fees would be paid, as described in Regulatory Compliance Measure REC-1, impacts to parks and recreation facilities would be less than significant, and no mitigation is required.

e) 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 *other public facilities*?

Less Than Significant Impact. The Cypress Senior Center, which provides a variety of services for senior residents, is located at 9031 Grindlay Street, less than 0.5 mile northeast of the project site. The Cypress Community Center, which provides regular classes and programming for local residents, is also located at 5700 Orange Avenue, approximately 0.5 mile east of the project site. The proposed project's proximity to these services would maximize the public use of these facilities and provide an opportunity for the proposed project's residents to walk to these facilities. Although the proposed project's estimated 293 residents would incrementally increase demand for use of the public facilities, the project-related population increase and accompanying demand for community services and programs at the Cypress Senior Center and the Cypress Community Center is not expected to trigger the need for new or physically altered community facilities because those facilities were designed to accommodate community classes and social events throughout the year. In addition, local officials report that most community classes and social events scheduled for those facilities have not reached their maximum enrollment/attendance capacity. Therefore, it is reasonable to assume that the proposed project would not result in adverse physical impacts to these facilities. Impacts to other public facilities would be less than significant, and no mitigation is required.

4.16 RECREATION

		Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
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?	☐	☐	☒	☐
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?	☐	☐	☒	☐

Impact Analysis

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?

Less Than Significant Impact. The proposed project includes the construction of a 98-unit residential development on the project site. As discussed in Section 4.14, Population and Housing, the proposed project could add approximately 293 new residents to the City of Cypress' (City) population. There are no existing parks or other recreation uses immediately adjacent to the project site. However, as shown in Table 4.16.A, multiple parks and recreational facilities in the City are located within 1.5 mile of the project site.

Community parks are generally over 10 acres in size and offer a variety of recreation facilities, such as athletic fields, group picnic areas, and community centers. Neighborhood parks are smaller in size than community parks and typically range in size from 3 to 5 acres; they are often located adjacent to elementary schools and normally include picnic facilities. Mini-parks are less than 1 acre in size and are usually located near schools or new residential developments.

The nearest community park is Arnold Cypress Park, which is approximately 1.5 mile northeast of the project site. The nearest neighborhood parks are Evergreen Park, approximately 0.2 mile north of the project site, and Willow Park, approximately 0.6 west of the project site. Other neighborhood parks within 1.0 mile of the project site include Darrel Essex Park (0.8 mile southeast), Cedar Glen Park (0.8 mile south), and Veterans Park (0.8 mile southwest). Further, there are two mini parks within 1.0 mile of the project site: Rosen Acacia Park (1.0 mile east) and Damron Park (1.0 mile southeast). Based on proximity, the parks and recreational facilities listed in Table 4.16.A would adequately serve the project site; however, all parks in the City could be affected because residents can use any park or recreational facility located throughout the City.

Table 4.16.A: Parks and Recreational Facilities in the Vicinity of the Project Site

Name and Address	Distance from Project Site (miles)	Type	Size (acres)	Amenities
Arnold Cypress Park 8611 Watson Street	1.5	Community	14.6	Children's playground equipment, barbeques, picnic shelters, community rooms, multi-use court, softball fields, tennis courts, drinking fountains, and restrooms.
Evergreen Park 9300 Moody Street	0.2	Neighborhood	5.1	Children's playground equipment, basketball court, barbeques, picnic shelters, and restrooms.
Willow Park 4501 Orange Avenue	0.6	Neighborhood	2.9	Children's playground equipment, basketball court, nature facility, picnic shelters, drinking fountains, and restrooms.
Darrell Essex Park 5131 Ball Road	0.8	Neighborhood	2.5	Children's playground equipment, barbeques, picnic shelters, and drinking fountains.
Cedar Glen Park 10201 Moody Street	0.8	Neighborhood	2.5	Children's playground equipment, basketball court, barbeques, and picnic shelters.
Veterans Park 4554 Avenida Granada	0.8	Neighborhood	6.4	Children's playground equipment, basketball court, volleyball court, skate park, barbeques, picnic shelters, drinking fountains, and restrooms.
Rosen Acacia Park 5681 Newman Street	1.0	Mini	1.0	Children's playground equipment, barbeques, picnic tables, and drinking fountains.
Damron Park 5400 Myra Avenue	1.0	Mini	0.5	Children's playground equipment.

Source: City of Cypress, Facility and Park Locations (2021). Website: https://www.cypressca.org/activities/facility-park-locations (accessed June 16, 2021).

The development of the proposed project would not materially increase the use of existing park and recreational facilities such that substantial physical deterioration of those facilities would occur or be accelerated. As a senior residential community, the proposed project would generate minimal demand on park facilities such as tot lots, playgrounds, soccer fields, baseball diamonds, and basketball courts, which are designed primarily for use by children and younger adults. As a result, the proposed project would create much less demand on several types of existing recreation facilities than a typical family-oriented community.

In addition, convenience drives the level of use for recreational facilities, and because the proposed project contains on-site recreational and social amenities that are specifically designed for seniors, its residents would be more likely to use an on-site amenity as opposed to those parks in the surrounding area.

In any event, the City's Municipal Code provides assurance that impacts to recreational facilities remain less than significant by requiring every subdivider to either dedicate land, pay a park fee, or do both, for the purposes of providing park and recreational facilities (see Regulatory Compliance Measure REC-1 provided below).

As discussed above, the proposed project's demographics inherently result in limited demand for public recreation facilities, and residents of the proposed project would have access to the on-site recreational amenities described above. Therefore, the proposed project would not increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of any such facility would occur or be accelerated, and the proposed project's impact would be less than significant. The Applicant's payment of the applicable park fees described in Regulatory Compliance Measure REC-1 addresses the proposed projects incremental effect on recreational resources. No mitigation is required.

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?

Less Than Significant Impact. As discussed above under Threshold 4.16 a), the proposed project would provide various community recreation facilities that would be available only to residents and their guests. The proposed project would not include any recreational facilities that would be open to the general public. The construction of these private recreational facilities is part of the proposed project, and any potential and adverse effects associated with implementation of the proposed project's private recreational facilities have been considered throughout the analysis of this IS/MND. As discussed elsewhere in this document, all of the proposed project's significant impacts can be mitigated to less than significant levels. As discussed above under Threshold 4.16(a), the proposed project would not cause or accelerate the substantial physical deterioration of existing recreational facilities, so it would not require the construction or expansion of off-site recreational facilities.

The City of Cypress Municipal Code, Section 25-43, establishes a standard of 3.0 acres of land per 1,000 residents for park and recreational purposes, and an additional 1.5 acres of land per 1,000 residents for purposes that are made available at K-12 schools through a cooperative arrangement between the City, local school districts, and local park and recreation districts. This arrangement results in a total of 4.5 acres of land per 1,000 residents. The proposed project would comply with the applicable provisions in Chapter 25, Article 6, Park and Recreational Facilities, of the City's Municipal Code (refer to Regulatory Compliance Measure REC-1), which requires the payment of an in-lieu park fee, the dedication of land for park and recreational purposes, or both, based on a standard of 3.0 acres of land for park and recreational purposes for each 1,000 residents. Additionally, at the discretion of the City Council, a percentage of the required in-lieu fees may be credited based on the amount of private open space provided within the development (Municipal Code Section 25-46, Credit for Private Open Space). If approved, the credit would be no less than 1 percent and no greater than 50 percent of the required in-lieu fee.

The addition of approximately 293 residents in Cypress could incrementally increase usage of City parks and recreational facilities. The proposed project's additional residents would require 0.88 acre of parkland based on the standard of 3.0 acres for each 1,000 residents in the City's Municipal Code Section 25-43.

The City will require the Applicant to pay fees and/or dedicate parkland as identified in Regulatory Compliance Measure REC-1. Therefore, with the payment of in-lieu park fees and/or the dedication of parkland, impacts to recreation requirements would be less than significant.

Regulatory Compliance Measure REC-1 **Dedication of Parkland and/or Payment of Park Fees.** Prior to issuance of any building permits, the Applicant shall provide proof of compliance with the applicable provisions of Chapter 25 (Subdivisions), Article 6, Park and Recreational Facilities, of the City of Cypress (City) Municipal Code, or other fees as determined by the City, to the Director of the City Community Development Department, or designee.

In addition to providing on-site recreational amenities, the Applicant would pay applicable park fees as described in Regulatory Compliance Measure REC-1. Therefore, the proposed project would not include recreational facilities or require the construction or expansion of recreational facilities, which would have an adverse physical effect on the environment. Potential impacts would be less than significant, and no mitigation is required.

4.17 TRANSPORTATION

	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 transit, roadway, bicycle and pedestrian facilities?	☐	☐	☒	☐
b) Conflict or be inconsistent with CEQA Guidelines §15064.3, subdivision (b)?	☐	☐	☒	☐
c) Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?	☐	☐	☒	☐
d) Result in inadequate emergency access?	☐	☐	☒	☐

Discussion

The following section describes the potential transportation impacts related to the proposed project.

Regulatory Setting

The following is a summary of State, regional, and local regulations that apply to transportation and circulation within the project study area.

State

Senate Bill 743. On September 27, 2013, Governor Jerry Brown signed Senate Bill (SB) 743 into law and codified a process that revises the approach to determining transportation impacts and mitigation measures under CEQA. SB 743 directed the Governor's Office of Planning and Research (OPR) to administer new CEQA guidance for jurisdictions by replacing the focus on automobile vehicle delay and level of service (LOS) or other similar measures of vehicular capacity or traffic congestion in the transportation impact analysis with vehicle miles traveled (VMT). This change shifts the focus of the transportation impact analysis from measuring impacts to drivers, such as the amount of delay and LOS at an intersection, to measuring the impact of driving on the local, regional, and statewide circulation system and the environment. This shift in focus is expected to better align the transportation impact analysis with the statewide goals related to reducing greenhouse gas (GHG) emissions, encouraging infill development, and promoting public health through active transportation. As a result of SB 743, the California Office of Administrative Law cleared the revised *State CEQA Guidelines* for use on December 28, 2018, with a statewide implementation date of July 1, 2020. The OPR *Technical Advisory on Evaluating Transportation Impacts in CEQA* (OPR Technical Advisory) (2018) provides a resource for agencies to use at their discretion.

Regional

Orange County Transportation Authority. The Orange County Transportation Authority (OCTA) is an agency that serves as transportation planner and coordinator, designer, builder, and operator for the 34 cities and unincorporated areas of Orange County. As a State-designated regional transportation planning agency for the County of Orange (County), OCTA is tasked with the development, conformance monitoring, and biennial updating of Orange County's Congestion Management Program. OCTA is responsible for the funding of transportation projects, including highway, transit, local road, bicycle, pedestrian, and trail projects.

Local

The City of Cypress does not have formal Traffic Impact Analysis (TIA) guidelines. However, based on discussion with the City Traffic Engineer, a TIA is generally required if a project generates 50 or more net new vehicle trips in the a.m. or p.m. peak hour, including an analysis for any intersection where a project adds 25 or more net new peak-hour trips.

Environmental Setting

Existing Circulation System

Moody Street is a four-lane, north-south roadway west of the project site. According to the City of Cypress General Plan Circulation Element (2000), Moody Street is classified as a Primary Arterial. The posted speed limit is 40 miles per hour (mph). On-street bicycle lanes (Class II) and sidewalks are provided on both sides of the street. On-street parking is not permitted.

Orange Avenue is a four-lane, east-west roadway south of the project site. According to the City of Cypress General Plan Circulation Element, Orange Avenue is classified as a Secondary Arterial. The posted speed limit is 40 mph. In the project vicinity, on-street bicycle lanes (Class II) and sidewalks are provided on both sides of the street. On-street parking is not permitted.

Impact Analysis

a) Would the project conflict with a program, plan, ordinance, or policy addressing the circulation system, including transit, roadway, bicycle, and pedestrian facilities?

Less Than Significant Impact. In order to assess the impact of the proposed project on the surrounding circulation system, LSA calculated the project-related trips using trip rates from the Institute of Transportation Engineers' (ITE) *Trip Generation Manual*, 10th Edition (2017) for Senior Adult Housing (Land Use Code 252). Table 4.17.A, below, presents the trip generation for the proposed project.

As Table 4.17.A shows, the proposed project of 98 senior housing units would generate 363 daily trips, including 20 trips (7 inbound and 13 outbound) in the a.m. peak hour and 26 trips (14 inbound and 12 outbound) in the p.m. peak hour.

Table 4.17.A: Proposed Project Trip Generation

Land Use	Size	Unit	ADT	AM Peak Hour			PM Peak Hour		
				In	Out	Total	In	Out	Total
Trip Rates[1]									
Senior Housing		DU	3.70	0.07	0.13	0.20	0.14	0.12	0.26
Office		TSF	9.74	1.00	0.16	1.16	0.18	0.97	1.15
Proposed Project Trip Generation									
Senior Housing (Market-Rate)	48	DU	178	3	6	10	7	6	13
Senior Housing (Affordable)	50	DU	185	4	7	10	7	6	13
Total	**98**	**DU**	**363**	**7**	**13**	**20**	**14**	**12**	**26**
Existing Trip Generation									
Office	22.187	TSF	216	22	4	26	4	22	26
Net Trips (Proposed Project - Existing)			**147**	**(15)**	**9**	**(6)**	**10**	**(10)**	**0**

[1] Trip rates from the Institute of Transportation Engineers' (ITE) *Trip Generation* Manual, 10th Edition (2017).
Land Use Code (252) - Senior Adult Housing (Attached)
Land Use Code (710) - General Office Building
ADT = average daily trips
DU = dwelling unit
TSF = thousand square feet

Additionally, Table 4.17.A illustrates the existing trip generation for the proposed project site that is currently occupied by 22,187 sf of office use. Using trip rates from the ITE's *Trip Generation Manual* for General Office Building (Land Use Code 710), the proposed project site currently generates 216 daily trips, including 26 trips in the a.m. peak hour (22 inbound and 4 outbound) and 26 trips in the p.m. peak hour (4 inbound and 22 outbound). The proposed project is anticipated to generate 147 net new daily trips, including a reduction of 6 trips in the a.m. peak hour (15 fewer inbound and 9 additional outbound) and zero trips in the p.m. peak hour (10 additional inbound and 10 fewer outbound), compared to the existing office use.

Since the proposed project is likely to generate fewer than 50 net new peak-hour trips and fewer than 25 net new peak-hour trips at any single intersection, the implementation of the proposed project is not anticipated to result in any operational or LOS deficiencies; therefore, no further study is necessary.

The City's General Plan provides goals and policies to implement a balanced, functional, and efficient circulation system, and incorporate alternative modes of travel which allows for the safe movement of people and goods. The proposed project would not generate a substantial number of daily or peak-hour vehicle trips to warrant modifications to any transportation facilities (e.g., vehicular, transit, bicycle, or pedestrian). Therefore, the proposed project would not conflict with the City's General Plan.

b) Would the project conflict or be inconsistent with CEQA Guidelines section 15064.3, subdivision (b)?

Less Than Significant Impact. The City requires that all CEQA-related VMT studies be conducted consistent with the State of California Governor's OPR Technical Advisory, and that screening criteria

and impact thresholds are determined on a case-by-case basis in accordance with Caltrans' February 2020 VMT-Focused Transportation Impact Study Guide (TISG).

California Public Resources Code (PRC) Section 15064.3(b)(4) states (in part) that:

> "A lead agency has discretion to choose the most appropriate methodology to evaluate a project's vehicle miles traveled, including whether to express the change in absolute terms, per capita, per household, or in any other measure."

Additionally, the OPR Technical Advisory recommends VMT screening thresholds for smaller projects. The footnote on page 12 of the OPR Technical Advisory states the following:

> "Screening Threshold for Small Projects
>
> Many local agencies have developed screening thresholds to indicate when detailed analysis is needed. Absent substantial evidence indicating that a project would generate a potentially significant level of VMT, or inconsistency with a Sustainable Communities Strategy (SCS) or general plan, projects that generate or attract fewer than 110 trips per day generally may be assumed to cause a less-than-significant transportation impact."

The OPR Technical Advisory recommends that a project generating 110 average daily trips (ADT) or less be screened out of a VMT analysis due to the presumption of a less than significant impact. This recommendation is not based on any analysis of GHG reduction, but is instead based on the potential trip generation of a project that would be categorically exempt under CEQA.

Furthermore, the OPR Technical Advisory describes that affordable residential developments are presumed to have a less than significant impact, and states the following:

> *"Lead agencies may develop their own presumption of less than significant impact for residential projects (or residential portions of mixed use projects) containing a particular amount of affordable housing, based on local circumstances and evidence."*

As mentioned before, the proposed project includes the demolition of 22,187 sf of office space and the construction of 98 senior housing (50 affordable and 48 market-rate condominium) units on site. The existing office use to be demolished generates 216 daily trips. The affordable component of the proposed project would generate 185 daily trips, and the market-rate component would generate 178 daily trips.

Based on the OPR Technical Advisory and as directed by the City, the affordable component of the proposed project is screened out from the VMT analysis. Table 4.17.B presents the net project trip generation for VMT screening analysis purposes. After taking credit for the existing office trips and excluding the trips for the affordable units, the proposed project would result in 38 fewer daily trips to and from the site, which is below the OPR Technical Advisory threshold of 110 trips per day.

Table 4.17.B: Proposed Project Trip Generation (VMT Screening Analysis)

Land Use	Size	Unit	ADT
Total Senior Housing	98	DU	363
Affordable Senior Housing	50	DU	185
Existing Office	22.187	TSF	216
Net Trips (Total Senior Housing - Affordable Senior Housing - Existing Office)			**(38)**

ADT = average daily trips
DU = dwelling unit
TSF = thousand square feet

Therefore, based on this analysis, the proposed project is not anticipated to have a significant transportation impact.

c) Would the project substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?

Less Than Significant Impact. Vehicular access to the project site would be provided via a new full-access driveway on Moody Street and a new full-access driveway on Orange Avenue. The proposed project would construct a new full-access driveway on Moody Street as the fourth leg of the currently three-legged intersection of Moody Street/Lemon Avenue. The intersection would be two-way, stop-controlled at Lemon Street and at the project driveway (Moody Street will continue to be uncontrolled). The proposed project would modify the existing concrete median along Moody Street to create a dedicated 60 ft southbound left-turn lane with a 60 ft transition for inbound left-turn project vehicles at the primary driveway along Moody Street. Based on the proposed project's anticipated trip generation and the availability of gaps in the northbound Moody Street traffic flow, a 60 ft left-turn pocket is of sufficient length to contain the left-turn vehicles accessing the site during the peak hours of traffic.

The proposed project would also provide a secondary driveway along Orange Avenue across from the driveway for the Oxford Academy parking lot. Outbound left turns at the secondary driveway along Orange Avenue would be prohibited during student drop-off/pickup periods (from 7:30 a.m. to 9:00 a.m. and from 2:00 p.m. to 3:30 p.m.) in order to reduce potential vehicular conflicts between the proposed project and Oxford Academy. The proposed project would also install appropriate No Left Turn signage with these time restrictions at the secondary project driveway on Orange Avenue.

It should be noted that the secondary project driveway would be approximately 35 ft from the western driveway of the Church of Jesus Christ of Latter-day Saints (LDS) along Orange Avenue (measured from the near side curb face of each driveway). However, the peak activities for the Church of Jesus Christ of LDS occur on the weekends and during the weekday evenings. As such, no additional left-turn restrictions are included in the project design for the secondary project driveway.

Given the low daily and peak-hour trip generation for the proposed project and the project roadway/access design, project-related vehicles are unlikely to create operational deficiencies or

LOS impacts to the public roadways (Moody Street and Orange Avenue) when accessing the project site. In addition, adequate visibility (without any sight obstructions) is currently provided along Moody Street and Orange Avenue for all vehicles to safely access the project site. As such, the proposed project would not substantially increase hazards for vehicles due to a geometric design feature or incompatible uses, and any effects would be considered less than significant. No mitigation is necessary.

d) Would the project result in inadequate emergency access?

Less Than Significant Impact. As described above, vehicular access to the proposed project site would be provided via a new full-access driveway on Moody Street and a new full-access driveway on Orange Avenue. The proposed project would modify the existing concrete median along Moody Street to create a dedicated 60 ft southbound left-turn lane with a 60 ft transition for inbound left-turn project-related vehicles at the new driveway along Moody Street. The proposed project would also prohibit outbound left turns at the secondary driveway along Orange Avenue during student drop-off/pickup periods (from 7:30 a.m. to 9:00 a.m. and from 2:00 p.m. to 3:30 p.m.) in order to reduce potential vehicular conflicts between the proposed project and Oxford Academy. Moody Street and Orange Avenue would allow for adequate emergency access. All emergency access routes to the proposed project and adjacent areas would be kept cleared and unobstructed during demolition and construction of the proposed project. No roadway closures or lane closures are anticipated as part of project construction. Therefore, the proposed project's effects on emergency access would be less than significant, and no mitigation is required.

4.18 TRIBAL 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 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:				
i. 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	☐	☐	☐	☒
ii. 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.	☐	☒	☐	☐

Impact Analysis

a) 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:

i. 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)?

No Impact. As previously discussed in Section 4.5, Cultural Resources, record searches were previously completed for the project site for known historical resources of which none were found on the project site. In addition, a Sacred Lands File search for the site was requested of the Native American Heritage Commission (NAHC) on April 9, 2021, and no resources were noted in the database based on NAHC correspondence, dated April 23, 2021.

Native American consultations were conducted in compliance with AB 52. Native American representatives were contacted by the City to determine their desire to consult on the proposed project. During that process, the Gabrieleño Band of Mission Indians – Kizh Nation stated that the project site is within their tribal territory and requested consultation with the City. During a January

24, 2021, phone consultation meeting with City staff, Chairperson Andrew Salas of the Kizh Nation was provided with a summary of the project and its location. Chairperson Salas provided the City staff who participated in the meeting with the history of the Kizh Nation and the context in which they lived in the area, and indicated specific areas that were prehistoric travel routes for the Kizh Nation.

No information regarding specific known tribal cultural resources on the project site was provided by the Kizh Nation. Therefore, no tribal cultural resources listed or eligible for listing in the California Register of Historical Resources (California Register) or in a local register exist within the project area, and there are no known tribal cultural resources on the project site. The proposed project would not cause a substantial adverse change in the significance of a tribal cultural resource defined as a site, feature, place, or 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 listed or eligible for listing in the California Register of or in a local register of historical resources as defined in PRC Section 5020.1(k), and no mitigation is required.

ii. 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.

Less Than Significant with Mitigation Incorporated. Effective July 1, 2015, Assembly Bill (AB) 52 requires meaningful consultation with California Native American Tribes on potential impacts to Tribal Cultural Resources, as defined in PRC Section 21074. A tribe must submit a written request to the relevant lead agency if it wishes to be notified of proposed projects in its traditionally and culturally affiliated area. The lead agency must provide written formal notification to the tribes that have requested it within 14 days of determining that a project application is complete or of deciding to undertake a project. The tribe must respond to the lead agency within 30 days of receipt of the notification if it wishes to engage in consultation on the project, and the lead agency must begin the consultation process within 30 days of receiving the request for consultation. Consultation concludes when either (1) the parties agree to mitigation measures to avoid a significant effect, if one exists, on a tribal cultural resource, or (2) a party, acting in good faith and after reasonable effort, concludes that mutual agreement cannot be reached. AB 52 also addresses confidentiality during tribal consultation per PRC Section 21082.3(c).

Correspondence to the tribes recommended by NAHC was transmitted on April 23, 2021 (provided in Appendix J). The City of Cypress (City) currently maintains a list of tribal councils based on a list of councils and corresponding Native American representatives that have requested to be notified of proposed projects in their respective areas of traditional and cultural affiliation. All tribal contacts on this list were sent a letter from the City on May 6, 2021, for the purposes of AB 52 consultation. Only one response was received in response to the City's AB 52 letters. The Gabrieleño Band of Mission Indians – Kizh Nation called City staff to express an interest in meeting to discuss the proposed project and a consultation call between tribal staff and the City was held on June 24, 2021.

The Gabrieleño Band of Mission Indians – Kizh Nation (Kizh Nation) requested consultation with the City regarding the proposed project on May 19, 2021 (Appendix J). A consultation conference was subsequently held between the City and Kizh Nation tribal staff on June 24, 2021. During the consultation meeting, an authorized representative of the Kizh Nation indicated that the project site is of high sensitivity for tribal cultural resources. The Kizh Nation tribal staff stated that, while the project site may consist of fill material, lack of documentation regarding the origin of the fill material creates a concern for the Kizh Nation and they would request tribal monitoring of project ground-disturbing construction activities. The City responded that documentation regarding origin of fill would be researched; however, no information regarding the source of fill material was available. On July 8, 2021, the Kizh Nation sent the City proposed mitigation measures for Tribal Cultural Resources along with additional background information regarding the cultural significance of the area surrounding the project site to the Kizh Nation and the high amount of pre-historic human activity that occurred there. On July 14, 2021, the City responded to the Kizh Nation that it generally agreed with the proposed mitigation measures provided by the Kizh Nation; however, the City suggested some revisions to the mitigation measures (removal of the requirement to conduct tribal monitoring during certain ground disturbance activities, shortening the length of advance notice required to be provided to the Kizh Nation prior to ground disturbance activities, and eliminating the need for tribal monitoring in soils that have been previously monitored). The City also indicated that two of the Kizh Nation's proposed mitigation measures are unnecessary because they are already addressed as regulatory compliance measures within this IS/ MND. On July 15, 2021, the Kizh Nation agreed to most of the revisions suggested by the City, with the exception of the limitations on tribal monitoring during certain ground disturbance activities.

As discussed in Response 4.5(a), the project site does not contain any "historical resources" as defined by CEQA. Therefore, the proposed project would not cause a substantial adverse change in the significance of a historical resource as defined in Section 15064.5 of the *State CEQA Guidelines* or PRC 5020.1(k).

As discussed in Response 4.5(b), the project site is not likely to contain any prehistoric site or archaeological resources based on archival research and field surveys conducted for the project site. There is little potential for the proposed project to impact prehistoric resources due to significant prior disturbance from past grading and development activities on the project site and in the surrounding area. However, Mitigation Measure CUL-1 has been included to mitigate potentially significant impacts associated with the unlikely discovery of archaeological resources on the project site. Therefore, implementation of Mitigation Measure CUL-1 would reduce potentially significant impacts to unknown archaeological resource to a less than significant level.

As discussed in Response 4.5(c), the project site is not likely to contain any human remains due to the fact that soils on the site have been previously disturbed associated with prior disturbance from past grading and development activities on the project site and surrounding area. However, Regulatory Compliance Measure CUL-1 has been included to mitigate potentially significant impacts associated with the unlikely discovery of human remains, including those determined to be of Native American descent, on the project site. The recommendations of the Kizh Nation have been incorporated into this mitigation measure to further minimize potential impacts to human remains.

Therefore, implementation of Regulatory Compliance Measure CUL-1 would reduce potentially significant impacts to unknown human remains to a less than significant level.

As noted above, Mr. Salas, Chairperson, Gabrieleño Band of Mission Indians – Kizh Nation, stated that the project site lies within the ancestral territories of the Kizh Nation, and requested that a certified Native American monitor from that group be present during all ground-disturbing activities. Although no evidence of cultural resources has been provided by the tribes consulted, Mitigation Measure TCR-1 has been proposed and ensures the opportunity for a Native American monitor to be present during ground-disturbing activities, as requested during the consultation processes conducted for the proposed project. Implementation of Mitigation Measure TCR-1, which incorporates the recommendations of the Kizh Nation, would reduce any potential impacts to previously undiscovered tribal cultural resources to a less than significant level. Therefore, on this basis and as a result of the City's consultation with the Gabrieleño Band of Mission Indians – Kizh Nation or any other interested local Native American tribe, the City has concluded that, with implementation of Mitigation Measure TCR-1, potential impacts related to unknown buried tribal cultural resources would also be reduced below a level of significance.

Mitigation Measure:

Mitigation Measure TCR-1 **Tribal Cultural Resources: Monitoring Procedures.** Prior to the issuance of a grading permit, the Applicant shall retain a Native American Monitor approved by the Gabrieleño Band of Mission Indians-Kizh Nation – the tribe that consulted on this project pursuant to Assembly Bill (AB) 52 (the "Tribe" or the "Consulting Tribe") for all ground-disturbing construction activities on the project site. A copy of the executed contract shall be provided to the City of Cypress (City) Community Development Director, or designee, prior to the issuance of a grading permit. The Applicant shall provide the Tribe with a minimum of 14 days advance written notice of the commencement of any ground-disturbing activity for the project.

The Applicant shall hold at least one pre-construction sensitivity/ educational meeting prior to the commencement of any ground-disturbing activities (preferably on the morning that ground disturbance will began), where a senior member of the Tribe will inform and educate the project's construction and managerial crew and staff members (including any project subcontractors and consultants) about the tribal cultural resource mitigation measures and compliance obligations that have been established for the project, as well as places of significance located on the project site (if any), the appearance of potential tribal cultural resources, and other informational and operational guidance to aid in the project's compliance with this mitigation measure.

The tribal monitor will only be present on-site during the construction phases that involve ground-disturbing activities. If tribal cultural resources (as defined in Public Resources Code (PRC) Section 21074) are discovered during construction activities, ground-disturbing activities in the immediate vicinity of the find (not less than the surrounding 100 feet) shall be halted until the find is assessed. Ground-disturbing construction activities shall be allowed to continue in other portions of the project while the find is being evaluated and, if necessary, further mitigation takes place.

All Tribal Cultural Resources unearthed by project activities shall be evaluated by the tribal monitor. If the resources are Native American in origin, the Consulting Tribe will retain it/them in the form and/or manner the Tribe deems appropriate, for educational, cultural and/or historic purposes.

Ground-disturbing activities are defined as activities that may include, but are not limited to, pavement removal, potholing or auguring, grubbing, tree removals, boring, grading, excavation, drilling, and trenching, within the project site. The tribal monitor shall complete daily monitoring logs that will provide descriptions of the day's activities, including construction activities, locations, soil, and any cultural materials identified. Copies of the monitoring logs shall be provided to the Applicant and City upon written request. The tribal monitor shall also provide appropriate insurance certificates. Tribal monitoring shall not be conducted after initial project excavation of soil has occurred (i.e., no tribal monitoring shall be required for landscaping activities occurring after completion of project grading and trenching, as this soil will have been previously monitored). On-site tribal monitoring shall be considered complete after project grading and trenching are completed, and only disturbance to previously monitored soil is anticipated.

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4.19 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 stormwater drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?	☐	☐	☒	☐
b) Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?	☐	☐	☒	☐
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?	☐	☐	☒	☐
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?	☐	☐	☒	☐
e) Comply with federal, state, and local management and reduction statutes and regulations related to solid waste?	☐	☐	☒	☐

Discussion

This section describes the utility providers within whose jurisdiction the project site is located and evaluates the potential impacts of the Citrus Square project (proposed project) on utilities and service systems. This section is based on multiple data sources, including: written correspondence and coordination with utility providers (Appendix I) and the California Emissions Estimator Model (CalEEMod) outputs generated for the proposed project (Appendix A). This section addresses the following utilities and service systems (service providers are noted in parentheses).

- Electricity (Southern California Edison [SCE])
- Natural Gas (Southern California Gas Company [SoCalGas])
- Solid Waste (Valley Vista Services; Orange County Waste and Recycling [OCWR])
- Wastewater (Orange County Sanitation District [OCSD])
- Potable Domestic Water (Golden State Water Company [GSWC])
- Storm Drainage (Orange County Flood Control District [OCFCD])

Impact Analysis

a) Would the project require or result in the relocation or construction of new or expanded water, wastewater treatment or stormwater drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?

Less Than Significant Impact.

Water. The Golden State Water Company (GSWC) would provide water services to the project site and would connect the proposed project to the existing 12-inch water mains along Moody Street and Orange Avenue. GSWC provides domestic water service to the project site through its West Orange System. GSWC's West Orange System service area includes Cypress, Los Alamitos, and Stanton. Additionally, small portions of Buena Park, Garden Grove, La Palma, Seal Beach, and the unincorporated community of Rossmoor are included in the West Orange System. There are approximately 27,200 customers within GSWC's West Orange System service area.[58]

The 2015 West Orange Urban Water Management Plan (UWMP) demonstrates that GSWC has adequate domestic water supply for future water demands through 2040. GSWC obtains its water supply for the West Orange System from two primary sources: imported groundwater and GSWC-operated groundwater wells. Imported water is purchased from the Municipal Water District of Orange County (MWDOC). MWDOC is largely a pass-through provider of imported water, obtaining its water supply from the Metropolitan Water District of Southern California (MWD).[59] According to the UWMP, MWD intends to provide 100-percent supply reliability to MWDOC, which in turn provides 100-percent supply reliability to the West Orange System. Groundwater is extracted from 17 active, GSWC-owned wells in the Orange County Groundwater Basin.[60] The UWMP includes a water supply and demand assessment that demonstrates that adequate water supply, including both imported groundwater and groundwater from GSWC-owned wells, will be available to GSWC through 2040.[61]

It should be noted that GSWC recently prepared a public draft of the 2020 West Orange UWMP, which addresses the availability of domestic water supply to meet the projected future water demands of the West Orange System service area through 2045.[62] This public draft, which has not yet been adopted by GSWC, indicates that its West Orange water supply portfolio, its active management of its water supply portfolio, and its Water Shortage Contingency Plan (WSCP) provide it with stable and reliable water service to meet its current and 2045 projected water demands. This supply reliability encompasses normal, single dry, and five consecutive dry year scenarios.

As of 2015, recycled water was not used within the West Orange System. However, an existing agreement would allow GSWC to purchase recycled water from the Los Angeles County Sanitation District and provide the recycled water to Forest Lawn Memorial-Park in Cypress.[63] Therefore, projected water supply information in the UWMP includes recycled water as a source.

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58 Golden State Water Company (GSWC). 2021b. Los Alamitos Customer Service Area. Website: http://www.gswater.com/los-alamitos/ (accessed June 23, 2021).

59 GSWC. 2016. *2015 Urban Water Management Plan, West Orange.* Section 6.1. July.

60 GSWC. 2016. *2015 Urban Water Management Plan, West Orange.* Section 6.2. July 2016.

61 GSWC. 2016. *2015 Urban Water Management Plan, West Orange*. 2016. Section 7.3.

62 GSWC. 2021a. 2020 Urban Water Management Plan, West Orange Service Area. Section ES-2, GSWC West Orange's Water Service Reliability. June.

63 GSWC. 2016. *2015 Urban Water Management Plan, West Orange*. 2016. Section 7.3.

According to the 2015 UWMP, the total projected water demand for customers served by GSWC is approximately 16,722 acre-feet per year (afy) in 2020; the projected water demand increases every 5-year period, totaling 17,701 afy by 2040.[64] GSWC's planned water supplies for 2020 total 16,722 afy, which consists of 1,644 afy (9.8 percent) of imported water, 14,798 afy (88.5 percent) of groundwater from GSWC-owned wells, and 280 afy (1.7 percent) of recycled water.[65] Imported water from MWDOC is provided to the GSWC West Orange System through three connections, which have supply capacities of 4,500 gallons per minute (gpm), 11,200 gpm, and 9,000 gpm. These three connections together account for a total supply capacity of 24,700 gpm.[66] Over the next 20 years, imported water supplies are anticipated to comprise the same proportion of GSWC's water supply as under current conditions.

Short-term demand for water may occur during excavation, grading, and construction activities on site. Construction activities would require water primarily for dust mitigation purposes. Water from the existing potable water lines in the vicinity of the project site would be used. Overall, short-term construction activities would require minimal water and are not expected to have any adverse impacts on the existing water system or available water supplies. The proposed project would not require the construction of new or expanded water conveyance, treatment, or collection facilities with respect to construction activities. Therefore, the impacts on water facilities during construction would be less than significant, and no mitigation is required**.**

According to water demand factors included in the CalEEMod emissions model, the proposed project is estimated to demand 24,351 gallons per day (gpd) (13,995 gpd for indoor use and 10,356 gpd for outdoor use) or 27.28 acre-feet per year (afy) of potable water. Therefore, the estimated increase in water demand associated with new development proposed as part of the project would represent approximately 0.16 percent of the West Orange System's current annual water demand, based on the system's projected demand of 16,722 afy in 2020. The project-generated increase in water demand would be negligible and would fall within GSWC's existing capacity and available supply. As such, the proposed project would not necessitate new or expanded water entitlements, and the GSWC would be able to accommodate the increased demand for potable water.

The project site has an existing private water system connected to existing 12-inch water mains along Moody Street and Orange Avenue. As part of the proposed project, new 8-inch water lines supporting the development would connect to these existing lines within Moody Street and Orange Avenue and would be placed within the proposed internal circulation roadways. The on-site system would be constructed in compliance with the City's building and plumbing codes in the Municipal Code. Extension of the water infrastructure from the adjacent streets into the project site would be a routine part of the construction process analyzed in this IS/MND and would not have a material environmental impact. The water facility improvements would be limited to the project site and connection points to the adjacent, existing GSWC facilities. Therefore, the proposed project would not require or result in the construction of new water facilities, or the expansion of existing facilities, which could cause a significant environmental impact and the impact would be less than significant. No mitigation is required.

64 GSWC. 2016. *2015 Urban Water Management Plan, West Orange*. Section 4.2.1.
65 Ibid. 2016. Section 6.9.
66 Ibid. 2016. Section 6.1.

Wastewater. The City's Public Works Department's Maintenance Division is responsible for maintaining the City's sanitary sewer system. The City operates and maintains a sanitary sewer collection and conveyance system that includes a network of gravity sewers, one pump station, and one sewer force main. Approximately 108 miles of sewers are included within the City's gravity system.[67]

The project site is in the sewer service area of the Orange County Sanitation District (OCSD). The OCSD is responsible for the provision of wastewater treatment facilities that serve the project site. The proposed project would connect with OCSD's 30-inch trunk collection line before eventually discharging to the OCSD's Reclamation Plant No. 1 in Fountain Valley.

The OCSD provides wastewater collection, treatment, and recycling for approximately 2.6 million people living within a 479-square-mile (sq mi) area of central and northwestern Orange County.[68] The OCSD's facilities include 396 miles of sewer pipes and 15 pump stations located throughout the county. The OCSD treats approximately 185 million gallons of wastewater from residential, commercial, and industrial sources per day that is sent to two treatment plants: Plant No. 1 and Plant No. 2. Treatment Plant No. 1, at 10844 Ellis Avenue in Fountain Valley, is located approximately 11 miles southeast of the project site. Treatment Plant No. 2, at 22212 Brookhurst Street in Huntington Beach, is located approximately 14 miles southeast of the project site.

As of 2019, Reclamation Plant No. 1 had a primary treatment capacity of 204 million gallons per day (mgd)[69], and was running under capacity at approximately 120 mgd.[70] Additionally, through its Capital Improvement Program, the OCSD strives to continue maintaining its facilities at optimal levels by planning, designing, and preparing for future demand by developing Facilities and Biosolids Master Plans that address 20-year planning horizons.[71]

No significant increase in wastewater flows is anticipated as a result of construction activities on the project site. Sanitary services during construction would be provided by portable toilet facilities, which transport waste off-site for treatment and disposal. Therefore, during construction, potential impacts to wastewater treatment and wastewater conveyance infrastructure would be less than significant, and no mitigation would be required.

According to wastewater generation factors included in the CalEEMod emissions model, the proposed project is estimated to generate 12,595.5 gallons per day (gpd) of wastewater (approximately 90 percent of the project's indoor water use estimate of 13,995 gpd). The proposed

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67 City of Cypress. Maintenance. Website: http://www.cypressca.org/government/departments/public-works/maintenance (accessed June 23, 2021).

68 Orange County Sanitation District (OCSD). 2018. *2018-2019 Annual Report.* https://www.ocsd.com/Home/ShowDocument?id=29415 (accessed July 8, 2020).

69 OCSD. 2019–2020 Annual Report Resource Protection Division - Pretreatment Program. Website: https://www.ocsan.gov/home/showpublisheddocument/30137/637400823456670000 (accessed May 19, 2021).

70 OCSD. 2021. Facts and Key Statistics Webpage. Website: https://www.ocsd.com/services/regional-sewer-service (accessed May 19, 2021).

71 OCSD. Capital Improvement Program Fiscal Year 2019/2020. Website: https://www.ocsan. gov/Home/ShowDocument?id=29999 (accessed May 19, 2021).

project would include new 8-inch sewer lines supporting the development placed within the proposed internal circulation roadways that would connect to an existing 10-inch sewer line owned and maintained by the City of Cypress within Orange Avenue. As discussed above, the proposed project is anticipated to generate approximately 12,595.5 gpd of wastewater, which is approximately 0.01 percent of the available daily treatment capacity at Plant No. 1.[72] Plant No. 1 is in compliance with the Santa Ana RWQCB's wastewater treatment requirements and has the capacity to accommodate the increased wastewater flows from the proposed project. The proposed project would be adequately served by the capacity and the existing wastewater conveyance system.

Sewer improvements associated with the proposed project would be designed and constructed to City and OCSD standards. The proposed project's site plans would be accompanied by adequate plans for sewer improvements prepared by a registered professional engineer and facilities would be dedicated to the City and/or OCSD at the completion of construction. Regulatory Compliance Measure UTIL-1 requires all sewer improvements to comply with City and OCSD sewage standards. With the implementation of Regulatory Compliance Measure UTIL-1, the proposed project would result in less than significant impacts related to the construction or expansion of wastewater treatment facilities. Therefore, the proposed project would not require or result in the construction of new water treatment or collection facilities, or the expansion of existing facilities, which could cause a significant environmental impact, and the impact would be less than significant. No mitigation is required.

Regulatory Compliance Measures and Mitigation Measures:

No mitigation is required. However, the following regulatory compliance measure is an existing regulation that is applicable to the proposed project and is considered in the analysis of potential impacts related to utilities and service systems. The City of Cypress considers this requirement to be mandatory; therefore, it is not a mitigation measure.

Regulatory Compliance Measure UTIL-1 **Sewer Improvement Standards.** All required sewer improvements shall be designed and constructed to City of Cypress (City) and Orange County Sanitation District (OCSD) standards and shall be approved by the City Engineer prior to development. These improvements may be constructed in a phased sequence depending upon the development process. Facilities shall be dedicated to the City and/or the OCSD at the completion of construction.

Stormwater and Drainage Facilities. As discussed in Section 4.10, Hydrology and Water Quality, in its existing condition, stormwater drains to an existing City public 42-inch storm drain system within Orange Avenue.

[72] 12,595.5 gpd/120 mgd = approximately 0.00105 or 0.01 percent.

Grading and construction activities would disturb soils and temporarily modify the stormwater flow patterns on the construction site. As described under the analysis of Thresholds 4.10(a), 4.10(f), 4.10(k), 4.10(i), and 4.10(r) in Section 4.10, Hydrology and Water Quality, the proposed project would be subject to the requirements of the Construction General Permit (see Regulatory Compliance Measure HYD-1 in Section 4.10, Hydrology and Water Quality), which requires the preparation of a Storm Water Pollution Prevention Plan (SWPPP) and identification of construction Best Management Practices (BMPs) that must be implemented during construction of the proposed project to address potential impacts to hydrology and stormwater drainage, including soil erosion, siltation, spills, and runoff. Adherence to the regulatory standards described in Regulatory Compliance Measure HYD-1 would ensure that any changes in stormwater drainage from the project site are controlled during construction. Therefore, the proposed project would not require or result in the construction of new stormwater drainage facilities or expansion of existing facilities, the construction of which could cause significant environmental impacts, and the impact would be less than significant. No mitigation is required.

Refer to Section 4.10, Hydrology and Water Quality, for additional information regarding the proposed project's impacts related to hydrology during operation. Stormwater runoff in the proposed condition would be collected by a series of area drains and proposed sump curb inlet catch basins, and would be conveyed to seven proposed Modular Wetland Systems. The Modular Wetland Systems would treat street, roof, and landscape runoff for the proposed project, as well as reduce project-related flow rates into the existing storm drains by retaining and treating stormwater on the site. The proposed Modular Wetland Systems and catch basins would be designed with internal peak bypass and upstream diversion systems for conveyance of larger storm events. Treated and overflow stormwater from the Modular Wetland Systems would be conveyed via a proposed private underground storm drain system to two public points of connection, then to an existing City public 42-inch storm drain system within Orange Avenue. Flows would then be conveyed from the 42-inch storm drain system to the Lincoln Storm Drain and Carbon Creek Channel, then to Coyote Creek, a principal tributary of San Gabriel River, ultimately discharging to the Pacific Ocean.

As demonstrated by the hydraulic modeling conducted as part of the *Preliminary Hydrology Study,* the Modular Wetland Systems would be designed to accommodate the Design Capture Volume of 16,306 cubic feet (cf) for the entire project site. The Modular Wetland Systems would treat the required volume within each of the seven drainage areas respectively, and would reduce the peak flow rate below the 10-year, 25-year, and 100-year pre-project peak flow rates. In addition, as specified in Regulatory Compliance Measure HYD-4, in Section 4.10, Hydrology and Water Quality, a Final Hydrology Study would be prepared based on final project plans and would be approved by the City. The Hydrology Study would confirm that the proposed drainage facilities comply with City and County requirements. Furthermore, as runoff from the site would be reduced compared to the existing condition, the proposed project would not contribute to the downstream capacity exceedences.

With the adherence to Regulatory Compliance Measure HYD-4, the proposed project would result in less than significant impacts related to the construction or expansion of stormwater drainage facilities. No mitigation is required.

Electric Power. Electrical power would be supplied to the project site by Southern California Edison (SCE). SCE provides electricity to more than 15 million people in a 50,000-square-mile area of Central, Coastal, and Southern California.[73] According to the California Energy Commission (CEC), total electricity consumption in the SCE service area in 2019 was 80,913 gigawatt-hours (GWh). Total electricity consumption in Orange County in 2019 was 19,460 GWh (19,459,510,000 kilowatt hours [kWh]).[74]

Short-term construction activities would be limited to providing power to the staging area and portable construction equipment and would not substantially increase demand for electricity. The heavy equipment used for construction is primarily powered by diesel fuel. Temporary electric power would be provided via existing utility boxes and lines on the project site. Given the limited nature of potential demand for electricity during construction and the availability of existing power lines on the site, there would not be a need to construct new or alter existing electric transmission facilities. Impacts to local regional supplies of electricity would be less than significant, and no mitigation is required.

The proposed project includes connections to the surrounding electrical system on site. Operation of the proposed project would increase on-site electricity demand. CalEEMod 2016.3.2 was used to calculate the approximate annual electricity demand of the proposed project. As discussed in Section 4.6, Energy, the proposed project would be required to adhere to all federal, State, and local requirements for energy efficiency, including the Title 24 standards, which would substantially reduce energy usage. Based on the CalEEMod outputs (see Appendix A of this IS/MND), the estimated potential increase in electricity demand associated with the operation of the proposed project is 430,329 kWh per year. Total electricity demand in Orange County in 2019 was approximately 19,459 GWh (19,459,508,543 kWh). Therefore, operation of the proposed project would increase the annual electricity consumption in Orange County by less than 0.1 percent.

Service providers utilize projected demand forecasts in order to provide an adequate supply or plan for surplus in their service areas. Because the proposed project would only represent a small fraction of electricity demand in Orange County, the proposed project would meet Title 24 requirements, and there would be sufficient electricity supplies available, energy demand for the proposed project would be less than significant.

The supply and distribution network within the area surrounding the project site would remain essentially the same as exists currently, with the exception of on-site improvements to serve to the proposed project. These on-site improvements would connect to the existing infrastructure and provide electrical service to the proposed residential uses. The proposed project would not increase electrical demand beyond existing projections from the local electricity provider and the project site is within a developed service area with existing demand. Therefore, the proposed project would not require the construction of any physical improvements related to the provision of electricity service

[73] Southern California Edison (SCE). 2021. Fact Sheets. Website: https://newsroom.edison.com/fact-sheets/fs (accessed May 2021).

[74] California Energy Commission (CEC). 2021. California Energy Consumption. Website: http://www.ecdms.energy.ca.gov/ (accessed May 2021).

that would result in significant environmental impacts and the proposed project's impacts would be less than significant. No mitigation is required.

Natural Gas. The Southern California Gas Company (SoCalGas) is the natural gas service provider for the project site. SoCalGas provides natural gas to approximately 21.8 million people in a 24,000 sq mi service area throughout Central and Southern California, from Visalia to the Mexican border.[75] According to the CEC, total natural gas consumption in the SoCalGas service area in 2019 was 5,425 million therms (2,419 million therms for the residential sector and 3,006 million therms for the commercial sector). Total natural gas consumption in Orange County in 2019 was 623 million therms (382 million therms for the residential sector and 241 therms for the non-residential sector).[76]

Short-term construction activities would not result in demand for natural gas since construction activities/equipment would not require accessing existing adjacent natural gas facilities. Therefore, construction activities would not impact natural gas services, and the proposed project would not require new or physically altered gas transmission facilities.

Operation of the proposed project would increase on-site natural gas demand. As discussed in Section 4.6, Energy, the proposed project would be required to adhere to all federal, State, and local requirements for energy efficiency, including the Title 24 standards, which would significantly reduce energy usage. CalEEMod 2016.3.2 was used to calculate the approximate annual natural gas demand of the proposed project. As discussed in Section 4.6, Energy, the estimated potential increase in natural gas demand associated with the proposed project is 10,377 therms per year. Total natural gas consumption in Orange County in 2019 was 623 million therms (623,146,364 therms). Therefore, operation of the proposed project would negligibly increase the annual natural gas consumption in Orange County by less than 0.1 percent.

As noted above, service providers utilize projected demand forecasts in order to provide an adequate supply or plan for surplus in their service areas. As discussed in Section 4.6, Energy, because the proposed project would only represent a small fraction of natural gas demand in Orange County, the proposed project would meet Title 24, and there would be sufficient natural gas supplies available, natural gas demand for the proposed project would be less than significant. No mitigation is required.

The supply and distribution network within the area surrounding the project site would remain essentially the same as exists today except for standard on-site improvements to serve to the proposed project. Levels of service to off-site users would not be adversely affected. Existing gas transmission and distribution services maintained by SoCalGas would provide natural gas service to the proposed project. The proposed project would not increase natural gas demand beyond existing projections from the local natural gas provider and the project site is within a developed service area with existing demand. Therefore, the proposed project would not require the construction of any physical improvements related to the provision of natural gas service that would result in

[75] Southern California Gas Company (SoCalGas). 2019. About SoCalGas. Website: https://www3.socalgas.com/about-us/company-profile (accessed May 2021).

[76] CEC. 2019b. Gas Consumption by County. Website: http://www.ecdms.energy.ca.gov/gasbycounty.aspx (accessed May 2021).

significant environmental impacts and the proposed project's potential impacts would be less than significant. No mitigation would be required.

Telecommunication Facilities. Telephone, television, and internet services are offered by a variety of providers in the City of Cypress, including AT&T, Frontier Communications, Spectrum, HughesNet, and ViaSat. Non-satellite providers include Frontier, DirectTV, Spectrum Cable, and DishTV. Satellite internet providers include ViaSat. These services are privately operated and offered to each location in the City for a fee defined by the provider.

Existing telephone, cable, and internet service lines in the vicinity would continue to serve the project site. Internal to the project site, the project Applicant would be responsible for constructing adequate telecommunication facility extensions for the proposed project. The reconfiguration of these facilities would occur on site during the site preparation and earthwork phase and are not expected to impact any telephone, cable, or internet services offsite that serve the surrounding areas. Additionally, telecommunication facilities are generally installed concurrently with utility expansions and impacts associated with the expansion of telecommunications facilities are already considered in the air quality, noise, and construction traffic analysis. Therefore, the proposed project impacts associated with the relocation or construction of new or expanded telecommunication facilities and impacts would be less than significant. No mitigation is required.

Summary. The proposed project would not require or result in the relocation or construction of new or expanded facilities for water, wastewater treatment, storm drainage, electric power, natural gas, or telecommunications. With implementation of Regulatory Compliance Measures UTIL-1, included here, and Regulatory Compliance Measure HYD-4, in Section 4.10, Hydrology and Water Quality, existing facilities would have the capacity to serve the anticipated uses, and the proposed project would not substantially increase demand upon these facilities as compared to historic and existing conditions at the project site. Therefore, impacts to these utility facilities would be less than significant.

b) Would the project have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?

Less Than Significant Impact. As previously discussed in Response 4.19(a), above, the relatively small increase in water use would be accounted for in the anticipated growth rates for the City in the UWMP. The proposed project would not necessitate new or expanded water entitlements, and GSWC would be able to accommodate the increased demand for potable water under a worst-case scenario as forecasted in the 2015 UWMP. Taking into account population growth, GSWC is able to meet demand in the multiple dry year scenario for years 2020, 2025, 2030, 2035, and 2040.[77] As described above, the proposed project is anticipated to use approximately 24,351 gpd of water. Further, the total amount of anticipated water usage by the proposed project represents approximately 0.16 percent of the West Orange System's current annual water demand. Additionally, the proposed project would be required to implement Regulatory Compliance Measure UTIL-2, which requires the proposed project to comply with all State laws for water conservation measures, including the use of low-flow fixtures. Therefore, water demand from the proposed

[77] GSWC. 2016. *2015 West Orange Urban Water Management Plan* (UWMP), Table 7-4.

project would be within GSWC's current and projected water supplies available to serve the proposed project and reasonably foreseeable future development during normal, dry, and multiple dry years. Impacts related to water supplies would be less than significant, and no mitigation would be required.

Regulatory Compliance Measures and Mitigation Measures:

The following regulatory compliance measure is an existing regulation that is applicable to the proposed project and is considered in the analysis of potential impacts related to utilities and service systems. The City of Cypress considers this requirement to be mandatory; therefore, it is not a mitigation measure.

Regulatory Compliance Measure UTIL-2 **Water Conservation.** The Applicant shall comply with all State laws related to water conservation measure. Voluntary water conservation strategies shall be encouraged. The City of Cypress Building Division shall determine compliance prior to issuance of building permits.

c) Would the project 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?

Less Than Significant Impact. Refer to Response 4.19(a). Although the proposed project would increase wastewater generation on site, the increased wastewater flows from the proposed project could be accommodated within the existing design capacity of OCSD Treatment Plant No. 1, which would serve the project site. Therefore, the City's Public Works Maintenance Division and OCSD would have adequate capacity to serve the projected demand of the proposed project in addition to its existing commitments. Therefore, impacts related to wastewater treatment would be less than significant, and no mitigation would be required.

d) Would the project 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?

Less Than Significant Impact. The City currently contracts with Valley Vista Waste and Recycling Services, a private solid waste hauler, to collect and dispose of the solid waste generated throughout the City. Solid waste collected in the City by Valley Vista would be transported to one of the Class III landfills operated and maintained by OCWR. OCWR owns and operates three active landfills (i.e., the Olinda Alpha Landfill in Brea, the Frank R. Bowerman Landfill in Irvine, and the Prima Deshecha Landfill in San Juan Capistrano). All three landfills are permitted as Class III landfills, which only accept non-hazardous municipal solid waste for disposal; no hazardous or liquid waste is accepted. County residents are able to dispose of their household hazardous waste items at any of OCWR's four household hazardous waste collection centers, located in the Cities of Anaheim,

Huntington Beach, Irvine, and San Juan Capistrano.[78] Table 4.19.A identifies the Class III sanitary landfills operated by OCWR.

Table 4.19.A: Orange County Class III Landfills

Landfill	Location	Approximate Distance from Project Site (miles)	Service
Frank R. Bowerman	11002 Bee Canyon Access Road Irvine, CA 92602	30	Commercial dumping; no public dumping
Olinda Alpha	1942 North Valencia Avenue Brea, CA 92823	20	Commercial dumping; public dumping allowed
Prima Deshecha	32250 La Pata Avenue San Juan Capistrano, CA 92675	40	Commercial dumping; public dumping allowed

Source: Orange County Waste & Recycling.

Of the three Class III landfills currently operated by OCWR, the closest active landfill to the project site is the Olinda Alpha Landfill. The Olinda Alpha Landfill, which is currently permitted by the California Department of Resources, Recycling, and Recovery (CalRecycle) to receive a maximum of 8,000 tons per day (tpd) of waste, currently receives an average of approximately 7,000 tpd.[79] Therefore, the Olinda Alpha Landfill is currently operating at approximately 87.5 percent of its daily capacity. As of November 2014, the Olinda Alpha Landfill had an estimated remaining disposal capacity of 34,200,000 cubic yards.[80] If the State-permitted daily tonnage limit is reached at any County landfill, waste haulers are subject to diversion to local transfer stations located throughout the County. The Olinda Alpha Landfill is scheduled to close in approximately 2030, at which time it would be landscaped to become a County regional park.[81]

Non-hazardous waste from construction activities associated with the proposed project would be recycled to the extent feasible, and where necessary, would likely be disposed of at the Olinda Alpha Landfill. Construction waste is anticipated to be minimal compared to waste generated throughout the lifetime of the project during operation. The proposed project is not anticipated to result in a significant production of solid waste that would exceed the daily available capacity (1,000 tpd) at the Olinda Alpha Landfill, the proposed project would not result in an impact related to City, State, or federal statutes and regulations related to solid wastes. The proposed project would generate approximately 0.124 tons of solid waste per day[82] during operation, which would contribute an insignificant amount of solid waste per day to the remaining daily capacity at the Olinda Alpha Landfill (approximately 0.01 percent). Moreover, the proposed project would not impair the

78 OC Waste & Recycling (OCWR). Household Hazardous Waste. Website: http://www.oclandfills.com/hazardous (accessed June 24, 2021).

79 OCWR. 2021. Olinda Alpha Landfill. Website: http://www.oclandfills.com/landfill/active/olindalandfill (accessed June 24, 2021).

80 CalRecycle. 2021. Solid Waste Information System Facility Detail: Olinda Alpha Sanitary Landfill. Website: SWIS Facility/Site Activity Details (ca.gov) (accessed June 24, 2021).

81 OCWR. Olinda Alpha Landfill. Website: http://www.oclandfills.com/landfill/active/olindalandfill (accessed June 24, 2021).

82 CalEEMod Outputs. Calculations: 45.08 tons per year / 365 days = 0.124 ton per day.

attainment of solid waste reduction goals. Therefore, the proposed project would result in a less than significant impact to solid waste and landfill facilities, and no mitigation would be required.

e) Would the project comply with federal, state, and local management and reduction statutes and regulations related to solid waste?

Less Than Significant Impact. Solid waste disposal practices in California are governed by multiple federal, State, and local agencies that enforce legislation and regulations ensuring that landfill operations minimize impacts to public health and safety and the environment.

The California Integrated Waste Management Act (Assembly Bill [AB] 939) changed the focus of solid waste management from landfill to diversion strategies (e.g., 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, 50 percent by 2000, and 75 percent by 2020. The City provides curbside recycling for both residential and commercial uses, as well as curbside residential green waste, which both count toward the City's solid waste diversion rate. CalRecycle tracks and monitors solid waste disposal on a per capita basis. Table 4.19.B, below, shows solid waste disposal volumes for the City of Cypress between 2012 and 2018.

Table 4.19.B: Solid Waste Disposal in the City of Cypress

Year	Total Disposal Tonnage (tons/year)
2012	52,603
2013	57,928
2014	49,761
2015	52,650
2016	50,412
2017	51,542
2018	47,305

Source: CalRecycle Jurisdiction Disposal Tonnage Trend (2020).

Implementation of the proposed project involves the demolition of the existing structures on the site, site grading, and construction of the proposed warehouses on the project site. Demolition, site preparation (vegetation removal, grading, and filling activities) and construction activities would generate typical construction debris, including wood, paper, glass, metals, cardboard, and green wastes. The proposed project would comply with the City's Construction and Demolition Ordinance (Regulatory Compliance Measure UTIL-3). The Applicant would also be required to submit a Materials Questionnaire should the contractor haul away its own demolition waste. As stipulated by City Ordinance No. 1097 and the 2019 California Green Building Standards, the proposed project would be required to divert a minimum of 65 percent of construction and demolition debris in order

to obtain building permits.[83] Additionally, Valley Vista Services certifies 75 percent diversion for all construction and demolition material,[84] which would contribute to an increased waste diversion rate within the City.

The proposed project would comply with existing and future statutes and regulations, including waste diversion programs mandated by City, State, and federal law. In addition, as discussed in Response 4.19(d), the proposed project would not result in an excessive production of solid waste that would exceed the capacity of the existing landfill serving the project site. Therefore, the proposed project would not result in an impact related to federal, State, and local statutes and regulations related to solid wastes, and no mitigation is required.

Regulatory Compliance Measures and Mitigation Measures:

The following regulatory compliance measure is an existing regulation that is applicable to the proposed project and is considered in the analysis of potential impacts related to utilities and service systems. The City of Cypress considers this requirement to be mandatory; therefore, it is not a mitigation measure.

Regulatory Compliance Measure UTIL-3 **Construction and Demolition Ordinance**. The construction contractor shall comply with the provisions of City of Cypress Ordinance No. 1166 and the 2019 California Green Building Standards Code, which would reduce construction and demolition waste. Ordinance No. 1166 is codified in Article VIII, Materials Questionnaire for Certain Construction and Demolition Projects within the City of Cypress in the Cypress Municipal Code.

83 City of Cypress. 2021. C&D Recycling Requirement. Website: C&D Recycling Requirement | City of Cypress (cypressca.org) (accessed June 24, 2021).

84 Ibid.

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4.20 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?	☐	☐	☐	☒
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?	☐	☐	☐	☒
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?	☐	☐	☐	☒
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?	☐	☐	☐	☒

Impact Analysis

a) Would the project substantially impair an adopted emergency response plan or emergency evacuation plan?

b) Would the project, 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?

c) Would the project 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?

d) Would the project 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?

The following response addresses Thresholds 4.20(a), (b), (c), and (d), as outlined above.

No Impact. The California Department of Forestry and Fire Protection (CAL FIRE) has mapped areas of significant fire hazards in the State through its Fire and Resources Assessment Program (FRAP). These maps place areas of California into different fire hazard severity zones (FHSZ), based on a hazard scoring system using subjective criteria for fuels, fire history, terrain influences, housing densities, and occurrence of severe fire weather where urban conflagration could result in catastrophic losses. As part of this mapping system, CAL FIRE is responsible for wildland fire

protection for land areas that are generally unincorporated and they are classified as State Responsibility Areas (SRAs). In areas where local fire protection agencies (e.g., Orange County Fire Authority [OCFA]) are responsible for wildfire protection, the lands are classified as Local Responsibility Areas (LRAs). CAL FIRE currently identifies the proposed project site as an LRA. In addition to establishing local or State responsibility for wildfire protection in a specific area, CAL FIRE designates areas as very high fire hazard severity zones (VHFHSZ) or non-VHFHSZ.

According to the CAL FIRE Very High Fire Hazard Severity Zone Maps for the Orange County region, the entire City of Cypress is designated as a non-VHFHSZ,[85] and the City does not include an SRA. The nearest VHFHSZ to the project site is approximately 7 miles to the northeast in Coyote Hills on the western side of Fullerton.[86] The nearest SRA is in Puente Hills, approximately 10 miles northeast of the project site. Because the project site is not located in or near an SRA or VHFHSZ, the proposed project would not result in any impacts related to wildfire. No mitigation is required.

[85] California Department of Forestry and Fire Protection (CAL FIRE). 2011. Very High Fire Hazard Severity Zones in LRA. Website: https://osfm.fire.ca.gov/media/6739/fhszl_map30.pdf (accessed June 24, 2021).

[86] Ibid.

4.21 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?	☐	☒	☐	☐
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.)	☐	☒	☐	☐
c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?	☐	☒	☐	☐

Impact Analysis

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?

Less Than Significant with Mitigation Incorporated. Based on the discussion in Section 4.4, Biological Resources, the proposed project is anticipated to result in less than significant impacts related to habitat, wildlife species, and/or plant and animal communities. The proposed project would not eliminate a plant or animal community, nor would it substantially reduce the number or restrict the range of a rare or endangered plant or animal.

The proposed project would avoid impacts on nesting resident and/or migratory birds either by avoiding vegetation removal during the avian nesting season (February 1 through August 31) or by implementing Regulatory Compliance Measure BIO-1. This measure would address any impacts to nesting resident and/or migratory birds should it be necessary to conduct vegetation removal during the nesting season and nests are present.

As discussed in Section 4.5, Cultural Resources, Response 4.5(a), the project site does not contain any buildings or structures that meet any of the California Register of Historical Resources criteria or qualify as "historical resources" as defined by CEQA. Further, according to the City of Cypress General Plan, there are no known archaeological resources located in Cypress and the SCCIC record

search results and field survey identified no previously recorded cultural resources on or in soils on the project site. Therefore, the proposed project would not cause a substantial adverse change in the significance of a historical resource. In addition, Mitigation Measures CUL-1 and GEO-2 have been incorporated to address the discovery of archaeological and paleontological resources should any be unearthed during construction. With the application of Mitigation Measures CUL-1 and GEO-2, potential impacts to previously undiscovered archaeological or paleontological resources would be reduced to less than significant.

As discussed in Section 4.18, Tribal Cultural Resources, the City requested a search of the Sacred Lands File by the Native American Heritage Commission (NAHC) for the project site. According to NAHC correspondence dated April 23, 2021, no resources were noted in the database. An AB 52 consultation call regarding the proposed project was held on June 24, 2021, between representatives of the Kizh Nation tribal staff, the City of Cypress Planning Director, and an archaeologist from LSA, the City's environmental consultant**.** No information regarding specific known tribal cultural resources on the project site was provided by the Kizh Nation. Therefore, no tribal cultural resources listed or eligible for listing in the California Register or in a local register exist within the project area, and there are no known tribal cultural resources on the project site. Although the project site is not likely to contain any human remains, adherence to regulatory standards included in Regulatory Compliance Measure CUL-1 would reduce the impact of the proposed project on human remains to less than significant and addresses tribal concerns regarding the treatment of human remains. Additionally, Mitigation Measure TCR-1 requires tribal monitoring of ground disturbing activities and Mitigation Measure CUL-1, provided in Section 4.5, Cultural Resources, requires that a qualified archaeologist be retained to monitor ground disturbing activities and addresses treatment of non-tribal cultural resources discovered during construction. In the unlikely event that ground-disturbing construction activities uncover a yet-to-be-discovered tribal cultural resource, implementation of Mitigation Measure TCR-1 and Mitigation Measure CUL-1 and adherence to Regulatory Compliance Measure CUL-1 would reduce any potential impacts to previously undiscovered tribal cultural resources to a less than significant level.

For the reasons stated above, the project does 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. Impacts to archaeological and paleontological resources would be reduced to less than significant with the implementation of Mitigation Measures CUL-1 and GEO-2 and Mitigation Measure TCR-1, and no additional mitigation would be required.

Mitigation Measures: Refer to Mitigation Measures CUL-1 (in Section 4.5, Cultural Resources), GEO-2 (in Section 4.7, Geology and Soils) and TCR-1 (in Section 4.18, Tribal Cultural Resources).

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)?

Less Than Significant with Mitigation Incorporated. The project is residential in character and would be located on a relatively small (6.3-acre) previously developed site. Mitigation measures have been added to ensure that impacts regarding cultural resources (archaeological resources) (Mitigation Measure CUL-1), geology and soils (Mitigation Measures GEO-1 and GEO-2), noise (Mitigation Measures NOI-1 and NOI-2), and tribal cultural resources (TCR-1) would be less than significant. In addition, the project would be required to comply with various regulations, which are outlined as regulatory compliance measures in this IS/MND. Adherence to the regulations described in the regulatory compliance measures related to biological resources (Regulatory Compliance Measure BIO-1), cultural resources (Regulatory Compliance Measure CUL-1), energy (Regulatory Compliance Measure EN-1), geology (Regulatory Compliance Measure GEO-1), hazards (Regulatory Compliance Measures HAZ-1 and HAZ-2), hydrology and water quality (Regulatory Compliance Measures HYD-1 through HYD-4), public services (schools) (Regulatory Compliance Measure PS-1), recreation (Regulatory Compliance Measure REC-1), and utilities (Regulatory Compliance Measures UTIL-1 through UTIL-3) would also ensure that impacts to those resource areas would be less than significant. There is no indication that the proposed project would have environmental impacts that could cause other facilities or projects to be adversely affected.

The area is highly urbanized and, therefore, subject to mostly infill development and redevelopment projects. Based on the analysis contained in this Initial Study, the proposed project would not have cumulatively considerable impacts with implementation of project mitigation measures and regulatory compliance measures. Implementation of mitigation measures and regulatory compliance measures at the project-level would reduce the potential for the incremental effects of the proposed project to be considerable when viewed in connection with the effects of past projects, current projects, or probable future projects for all environmental parameters.

Mitigation Measures: Refer to Mitigation Measures CUL-1 (in Section 4.5, Cultural Resources), GEO-1 and GEO-2 (in Section 4.7, Geology and Soils), NOI-1 and NOI-2 (in Section 4.13, Noise), and TCR-1 (in Section 4.18, Tribal Cultural Resources).

c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?

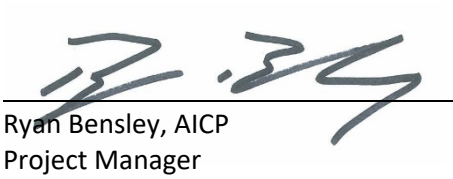
Less Than Significant with Mitigation Incorporated. Previous sections of this Initial Study reviewed the proposed project's potential impacts and regulatory compliance measures and mitigation measures related to energy (Regulatory Compliance Measure EN-1), geology (Mitigation Measures GEO-1 and GEO-2 and Regulatory Compliance Measure GEO-1), hazards (Regulatory Compliance Measures HAZ-1 and HAZ-2), hydrology and water quality (Regulatory Compliance Measures HYD-1 through HYD-4), noise (Mitigation Measures NOI-1 and NOI-2), public services (schools) (Regulatory Compliance Measure PS-1), recreation (Regulatory Compliance Measure REC-1), and utilities (Regulatory Compliance Measures UTIL-1 through UTIL-3). As concluded in the previous discussions, the proposed project would result in less than significant environmental impacts with adherence to

these regulatory compliance measures and implementation of the recommended mitigation measures. Therefore, the proposed project would not result in environmental impacts that would cause substantial adverse effects on human beings.

Mitigation Measures: Refer to Mitigation Measures GEO-1 and GEO-2 (in Section 4.7, Geology and Soils) and NOI-1 and NOI-2 (in Section 4.13, Noise).

5.0 RECOMMENDATION

Based on the information and environmental analysis contained in the Initial Study/Environmental Checklist, we recommend that the City of Cypress prepare a Mitigated Negative Declaration for the Citrus Square Project. We find that the proposed project could have a significant effect on a number of environmental issues, but that mitigation measures have been identified that reduce such impacts to a less than significant level. We recommend that the second category be selected for the City of Cypress' determination (see Section 3.1, Determination, in Chapter 3.0, Environmental Factors Potentially Affected).



Date: 08/12/2021

Ryan Bensley, AICP
Project Manager
LSA

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6.0 MITIGATION MONITORING AND REPORTING PROGRAM

6.1 MITIGATION MONITORING REQUIREMENTS

California Public Resources Code (PRC) Section 21081.6, which is part of the California Environmental Quality Act (CEQA) statute, mandates that the following requirements shall apply to all reporting or mitigation monitoring programs:

- The public agency shall adopt a reporting or monitoring program for the changes made to the project or conditions of project approval in order to mitigate or avoid significant effects on the environment. The reporting or monitoring program shall be designed to ensure compliance during project implementation. For those changes that have been required or incorporated into the project at the request of a responsible agency or a public agency having jurisdiction by law over natural resources affected by the project, that agency shall, if so requested by the lead agency or a responsible agency, prepare and submit a proposed reporting or monitoring program.

- The lead agency shall specify the location and custodian of the documents or other materials that constitute the record of proceedings upon which its decision is based.

- The lead agency shall provide measures to mitigate or avoid potentially significant effects on the environment that are fully enforceable through permit conditions, agreements, or other measures. Conditions of project approval may be set forth in referenced documents that address required mitigation measures or, in the case of the adoption of a plan, policy, regulation, or other project, by incorporating the mitigation measures into the plan, policy, regulation, or project design.

- Prior to the close of the public review period for a draft environmental impact report (EIR) or MND, a responsible agency, or a public agency having jurisdiction over natural resources affected by the project, shall either (1) submit to the lead agency complete and detailed performance objectives for mitigation measures that would address the significant effects on the environment identified by the responsible agency or agency having jurisdiction over natural resources affected by the project, or (2) refer the lead agency to appropriate, readily available guidelines or reference documents. Any mitigation measures submitted to a lead agency by a responsible agency or an agency having jurisdiction over natural resources affected by the project shall be limited to measures that mitigate impacts to resources that are subject to the statutory authority of, and definitions applicable to, that agency. Compliance or noncompliance with that requirement by a responsible agency or agency having jurisdiction over natural resources affected by a project shall not limit the authority of the responsible agency or agency having jurisdiction over natural resources affected by a project, or the authority of the lead agency, to approve, condition, or deny projects as provided by this division or any other provision of law.

6.2 MITIGATION MONITORING PROCEDURES

The mitigation monitoring and reporting program for the proposed Citrus Square Project (proposed project) has been prepared in compliance with PRC Section 21081.6. It describes the requirements and procedures to be followed by the City of Cypress, as the Lead Agency, to ensure that all mitigation measures adopted as part of the proposed project will be carried out as described in this IS/MND

Table 6.A sets forth the proposed mitigation monitoring and reporting program. It lists each of the mitigation measures specified in this IS/MND and identifies the party or parties responsible for implementation and monitoring of each measure.

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
4.4: Biological Resources					
Regulatory Compliance Measure BIO-1: **Nesting Bird Survey and Avoidance.** If vegetation removal, construction, or grading activities are planned to occur within the active nesting bird season (February 1 through August 31), the City of Cypress, or designee, shall confirm that the Applicant has retained a qualified biologist who shall conduct a preconstruction nesting bird survey no more than 3 days prior to the start of such activities. The nesting bird survey shall include the work area and areas adjacent to the site (within 500 feet, as feasible) that could potentially be affected by project-related activities such as noise, vibration, increased human activity, and dust, etc. For any active nest(s) identified, the qualified biologist shall establish an appropriate buffer zone around the active nest(s). The appropriate buffer shall be determined by the qualified biologist based on species, location, and the nature of the proposed activities. Project activities shall be avoided within the buffer zone until the nest is deemed no longer active, as determined by the qualified biologist.	No more than three days prior to commencement of grading activities	Applicant and City of Cypress Community Development Director, or designee			
4.5: Cultural Resources					
Regulatory Compliance Measure CUL-1: **Human Remains.** In the event that human remains are encountered on the project site, work within 50 feet of the discovery shall be redirected and the County Coroner notified immediately consistent with the requirements of California Code of Regulations (CCR) Section 15064.5(e). State Health and Safety Code Section 7050.5 states that no further disturbance shall occur until the County Coroner has made a determination of origin and disposition pursuant to Public Resources Code (PRC) Section 5097.98. If the remains are determined to be Native American, the County Coroner shall notify the Native American Heritage Commission (NAHC), which shall determine and notify a Most Likely Descendant (MLD). With the permission of the property	During construction activities	Construction supervisor/Applicant			

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
owner, the MLD may inspect the site of the discovery. The MLD shall complete the inspection within 48 hours of notification by the NAHC. The MLD may recommend scientific removal and non-destructive analysis of human remains and items associated with Native American burials. Consistent with CCR Section 15064.5(d), if the remains are determined to be Native American and an MLD is notified, the City of Cypress shall consult with the MLD as identified by the NAHC to develop an agreement for treatment and disposition of the remains. Prior to the issuance of grading permits, the Director of the City of Cypress Community Development Department, or designee, shall verify that all grading plans specify the requirements of CCR Section 15064.5(e), State Health and Safety Code Section 7050.5, and PRC Section 5097.98, as stated above.					
Mitigation Measure CUL-1: **Unknown Archaeological Resources.** In the event that archaeological resources are discovered during excavation, grading, or construction activities, work shall cease within 50 feet of the find until a qualified archaeologist from the Orange County List of Qualified Archaeologists has evaluated the find in accordance with federal, State, and local guidelines to determine whether the find constitutes a "unique archaeological resource," as defined in Section 21083.2(g) of the California Public Resources Code (PRC). The Applicant and its construction contractor shall not collect or move any archaeological materials and associated materials. Construction activity may continue unimpeded on other portions of the project site. Any found deposits shall be treated in accordance with federal, State and local guidelines, including those set forth in PRC Section 21083.2. Prior to commencement of grading activities, the Director of the City of Cypress (City) Community Development Department, or designee, shall verify that all project grading and construction plans include specific requirements regarding California PRC (Section 21083.2[g]) and the treatment of archaeological resources as specified above.	Prior to the issuance of a grading permit and during construction activities	Applicant and/or construction supervisor/City of Cypress Director of Community Development Department, or designee			

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
4.6: Energy					
Regulatory Compliance Measure EN-1: **Idling Restriction Signage.** Prior to the issuance of grading permits, the City of Cypress Community Development Director, or designee, shall confirm that the grading plans for the project include a requirement that a sign shall be posted on-site stating that construction workers shall shut off engines at or before five minutes of idling.	Prior to issuance of building permits	Applicant and City of Cypress Chief Building official, or designee			
4.7: Geology and Soils					
Regulatory Compliance Measure GEO-1: **Compliance with Seismic and Building Standards in the Building Code.** Prior to issuance of the first building permit for the proposed buildings, the City of Cypress (City) Engineer, Building Official, or their designee, and the project soils engineer shall review the building plans to verify that the structural design conforms to the requirements of the Geotechnical Evaluation and the City's latest adopted edition of the California Building Standards Code. Structures and walls shall be designed in accordance with applicable sections of the City's Building Code. In addition, all soil stability recommendations in the geotechnical reports shall be incorporated into the final grading plans	Prior to issuance of building permits	Applicant and City of Cypress Engineer, Chief Building official, or designee			
Mitigation Measure GEO-1: **Implementation of Geotechnical Evaluation Recommendations.** The Applicant's construction contractor shall implement the recommendations of the Geotechnical Evaluation prepared for the proposed project, as applicable, to the satisfaction of the City of Cypress' (City) Building Official, or designee, including, but not limited to: • Earthwork and grading should be performed in accordance with the applicable grading ordinances of the	Prior to issuance of grading permits	Applicant and City of Cypress Chief Building official, or designee			

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
City of Cypress and/or the County of Orange, the 2019 California Building Code, and recommendations contained in the Geotechnical Evaluation. • Site buildings shall be supported by either shallow footings with foundation ties, post-tensioned slabs, or mat foundations. • Additional testing of the soils shall be performed during construction to evaluate the as-graded conditions. • Excavation and/or overexcavation to grade and the removal or recompaction of unstable soils shall be included in the grading plans as specified in the Geotechnical Evaluation. • All other liquefaction recommendations listed in the Geotechnical Evaluation shall be incorporated into the design and construction of the proposed project.					
Mitigation Measure GEO-2: **Procedures for Unexpected Paleontological Resources Discoveries.** In the event that paleontological resources are encountered, work in the immediate area of the discovery shall be halted and the Applicant shall retain a professional Paleontologist who meets the qualifications established by the Society of Vertebrate Paleontology to assess the discovery. The qualified, professional Paleontologist shall make recommendations regarding the treatment and disposition of the discovered resources, as well as the need for subsequent paleontological mitigation, which may include, but not be limited to, 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. The City of Cypress shall ensure that the recommendations from the qualified, professional Paleontologist shall be followed by the Applicant.	During ground-disturbing activities	Applicant and/or construction supervisor/City of Cypress Director of Community Development Department, or designee			

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
4.9: Hazards and Hazardous Materials					
Regulatory Compliance Measure HAZ-1: **Pre-demolition Surveys and Abatement of Asbestos-Containing Materials.** Prior to commencement of demolition activities, the City of Cypress Director of Community Development, or designee, shall verify that pre-demolition surveys for asbestos-containing materials (ACMs) (including sampling and analysis of all suspected building materials) are performed on buildings constructed prior to 1980. All inspections, surveys, and analyses shall be performed by appropriately licensed and qualified individuals in accordance with applicable regulations (i.e., ASTM International E 1527-05, and Code of Federal Regulations (CFR) Title 40, Subchapter R, Toxic Substances Control Act [TSCA], Part 716). Wherever evidence of ACMs is present in areas proposed for demolition, all such materials shall be removed, handled, and properly disposed of by appropriately licensed contractors according to all applicable regulations during demolition of structures (40 CFR, Subchapter R, TSCA, Parts 745, 761, and 763). During demolition, air monitoring shall be completed by appropriately licensed and qualified individuals in accordance with applicable regulations both to ensure adherence to applicable regulations (e.g., South Coast Air Quality Management District [SCAQMD]) and to provide safety to workers and the adjacent community. The Applicant shall provide documentation (e.g., all required waste manifests, sampling, and air monitoring analytical results) to the Orange County Fire Authority showing that abatement of any ACMs identified in these structures has been completed in full compliance with all applicable regulations and approved by the appropriate regulatory agencies (40 CFR, Subchapter R, TSCA, Parts 716, 745, 761, 763, and 795 and California Code of Regulations [CCR] Title 8, Article 2.6).	Prior to commencement of demolition activities	Applicant and City of Cypress Director of Community Development Department, or designee			

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
4.10: Hydrology and Water Quality					
Regulatory Compliance Measure HYD-1: **Construction General Permit.** Prior to commencement of construction activities, the Applicant shall obtain coverage under the *National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities (Construction General Permit),* NPDES No. CAS000002, Order No. 2009-0009-DWQ, as amended by Order No. 2010-0014-DWQ and Order No. 2012-0006-DWQ, or any other subsequent permit. This shall include submission of Permit Registration Documents (PRDs), including permit application fees, a Notice of Intent (NOI), a risk assessment, a site plan, a Stormwater Pollution Prevention Plan (SWPPP), a signed certification statement, and any other compliance-related documents required by the permit, to the State Water Resources Control Board via the Stormwater Multiple Application and Report Tracking System (SMARTS). Construction activities shall not commence until a Waste Discharge Identification Number (WDID) is obtained for the project from the SMARTS and provided to the Director of the City of Cypress Community Development Department, or designee, to demonstrate that coverage under the Construction General Permit has been obtained. Project construction shall comply with all applicable requirements specified in the Construction General Permit, including, but not limited to, preparation of a SWPPP and implementation of construction site best management practices (BMPs) to address all construction-related activities, equipment, and materials that have the potential to impact water quality for the appropriate risk level identified for the project. The SWPPP shall identify the sources of pollutants that may affect the quality of stormwater and shall include BMPs (e.g., Sediment Control, Erosion Control, and Good Housekeeping BMPs) to control the pollutants in stormwater runoff. Construction Site BMPs shall also conform to the	Prior to commencement of construction activities	Applicant and City of Cypress Director of Community Development Department, or designee			

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
requirements specified in the latest edition of the Orange County Stormwater Program *Construction Runoff Guidance Manual for Contractors, Project Owners, and Developers* to control and minimize the impacts of construction and construction-related activities, materials, and pollutants on the watershed. Upon completion of construction activities and stabilization of the project site, a Notice of Termination shall be submitted via SMARTS.					
Regulatory Compliance Measure HYD-2: **Groundwater Dewatering Permit.** If groundwater dewatering is required during construction or excavation activities and the dewatered groundwater is discharged to the sanitary sewer system, the Applicant shall obtain a discharge permit from the Director of the City of Cypress Public Works Department. If the dewatered groundwater is discharged to the stormdrain system, the Applicant shall obtain coverage under the *General Waste Discharge Requirements for Discharges to Surface Waters that Pose an Insignificant (De Minimis) Threat to Water Quality (*Order No. R8-2020-0006, NPDES No. CAG998001) which covers discharges to surface waters that pose an insignificant (de minimis) threat to water quality within. This shall include submission of a Notice of Intent for coverage under the permit to the RWQCB at least 45 days prior to the start of dewatering. The Applicant shall provide the Waste Discharge Identification Number (WDID) to the Director of the City's Public Works Department, or designee, to demonstrate proof of coverage under the *De Minimis* Permit. Groundwater dewatering shall not be initiated until a WDID is received from the Santa Ana Regional Water Quality Control Board (RWQCB) and is provided to the Director of the City's Public Works Department, or designee. Groundwater dewatering activities shall comply with all applicable provisions in the permit, including water sampling, analysis, treatment (if required), and reporting of	Prior to commencement of construction activities	Applicant and City of Cypress Director of Community Development Department, or designee			

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
dewatering-related discharges. Upon completion of groundwater dewatering activities, a Notice of Termination shall be submitted to the Santa Ana RWQCB.					
Regulatory Compliance Measure HYD-3: **Water Quality Management Plan.** Prior to the issuance of grading or building permits, the Applicant shall submit a Final Water Quality Management Plan (WQMP) to the City of Cypress Engineer, or designee, for review and approval in compliance with the requirements of the *Waste Discharge Requirements for the County of Orange, Orange County Flood Control District, and the Incorporated Cities of Orange County within the Santa Ana Region Areawide Urban Storm Water Runoff Orange County (Order No. R8-2009-0030, NPDES No. CAS618030, as amended by Order No. R8-2010-0062) (North Orange County MS4 Permit)*. The Final WQMP shall be prepared consistent with the requirements of the *Technical Guidance Document for Water Quality Management Plans* (December 2013) and the Water Quality Management Plan template, or subsequent guidance manuals. The Final WQMP shall specify the BMPs to be incorporated into the project design to target pollutants of concern in runoff from the project area. The City shall ensure that the BMPs specified in the Final WQMP are incorporated into the final project design.	Prior to the issuance of grading or building permits	Applicant and City of Cypress Engineer, or designee.			
Regulatory Compliance Measure HYD-4: **Final Hydrology and Hydraulic Analysis.** The Applicant shall submit a Final Hydrology Study to the City of Cypress Director of Engineering, or his/her designee, for review and approval prior to issuance of grading and building permits. The Final Hydrology Study shall be prepared consistent with the requirements of the Orange County Hydrology Manual (Orange County Environment Agency 1986) and Orange County Hydrology Manual Addendum No. 1 (Orange County Environment Agency 1996), or subsequent guidance manuals. The Final Hydrology Study shall demonstrate that the on-site drainage facilities and post-project Best	Prior to the issuance of grading or building permits	Applicant and City of Cypress Engineer, or designee			

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
Management Practices (BMPs) (e.g., Modular Wetland Systems) are designed in compliance with the requirements of the Waste Discharge Requirements for the County of Orange, Orange County Flood Control District, and the Incorporated Cities of Orange County within the Santa Ana Region Areawide Urban Storm Water Runoff Orange County (Order No. R8-2009-0030, NPDES No. CAS618030, as amended by Order No. R8-2010-0062) (North Orange County MS4 Permit). The Final Hydrology Study shall also demonstrate that the on-site drainage facilities and post-construction BMPs are adequately sized to accommodate stormwater runoff from the design storm so that post-development peak flow rates for the 10-year 24-hour frequency storm, 25-year 24-hour frequency storm, and 100-year 24-hour frequency storm does not exceed the pre-development flow rate. The City Director of Engineering, or designee, shall ensure that the drainage facilities specified in the Final Hydrology Study are incorporated into the final project design.					
4.13: Noise					
Standard Condition NOI-1: **Construction Noise and Vibration.** Prior to issuance of building permits, the City of Cypress (City) Director of Community Development Department, or designee, shall verify that grading and construction plans include the following requirements: • Ensure that the greatest distance between noise sources and sensitive receptors during construction activities has been achieved. • Construction equipment, fixed or mobile, shall be equipped with properly operating and maintained noise mufflers consistent with manufacturers' standards. • Construction staging areas shall be located away from off-site sensitive uses during the later phases of project development.					

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
• The construction contractor shall place all stationary construction equipment so that emitted noise is directed away from sensitive receptors nearest the project site whenever feasible. • The construction contractor shall use on-site electrical sources to power equipment rather than diesel generators where feasible. • All residential units located within 300 feet (ft) of the construction site shall be sent a notice regarding the construction schedule. A sign, legible at a distance of 50 ft, shall also be posted at the construction site. All notices and the signs shall indicate the dates and duration of construction activities, as well as provide a telephone number for the "noise disturbance coordinator." • A "noise disturbance coordinator" shall be established. The disturbance coordinator shall be responsible for responding to any local complaints about construction noise. The disturbance coordinator shall determine the cause of the noise complaint (e.g., starting too early, bad muffler, etc.) and shall be required to implement reasonable measures to reduce noise levels. All notices that are sent to residential units within 300 ft of the construction site and all signs posted at the construction site shall list the telephone number for the disturbance coordinator.					
Mitigation Measure NOI-1: **HVAC Equipment.** Prior to issuance of construction permits, the City of Cypress (City) Director of Community Development, or designee, shall verify that that the approved plans indicate that mechanical equipment (e.g., heating, ventilation, and air conditioning [HVAC]) shall have a sound rating of less than 70.7 A-weighted decibels (dBA) when measured at 5 feet (ft), or shall be structurally insulated to assure compliance with the City Noise Ordinance.	Prior to issuance of construction permits	City of Cypress Director of Community Development Department, or designee			

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
Mitigation Measure NOI-2: **Final Acoustical Memorandum.** Prior to issuance of any certificates of occupancy, the project Applicant shall submit a Final Acoustical Memorandum, prepared by a qualified acoustical consultant, to the City of Cypress. The City Building Official, or designee, shall verify that the Final Acoustical Memorandum demonstrates that all units with exterior façades, including all bedrooms, living areas, bathrooms, toilets, closets, and corridors, comply with the City's interior noise standard (45 dBA Community Noise Equivalent Level [CNEL]).	Prior to issuance of any certificates of occupancy	Applicant and City of Cypress Director of Community Development Department, or designee			
4.15: Public Services					
Regulatory Compliance Measure PS-1: **Payment of School Fees.** Prior to issuance of any building permits, the Applicant shall provide proof to the Director of the City of Cypress Community Development Department, or designee, that payment of school fees to the Anaheim Union High School District has been made in compliance with Section 65995 of the California Government Code.	Prior to any issuance of building permits	Applicant and City of Cypress Community Development Department, or designee			
4.16: Recreation					
Regulatory Compliance Measure REC-1: **Dedication of Parkland and/or Payment of Park Fees.** Prior to issuance of any building permits, the Applicant shall provide proof of compliance with the applicable provisions of Chapter 25 (Subdivisions), Article 6, Park and Recreational Facilities, of the City of Cypress (City) Municipal Code, or other fees as determined by the City, to the Director of the City Community Development Department, or designee.	Prior to issuance of building permits	Applicant and City of Cypress Community Development Department, or designee			

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
4.18: Tribal Cultural Resources					
Mitigation Measure TCR-1: **Tribal Cultural Resources: Monitoring Procedures.** Prior to the issuance of a grading permit, the Applicant shall retain a Native American Monitor approved by the Gabrieleño Band of Mission Indians-Kizh Nation – the tribe that consulted on this project pursuant to Assembly Bill A52 (the "Tribe" or the "Consulting Tribe") for all ground-disturbing construction activities on the project site. A copy of the executed contract shall be provided to the City of Cypress (City) Community Development Director, or designee, prior to the issuance of a grading permit. The Applicant shall provide the Tribe with a minimum of 14 days advance written notice of the commencement of any ground-disturbing activity for the project. The Applicant shall hold at least one pre-construction sensitivity/ educational meeting prior to the commencement of any ground-disturbing activities (preferably on the morning that ground disturbance will began), where a senior member of the Tribe will inform and educate the project's construction and managerial crew and staff members (including any project subcontractors and consultants) about the tribal cultural resource mitigation measures and compliance obligations that have been established for the project, as well as places of significance located on the project site (if any), the appearance of potential tribal cultural resources, and other informational and operational guidance to aid in the project's compliance with this mitigation measure. The tribal monitor will only be present on-site during the construction phases that involve ground-disturbing activities. If tribal cultural resources (as defined in Public Resources Code (PRC) Section 21074) are discovered during construction activities, ground-disturbing activities in the immediate vicinity of the find (not less than the surrounding 100 feet) shall be halted until the	Prior to issuance of grading permits and during construction	Applicant and City of Cypress Community Development Department, or designee			

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
find is assessed. Ground-disturbing construction activities shall be allowed to continue in other portions of the project while the find is being evaluated and, if necessary, further mitigation takes place. All Tribal Cultural Resources unearthed by project activities shall be evaluated by the tribal monitor. If the resources are Native American in origin, the Consulting Tribe will retain it/them in the form and/or manner the Tribe deems appropriate, for educational, cultural and/or historic purposes. Ground-disturbing activities are defined as activities that may include, but are not limited to, pavement removal, potholing or auguring, grubbing, tree removals, boring, grading, excavation, drilling, and trenching, within the project site. The tribal monitor shall complete daily monitoring logs that will provide descriptions of the day's activities, including construction activities, locations, soil, and any cultural materials identified. Copies of the monitoring logs shall be provided to the Applicant and City upon written request. The tribal monitor shall also provide appropriate insurance certificates. Tribal monitoring shall not be conducted after initial project excavation of soil has occurred (i.e., no tribal monitoring shall be required for landscaping activities occurring after completion of project grading and trenching, as this soil will have been previously monitored). On-site tribal monitoring shall be considered complete after project grading and trenching are completed, and only disturbance to previously monitored soil is anticipated.					

Table 6.A: Mitigation Monitoring and Reporting Program

Regulatory Compliance Measures/Standard Conditions/ Mitigation Measures	Monitoring Milestone	Responsible Party Responsible for Monitoring	Verification of Compliance		
			Initials	Date	Remarks
4.19: Utilities and Service Systems					
Regulatory Compliance Measure UTIL-1: **Sewer Improvement Standards.** All required sewer improvements shall be designed and constructed to City of Cypress (City) and Orange County Sanitation District (OCSD) standards and shall be approved by the City Engineer prior to development. These improvements may be constructed in a phased sequence depending upon the development process. Facilities shall be dedicated to the City and/or the OCSD at the completion of construction.	Prior to issuance of building permits and completion of applicable facilities	Applicant and City of Cypress Engineer, or designee			
Regulatory Compliance Measure UTIL-2: **Water Conservation.** The Applicant shall comply with all State laws related to water conservation measure. Voluntary water conservation strategies shall be encouraged. The City of Cypress Building Division shall determine compliance prior to issuance of building permits.	Prior to issuance of building permits	Applicant and City of Cypress Building Division			
Regulatory Compliance Measure UTIL-3: **Construction and Demolition Ordinance.** The construction contractor shall comply with the provisions of City of Cypress Ordinance No. 1166 and the 2019 California Green Building Standards Code, which would reduce construction and demolition waste. Ordinance No. 1166 is codified in Article VIII, Materials Questionnaire for Certain Construction and Demolition Projects within the City of Cypress in the Cypress Municipal Code.	Prior to and during project construction	Applicant and City of Cypress Director of Community Development Department, or designee			

7.0 LIST OF PREPARERS AND PERSONS CONSULTED

7.1 CITY OF CYPRESS

The following individuals from the City of Cypress (City) were involved in the preparation of this Initial Study/Mitigated Negative Declaration (IS/MND):

- Alicia Velasco, Planning Director
- Laura Vander Neut, Planner

7.2 IS/MND PREPARERS

The following individuals were involved in the preparation of this Draft IS/MND. The nature of their involvement is summarized below.

7.2.1 LSA

The following individuals were involved in the preparation of this Draft IS/MND:

- Deborah Pracilio, Principal in Charge
- Ryan Bensley, AICP, Associate/Project Manager
- Amy Fischer, Principal/Air Quality, Noise and Global Climate Change Specialist
- Ken Wilhelm, Principal/Transportation
- Dean Arizabal, Principal/Transportation
- JT Stephens, Associate/Air Quality and Noise
- Kerrie Collison, Associate/Cultural Resources Manager
- Casey Tibbet, Associate/Cultural Resources
- Laura Carias, Architectural Historian
- Corey Knips, Noise Analyst
- Shiva Delparastaran, Transportation Engineer
- Cara Carlucci, Environmental Planner
- Marlene Watanabe, Environmental Planner
- Abby Annicchiarico, Environmental Planner
- Jeffrey Haynes, Assistant Air Quality Analyst
- Jordan Roberts, Noise Specialist
- Jazmine Estores, Assistant Environmental Planner
- Gary Dow, Associate, Graphics
- Matt Phillips, Graphics Technician
- Lauren Johnson, Technical Editor
- Chantik Virgil, Senior Word Processor

7.3 TECHNICAL REPORT PREPARERS

The following individuals were involved in the preparation of the technical reports in support of this Draft IS/MND. The nature of their involvement is summarized below.

7.3.1 C&V Consulting, Inc.

The following individuals were involved in the preparation of the *Preliminary Hydrology Study: Citrus Square – Senior* Community and *Preliminary Water Quality Management Plan: Citrus Square – Senior Community, TTM 19147* (May 2021):

- Dane McDougall, P.E., P.L.S, Principal Engineer

7.3.2 GeoTek, Inc.

The following individuals were involved in the preparation of the *Updated Geotechnical Evaluation – Orange Avenue Seniors* (January 2021):

- Edward H. LaMont, C.E.G., Principal Geologist
- Gaby Bogdanoff, G.E., Project Engineer

7.3.3 Black Rock Geosciences

The following individuals were involved in the preparation of the *Phase I Environmental Assessment – Cypress School District Office* (November 2020):

- Quin Kinnebrew, P.G., Principal Geologist

7.3.4 LSA

The following individuals were involved in the preparation of the *Historic Resources Assessment* (June 2021):

- Laura Carias, M.A., Architectural Historian

The following individuals were involved in the preparation of the *Trip Generation, Vehicle Miles Traveled, and Access Analysis Memo for the Citrus Square Project* (August 2021):

- Shiva Delparastaran, P.E., Transportation Engineer

7.4 PROJECT APPLICANT

7.4.1 Melia Homes

The project Applicant was consulted during the preparation of this Draft IS/MND:

- Chad Brown, Vice President of Planning & Development, Melia Homes

7.5 PERSONS CONSULTED

The following individuals were consulted during the preparation of this Draft IS/MND:

- Gabrieleño Band of Mission Indians – Kizh Nation
  - Andrew Salas, Chairman

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