

The Pines at Sunrise Village Project

Initial Study/Mitigated Negative Declaration

September 2021



Prepared by
Kimley»Horn



The Pines at Sunrise Village Project

Initial Study and Mitigated Negative Declaration

Lead Agency:

City of Fullerton

303 W. Commonwealth Avenue
Fullerton, CA 92832

Consultant:

Kimley-Horn and Associates, Inc.

1100 Town and Country Road, Suite 700
Orange, California 92868

September 2021

Table of Contents

1.0	INTRODUCTION	1
1.1	Statutory Authority and Requirements.....	1
1.2	Summary of Findings	2
1.3	Initial Study Public Review Process	2
1.4	Incorporation by Reference.....	2
1.5	Report Organization	3
2.0	PROJECT DESCRIPTION	5
2.1	Location and Setting.....	5
2.2	Environmental Setting	5
2.3	Existing Land Use Designations	6
2.4	Project Characteristics.....	15
2.5	Project Construction Activities and Phasing.....	44
2.6	Agreements, Permits, and Approvals.....	44
3.0	ENVIRONMENTAL CHECKLIST FORM	45
3.1	Background.....	45
3.2	Environmental Factors Potentially Affected.....	46
3.3	Lead Agency Determination	46
4.0	EVALUATION OF ENVIRONMENTAL IMPACTS.....	48
4.1	Aesthetics	49
4.2	Agricultural and Forestry Resources.....	52
4.3	Air Quality.....	55
4.4	Biological Resources	64
4.5	Cultural Resources.....	68
4.6	Energy.....	71
4.7	Geology and Soils.....	76
4.8	Greenhouse Gas Emissions.....	81
4.9	Hazards and Hazardous Materials.....	88
4.10	Hydrology and Water Quality.....	94
4.11	Land Use and Planning	102
4.12	Mineral Resources	106
4.13	Noise	107
4.14	Population and Housing	116
4.15	Public Services	118

4.16	Recreation	122
4.17	Transportation	124
4.18	Tribal Cultural Resources	130
4.19	Utilities and Service Systems	133
4.20	Wildfire	140
4.21	Mandatory Findings of Significance	142
5.0	REFERENCES	145

Appendices

- Appendix A: Air Quality Greenhouse Gas Assessment
- Appendix B: Biological Resources Assessment
- Appendix C: Cultural Records Search
- Appendix D: Geotechnical and Infiltration Evaluation
- Appendix E: Phase I Environmental Site Assessment and Report of Findings
- Appendix F: Water Quality Management Plan
- Appendix G: Drainage Report
- Appendix H: Noise Data
- Appendix I: Traffic Impact Analysis
- Appendix J: TAPP Worksheet
- Appendix K: Tribal Consultation
- Appendix L: Water and Sewer Assessment

List of Exhibits

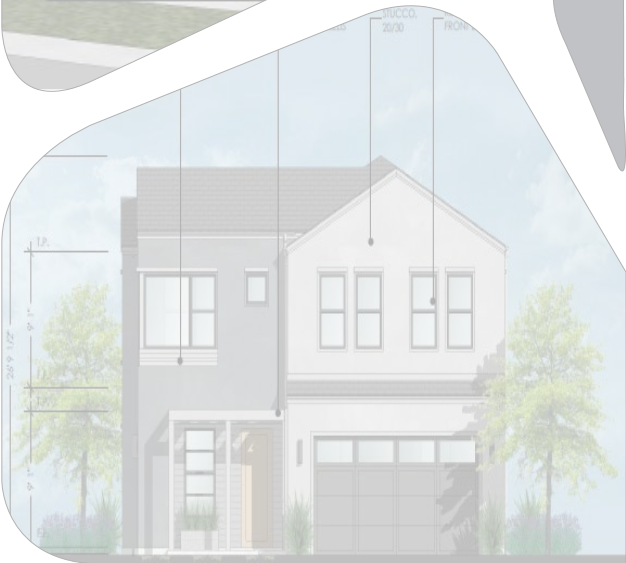
Exhibit 2-1: Regional Vicinity Map	7
Exhibit 2-2: Local Vicinity Map	9
Exhibit 2-3: Existing Land Use Designations.....	11
Exhibit 2-4: Existing Zoning	13
Exhibit 2-5: Conceptual Site Plan	17
Exhibit 2-6a: Conceptual Single-family Dwellings Elevation	19
Exhibit 2-6b: Conceptual Single-family Dwellings Renderings.....	21
Exhibit 2-7a: Conceptual Multi-Family Residential Townhome Elevations	25
Exhibit 2-7b: Conceptual Multi-Family Residential Townhome Elevations	27
Exhibit 2-7c: Conceptual Multi-Family Residential Townhome Elevations.....	29
Exhibit 2-7d: Conceptual Multi-Family Residential Townhome Elevations	31
Exhibit 2-7e: Conceptual Multi-Family Residential Townhome Elevations	33
Exhibit 2-8a: Conceptual Multi-Family Residential Townhome Renderings.....	35
Exhibit 2-8b: Conceptual Multi-Family Residential Townhome Renderings.....	37
Exhibit 2-9: Conceptual Landscape Plan	39
Exhibit 2-10: Fire Master Plan	41

List of Tables

Table 2-1: Existing On-Site Land Uses	6
Table 2-2: Surrounding Land Uses and Zoning.....	15
Table 2-3: Lot Summary	15
Table 2-4: Single-Family Residential Plan Summary	16
Table 2-5: Multi-Family Residential Townhome Plan Summary	23
Table 2-6: Open Space Summary	24
Table 4.3-1: Construction Emissions	58
Table 4.3-2: Operational Emissions.....	59
Table 4.3-3: Localized Significance of Construction and Operational Emissions.....	61
Table 4.4-1: On-Site Trees	66
Table 4.8-1: Project Greenhouse Gas Emissions.....	84
Table 4.8-2: Project Consistency with CAP	86
Table 4.11-1: General Plan Policies Consistency.....	103
Table 4.13-1: Existing Noise Measurements.....	109
Table 4.13-2: City of Fullerton Sound Level Limits.....	110

Table 4.13-3: Maximum Noise Levels Generated by Construction Equipment	111
Table 4.13-4: Project Construction Noise Levels	112
Table 4.13-5: Typical Vibration Levels for Construction Equipment.....	114
Table 4.15-1: Proposed Project Student Generation	120
Table 4.17-1: Project Trip Generation.....	126
Table 4.17-2: Project Trip Generation.....	128
Table 4.19-1: Project Water Demand	134
Table 4.19-2: Modeled Sewer Loads.....	135

Introduction



1.0 INTRODUCTION

1.1 Statutory Authority and Requirements

This Initial Study has been prepared in accordance with the California Environmental Quality Act (CEQA) (California Public Resources Code [PRC] §21000 et seq.) and the State CEQA Guidelines (California Code of Regulations [CCR], Title 14, §15000 et seq.). Pursuant to State CEQA Guidelines §15063, this Initial Study has been prepared to determine if the proposed The Pines at Sunrise Village Project (“Project”) would have a significant effect on the environment. The approximately 12.52-acre Project site is located at 1144 Rosecrans Avenue, 1715/1723 Euclid Street, and 1701/1751/1801-1900 Euclid Street, in the City of Fullerton, County of Orange, California. The Project proposes to demolish approximately 108,300 square feet (sf) of existing onsite retail commercial uses and two tennis courts and in their place, develop a residential community consisting of 115 three-story townhomes and 49 single-family homes, at a density of 13.1 dwelling units per net-acre (DU/net AC). The requested entitlements include a General Plan Revision, Zoning Amendment, Tentative Tract Map, Major Site Plan Review, and a Development Agreement.

State CEQA Guidelines §15063(b) states that if the Lead Agency determines that there is substantial evidence that any aspect of a project, either individually or cumulatively, may cause a significant effect on the environment, the Lead Agency shall prepare an Environmental Impact Report (EIR), use a previously prepared EIR, or determine, which of a project’s effects were adequately examined by an earlier EIR or Negative Declaration (ND). Conversely, the Lead Agency shall prepare a ND if there is no substantial evidence that the project or any of its aspects may cause a significant effect on the environment.

Pursuant to State CEQA Guidelines §15063(c), the purposes of an Initial Study are to:

- Provide the Lead Agency with information to use as the basis for deciding whether to prepare an EIR or a ND;
- Enable an applicant or Lead Agency to modify a project, mitigating adverse impacts before an EIR is prepared, thereby enabling the project to qualify for a ND;
- Assist in the preparation of an EIR, if one is required;
- Facilitate environmental assessment early in the design of a project;
- Provide documentation of the factual basis for the finding in a ND that a project will not have a significant effect on the environment;
- Eliminate unnecessary EIRs; and
- Determine whether a previously prepared EIR could be used with the project.

This Initial Study is intended to be used as a decision-making tool for the City of Fullerton (“City”), as the Lead Agency, and responsible agencies in considering and acting on the proposed Project. Responsible agencies would comply with CEQA by considering this environmental analysis for discretionary actions associated with Project implementation, if any.

State CEQA Guidelines §15063(g) specifies that as soon as a Lead Agency has determined that an Initial Study will be required for a project, the Lead Agency shall consult informally with all responsible agencies and all trustee agencies responsible for resources affected by the project to obtain their recommendations as to whether an EIR, Mitigated Negative Declaration (MND), or ND should be prepared.

1.2 Summary of Findings

Pursuant to State CEQA Guidelines §15367, as the Lead Agency, the City has the authority for environmental review and adoption of the environmental documentation, in accordance with CEQA. This Initial Study has evaluated the environmental issues outlined in **Section 3.2: Environmental Factors Potentially Affected**. It provides decision-makers and the public with information concerning the Project's potential environmental effects and recommended mitigation measures, if any.

Based on the Environmental Checklist Form and supporting environmental analysis, the Project would have no impact or a less than significant impact concerning all environmental issue areas, except the following, for which the Project would have a less than significant impact with mitigation incorporated:

- Cultural Resources
- Hazards and Hazardous Materials
- Geology and Soils
- Tribal Cultural Resources

As set forth in State CEQA Guidelines §15070, an Initial Study leading to a Mitigated Negative Declaration (IS/MND) can be prepared when the Initial Study identifies potentially significant effects but Project revisions would avoid or mitigate the effects to a point where clearly no significant effects would occur, and there is no substantial evidence, in light of the whole record before the agency, that the Project as revised may have a significant effect on the environment.

1.3 Initial Study Public Review Process

The Notice of Intent (NOI) to Adopt a MND has been provided to the Orange County Clerk-Recorder and mailed to responsible¹ and trustee agencies² concerned with the Project and other public agencies with jurisdiction by law over resources affected by the Project. A 20-day public review period has been established for the IS/MND in accordance with State CEQA Guidelines §15073. The IS/MND, including the technical appendices, is available for review at the following locations:

- City of Fullerton, Planning Division, 303 West Commonwealth Avenue, Fullerton, California 92832;
- City of Fullerton Planning Division website:
https://www.cityoffullerton.com/gov/departments/dev_serv/planning/default.asp
- Fullerton Public Library, 353 West Commonwealth Avenue, Fullerton, California 92832.

In reviewing the IS/MND, affected public agencies and the interested public should focus on the document's adequacy in identifying and analyzing the potential environmental impacts and the ways in which the Project's potentially significant effects can be avoided or mitigated.

Written comments on this IS/MND may be sent to:

Heather Allen, Planning Manager
City of Fullerton, Planning Division
303 West Commonwealth Avenue
Fullerton, California 92832
Email: heather.allen@cityoffullerton.com

¹ "Responsible Agency" includes all public agencies other than the lead agency which have discretionary approval power over the project.

² "Trustee Agency" means a state agency having jurisdiction by law over natural resources affected by a project which are held in trust for the people of the State of California. The project site does not include resources that involve a trustee agency.

Following receipt and evaluation of comments from agencies, organizations, and/or individuals, the City will determine whether any substantial new environmental issues have been raised. If so, further documentation may be required. If not, or if the issues raised do not provide substantial evidence that the Project would have a significant effect on the environment, the IS/MND will be considered for adoption and the Project for approval. While this MND and the supporting Initial Study and technical documents were prepared by consultants, the findings represent the City's independent judgment acting in its capacity as Lead Agency for the proposed Project.

1.4 Incorporation by Reference

Pursuant to State CEQA Guidelines §15150, an MND may incorporate by reference all or portions of another document which is a matter of public record or is generally available to the public. Where all or part of another document is incorporated by reference, the incorporated language shall be considered to be set forth in full as part of the MND's text.

The references noted below were used during preparation of this Initial Study. Copies of these documents are available for review on the City of Fullerton Planning Division website [https://www.cityoffullerton.com/gov/departments/dev_serv/planning/default.asp].

The Fullerton Plan (RBF Consulting, May 2012). The City adopted its comprehensive General Plan ("The Fullerton Plan" or "General Plan") in May 2012, while the 2013-2021 Housing Element was adopted in May 2015. The Fullerton Plan outlines the City's goals, plans, and objectives for land use within the City's jurisdiction. The Fullerton Plan, which was used throughout this Initial Study as a source of baseline data, is organized into four master elements:

- The Fullerton Built Environment
- The Fullerton Economy
- The Fullerton Community
- The Fullerton Natural Environment

The Fullerton Plan Environmental Impact Report (RBF Consulting, 2012) (SCH No. 2011051019). The Fullerton Plan EIR analyzed the potential environmental impacts that would result from implementation of The Fullerton Plan, with a forecast 2030 buildout. At the time of The Fullerton Plan EIR's writing, Fullerton's population was estimated at 135,314 persons with a housing stock of 45,947 DUs. The Fullerton Plan assumed a buildout population of 165,303 persons with a housing stock of 56,130 DUs. Additionally, The Fullerton Plan assumes 56,307,474 sf of non-residential development at buildout. The Fullerton Plan EIR was used throughout this IS/MND as a source of baseline data.

Fullerton Municipal Code (codified through Ordinance No. 3295). The Fullerton Municipal Code (FMC) regulates municipal affairs within the City's jurisdiction including zoning regulations (codified in FMC Title 15). FMC Title 15 is the primary tool for implementing The Fullerton Plan's goals and policies. The FMC is referenced throughout this Initial Study to establish the Project's baseline requirements according to the City's regulatory framework.

1.5 Report Organization

This document is organized into the following sections:

Section 1.0: Introduction introduces and provides an overview of the Project, cites the CEQA Statute and Guidelines provisions to which the proposed Project is subject, and summarizes the Initial Study's conclusions.

Section 2.0: Project Description describes the Project's location, environmental setting, background, characteristics, discretionary actions, construction program, phasing, agreements, and required permits and approvals. It also identifies the Initial Study's intended uses, including a list of anticipated permits and other approvals.

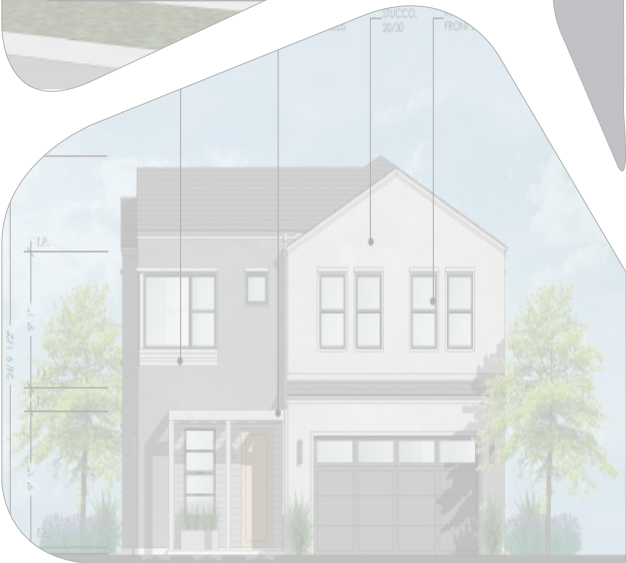
Section 3.0: Environmental Checklist Form provides the Project background and an overview of the Project's potential impacts that could result from Project implementation.

Section 4.0: Evaluation of Environmental Impacts contains an analysis of environmental impacts identified in the environmental checklist.

Section 5.0: References identifies resources used to prepare the Initial Study.

This page intentionally left blank.

Project Description



2.0 PROJECT DESCRIPTION

2.1 Location and Setting

The approximately 12.52-acre The Pines at Sunrise Village Project site is located at 1144 Rosecrans Avenue, 1715/1723 Euclid Street, and 1701/1751/1801-1900 Euclid Street (Assessor Parcel Numbers [APN] 287-241-01, -04, and -06) in the City of Fullerton, Orange County, California. The Project site is in northwestern part of the City, near the West Coyote Hills area. The site is generally bordered by Rosecrans Avenue on the north, Paseo Dorado on the south, Euclid Street on the east, and Camino Loma on the west. Regional vehicular access to the Project site is provided via State Route 91 (SR-91), located approximately 2.7 miles to the south. Local access to the Project site is provided via two driveways, one at Rosecrans Avenue and one at Euclid Street. **Exhibit 2-1: Regional Vicinity Map** and **Exhibit 2-2: Site Vicinity Map** show the Project site in a regional and local context, respectively.

2.2 Environmental Setting

Fullerton encompasses approximately 22.4 square miles in the north Orange County region. The City is urbanized with of a mix of residential, commercial, institutional, and light industrial uses. The general area is largely characterized by residential land uses with small local-serving commercial retail strip malls. Approximately one-half of the City's housing stock is comprised of low-density single-family detached DU.³

The Project site was first developed in the late 1970s with a commercial retail use and continues to operate as a commercial retail development. Prior to the current development, the Project site was historically used for agricultural purposes.

Similarly, the surrounding area was historically used for agricultural purposes and was later developed into single-family residences beginning in the 1950s.

The Project site is approximately 0.30 mile north of the abandoned Union Pacific Railroad adjacent to Bastanchury Road. The Robert E. Ward Nature Preserve is approximately 0.4 mile north of the Project site.

2.2.1 On-Site Land Uses

The Project site is relatively flat but slopes northwest to southeast towards Euclid Street, with elevations ranging from approximately 268 feet to 215 feet above mean sea level (amsl).⁴ The site is fully developed with approximately 108,300 sf of retail commercial uses in five buildings that comprise most of a local-serving shopping center, abandoned tennis courts (associated with a prior use at 1144 Rosecrans Avenue), and one smaller separate commercial building, which is occupied by a Red Cross Blood Donation Center. **Table 2-1: Existing On-Site Land Use** summarizes the existing on-site land uses and corresponding occupancies, according to APN.

³ State of California, Department of Finance, *E-5 Population and Housing Estimates for Cities, Counties and the State — January 1, 2011-2021*. Sacramento, California, January 2021.

⁴ Google. (2021). Google Earth Pro.

Table 2-1: Existing On-Site Land Uses						
ID ¹	APN ²	Site (Gross Acres) ²	Address ²	Existing Land Use ³	Building (SF) ³	Building Vacancy (SF) ³
1	287-241-01	0.80	1144 Rosecrans Ave	American Red Cross Donation Center, surface parking lot, and two abandoned tennis courts associated with a prior use	3,919	
2	287-241-04	1.848	1715/1723 Euclid St	Vacant lease space, Abel Hernandez DDS	8,000	8,000
3	287-241-06	9.872	1701/1751/1801-1900 Euclid St	Vacant lease space, Fullerton Hills Pet Clinic, Fencing Studio, Acupuncture, Bon Juk Restaurant, Pharmacy, Pola Hair Salon, Hwang Hae Do Restaurant, Hearing Aid Center, PC Café – Reboot, Charles Kim DDS Grace Family, Taek Bae (Han Seong Express), Kumon Tutoring, Pilates, Mr. Dumpling, Imperial Spa, Elite Educational Institute	96,381	40,379
Total		12.52			108,300	48,379 (45%)

APN = Assessor Parcel Number; SF = square feet

1. Identification number (ID) correlates to labels on **Exhibit 2-2: Local Vicinity Map**. The retail uses on the 1.42-acre parcel are not included in the tabulation.
2. ParcelQuest, 2021.
3. EPD - Brandon Wolfe, Personal Communication - Email, May 13, 2021.

As a separate and ministerial action, the Applicant is processing a Lot Line Adjustment to adjust the boundary between APN 287-241-05 and APN 287-241-06 to create a 1.42-acre parcel. The Lot Line Adjustment would consolidate the existing commercial uses at 1020 Rosecrans Avenue and 1026-1030 Rosecrans Avenue into one parcel. Therefore, the adjusted 1.42-acre parcel is not a part of the Project and all references to net land area herein do not include this parcel.

2.3 Existing Land Use Designations

The Fullerton Plan (General Plan) Figure LU-1: Land Use Policy Plan depicts the City’s community development types (land use designations) and identifies that the Project site is designated Commercial with a permitted 0.25 to 0.35 Floor Area Ratio (FAR).⁵ The commercial designation is meant to establish and protect opportunities for convenient commerce within both neighborhood and regional shopping centers.⁶ **Exhibit 2-3: Existing Land Use Designations** depicts the existing on-site and surrounding properties’ land use designations.

The City of Fullerton Zoning Map depicts the City’s zoning classifications and indicates the Project site is zoned General Commercial (C-G). **Exhibit 2-4: Existing Zoning** depicts the existing zoning districts for the Project site and surrounding properties.

⁵ City of Fullerton. (2021). *GoZone 2.1 GIS Webtool*. Available at: <https://gis.cityoffullerton.com/gozone/>

⁶ City of Fullerton. (2012). *The Fullerton Plan, Page 124*

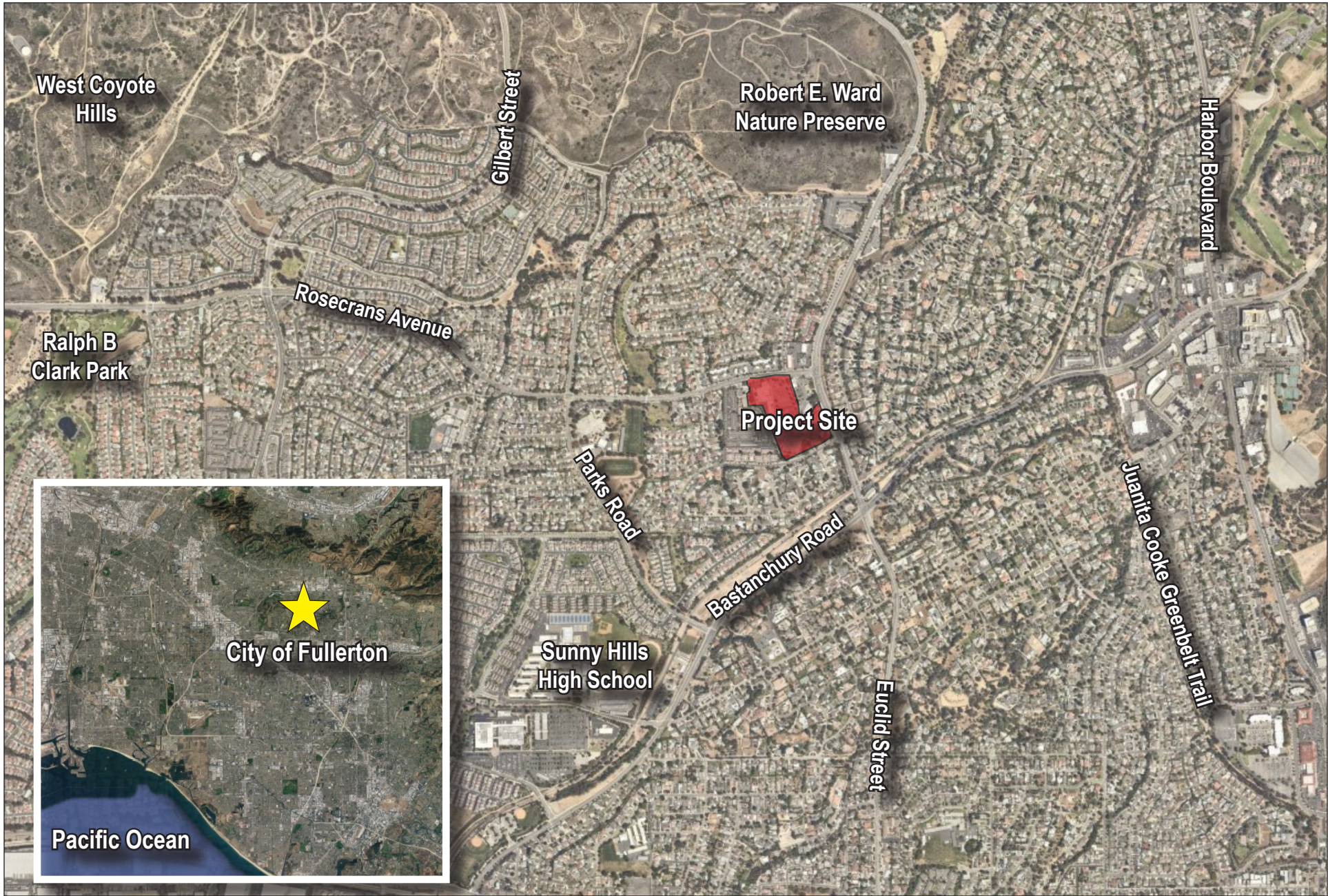


EXHIBIT 2-1: Regional Vicinity Map
The Pines at Sunrise Village Project



This page is intentionally left blank.

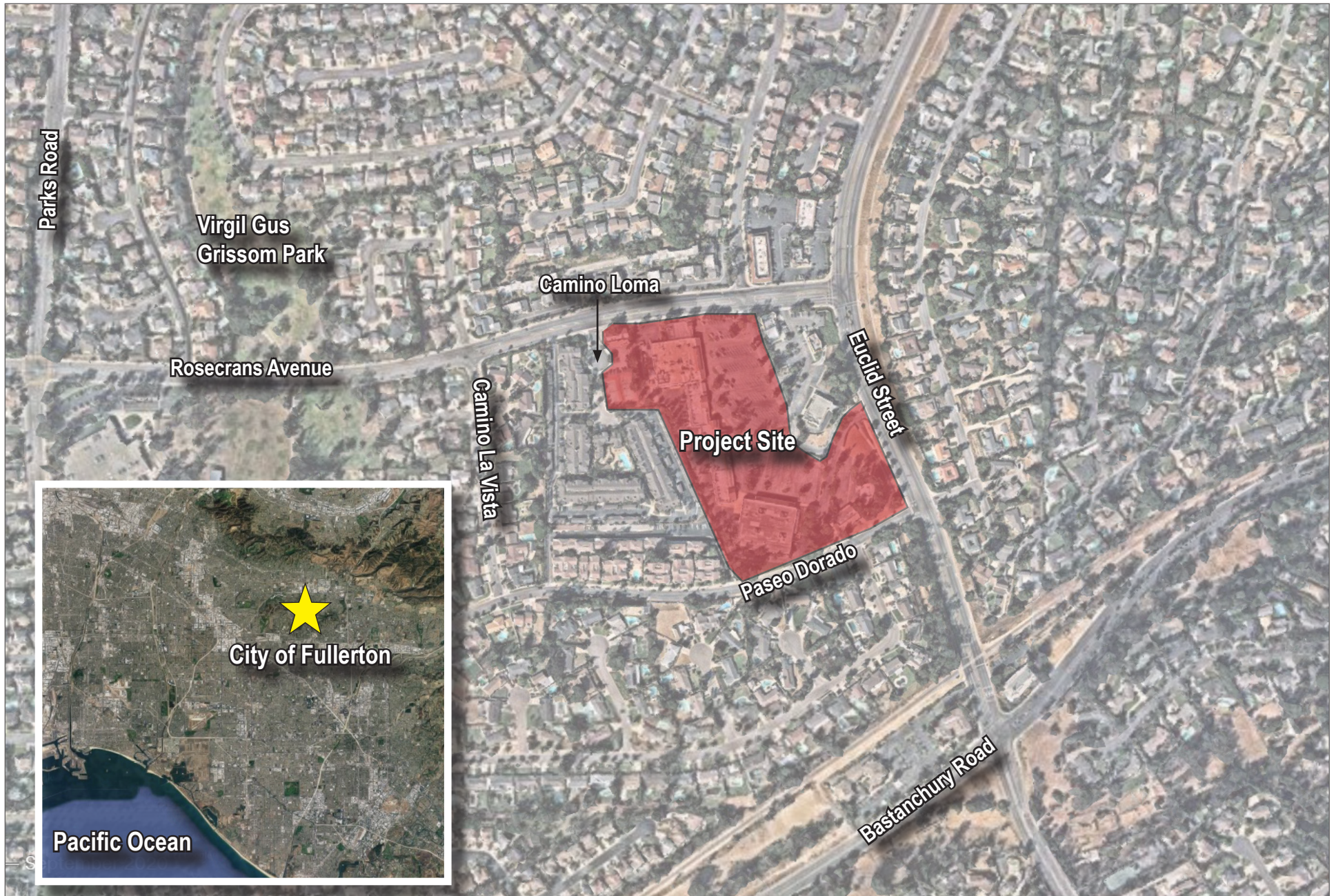


EXHIBIT 2-2: Site Vicinity Map
The Pines at Sunrise Village Project



This page is intentionally left blank.



EXHIBIT 2-3: Existing Land Use Designations
 The Pines at Sunrise Village Project



This page is intentionally left blank.



EXHIBIT 2-4: Existing Zoning
The Pines at Sunrise Village Project



This page is intentionally left blank.

2.3.1 Surrounding Land Uses

The land uses adjacent to and near the Project site, along with the zoning and respective FMC regulations, are summarized in **Table 2-2: Surrounding Land Uses and Zoning** (also see **Exhibit 2-2: Local Vicinity Map**).

Table 2-2: Surrounding Land Uses and Zoning			
Direction	Existing Land Uses	Zone Classification	FMC Chapter
North	Racquet Club Villas North multi-family townhome complex; Camino Del Sol Center commercial plaza at the northwest corner of the Rosecrans Ave at Euclid St intersection; single-family residential uses along Camino Del Sol	R-3R Zone (restricted multiple-family residential)	15.17
		G-C Zone (General Commercial)	15.30
		R-1-10 (single-family residential, 10,000 sf lot minimum)	15.17
		PRD Zone (Planning Residential Development)	15.20
South	Across Paseo Dorado: existing single-family residential neighborhood	R-1-15 Zone (single-family residential, 15,000 sf lot minimum)	15.17
East	Across Euclid Street: existing single-family residential neighborhood	R-1-15 Zone (single-family residential, 15,000 sf lot minimum)	15.17
West	Racquet Club Villas South multi-family townhome complex, FountainGlen at Jacaranda senior housing development	R3-R Zone (restricted multiple-family residential)	15.17
		O-P Zone (Office Professional)	15.30

FMC = Fullerton Municipal Code;
Source: Kimley-Horn, 2021.

2.4 Project Characteristics

2.4.1 Project Overview

The Project Applicant proposes to redevelop a 12.52-acre commercial retail property into a 164-DU residential community, including one lot with 49 detached single-family residential DU and one lot with 115 multi-family townhome DU. The proposed residential community is depicted on **Exhibit 2-5: Conceptual Site Plan**, and summarized in **Table 2-3: Lot Summary**.

Table 2-3: Lot Summary				
Lot	Housing Type	Lot Size (acres)	Total Units	Parking
1	Detached Single-Family Residential	6.0	49	147
2	Attached Multi-Family Residential Townhomes	6.52	115	345
Total		12.52	164	492

Source: JZMK Partners, 2021.

The proposed density would be 13.1 DU/net AC; see **Exhibit 2-5**. A homeowners’ association would be responsible for common area maintenance, as well as off-street parking.

The Project proposes approximately 49,268 sf of usable private and common open space on Lot 1, and 43,073 sf on Lot 2. Each unit would include private open space in the form of either backyards or patios. Additionally, a minimum of 48 of the attached units (the end units) are designed with roof decks. The attached units would also have 2nd floor balconies; neither the balconies nor optional roof decks are included in the private open space calculations. Common open space includes a recreation area with a pool on Lot 1 (7,000 sf) and two pocket parks in Lot 2 (totaling 4,900 sf). The Project also includes approximately 55,968 sf of landscaped slopes and other open space which provides visual relief but is not a usable space.

The Project includes a total of 492 parking spaces on-site, including 328 within two-car garages with direct access to each residence and 164 open off-street parking spaces.

2.4.2 Lot 1 – Detached Single-family Residential Units

The Applicant proposes to construct 49 single-family residential DU ranging from 1,900 to 2,600 sf. Typical lot sizes would measure 45 feet by 52 feet, with the average unit size of 2,230 sf. Of the 49 DUs, 22 DUs would be two-story, 13 DUs would be two-story with loft area, and 14 DUs would be three-story (up to 36 feet). Of the 22 two-story plans, 12 DU would be located adjacent to Paseo Dorado. All DUs would have a front-facing garage and private backyard open space.

Table 2-4: Single-family Residential Plan Summary, summarizes the proposed floor plans, floor areas, number of bedrooms, etc. of the proposed single-family detached units. Each unit would have an attached two-car garage.

Table 2-4: Single-Family Residential Plan Summary						
Plan #	Unit Count	Unit (SF)	No. Bedrooms	No. Baths	No. of Dens	Total Net SF
4 – Two Story	11	1,926	3	2.5	2	21,186
5 – Two Story	11	2,016	3	2.5	2	22,176
6 – Two Story with Lofts	13	2,327	4	2.5 bath (optional 0.5 bath)	2	30,251
7 – Three Story	14	2,546	4	3.5	3	35,644
Total	49	–	–	–	–	109,257

SF = square feet
Source: JZMK Partners, 2021.

The single-family residential DU would have a transitional modern architectural style with four color schemes; see **Exhibit 2-6a: Conceptual Single-Family Residential Elevations**. Elevations would be generally asymmetrical. Architectural distinction would be accomplished through roof eaves, smooth stucco walls and sidings, recessed windows, porch elements, and garage doors. Single-family residential DU renderings are shown in **Exhibit 2-6b: Conceptual Single-Family Residential Elevations**.



EXHIBIT 2-5: Conceptual Site Plan
The Pines at Sunrise Village Project



This page is intentionally left blank.



EXHIBIT 2-6a: Conceptual Single-Family Residential Elevations
The Pines at Sunrise Village Project

This page is intentionally left blank.



EXHIBIT 2-6b: Conceptual Single-Family Residential Renderings
The Pines at Sunrise Village Project

This page is intentionally left blank.

2.4.3 Lot 2 – Attached Multi-Family Residential Townhomes Units

The Applicant proposes 115 townhome units in 24 building clusters on the Project site’s northern portion. The townhomes would range from 1,400 sf to 1,950 sf, with an average size of 1,810 sf. Each building would contain between three to seven DUs. All townhomes would be three stories (36 feet to roof ridge). All townhome units would provide front entry private patios and second story balconies. Rooftop decks would be constructed on all end units provide additional private open space with a builder option for interior units. Each townhome would provide an attached two-car garage. **Table 2-5: Multi-Family Residential Townhome Plan Summary**, summarizes the proposed floor plans, floor areas, and configurations of the proposed townhome units.

Table 2-5: Multi-Family Residential Townhome Plan Summary					
Plan No.	Unit Count	Unit (SF)	No. Bedrooms	No. of Dens	No. Baths
1	6	1,427	2	0	2.5
1X	6	1,445	2	0	2.5
2	49	1,802	3	1	2.5
2X	12	1,797	3	1	2.5
3	42	1,929	3	1	2.5
Total	115	–	–	–	–
SF = square feet Source: JZMK Partners, 2021.					

The townhome units would be designed with a contemporary architectural style (with three color schemes); see **Exhibit 2-7a-e: Conceptual Multi-Family Residential Townhome Elevations** for each building block elevation. Townhome unit renderings are depicted in **Exhibit 2-8a-b: Conceptual Multi-Family Residential Townhome Renderings**. Elevations would be generally asymmetrical, with varying building treatments and façade articulation to avoid massing. Townhomes building materials would include horizontal siding, painted stucco in varied but complementary colors, metal awnings, window trim, and enhanced doorways and garage doors.

2.4.4 Open Space

Fullerton Municipal Code §15.20.110 establishes development standards for the PRD-I zone on sites less than 40 acres. Development standards are based on the type of streets on which the site is located and uses a combination of Building Types (FMC Chapter 15.10) and Frontage Types (FMC Chapter 15.12) to ensure a quality development compatible with its surroundings. This applies to all development standards for the PRD-I zone. The proposed Project includes a zone change from General Commercial to PRD-I. The PRD-I zone requires 15 percent of open space based on net acreage. Therefore, the Project would be required to provide a minimum 27,704 sf (approximately 0.64 acre) of open space on Lot 1, and 26,593 sf (approximately 0.61 acre) of open space on Lot 2. The proposed Project would comply with the FMC standards. As noted previously, Project open space would be provided through a combination of private open space, common open space, and “other” open space, the latter which is landscaped areas for visual relief that are generally not usable and therefore not included to determine compliance with the FMC standard. The summary of open space is provided below in **Table 2-6: Open Space Summary**.

Table 2-6: Open Space Summary				
Lot	Private Open Space	Common Open Space	Total	Other Open Space
1	40,912	8,356	49,268	47,893 landscaped slopes 3,790 in other open space
2	38,173	4,900	43,073	51,152 (walkways and visual but not usable open space)

SF = square feet
Source: JZMK Partners, 2021.

2.4.5 Landscaping

Exhibit 2-9: Conceptual Landscape Plan, depicts the proposed landscaping plan. Landscaping would be provided on landscaped slopes along Paseo Dorado and Euclid Street, in front and backyard setback areas, recreation areas and pocket parks, and along pedestrian walkways. The planting schedule would include various types of trees, including Australian Willow, Italian Cypress, Southern Magnolia, Yew Pine, and Fruitless Olive. All areas requiring slope revegetation planting would be irrigated with an automatically controlled irrigation system. Additionally, low water, drought tolerant plants, vines and groundcovers are proposed to provide a low maintenance, water efficient landscape pursuant to the City’s landscape ordinance No. 3226 (FMC §15.50).

2.4.6 Parking and Access

Parking and access are depicted in **Exhibit 2-5**. Pursuant to FMC §15.20.150, the parking standards for PRD-I zoned developments require two spaces per unit and one additional space per unit for guest parking. Based on these standards, the Project requires and would provide 492 total parking spaces, inclusive of 164 guest parking spaces. Lot 1 would provide 98 garage spaces (attached two-car garages) and 49 open guest parking spaces for 147 total spaces. Lot 2 would provide 230 garage spaces (attached two-car garages) and 115 open guest parking spaces for a total of 345 spaces. Of the 115 guest spaces, four are provided in compliance with the Americans with Disabilities Act.

Primary vehicular access to the Project site would be provided via three driveways, one on Camino Loma, one on Rosecrans Avenue, and one on Euclid Street. The 51-foot driveway access on Euclid Street would be two-way stop controlled and provide access to Lot 1. The 45-foot driveway on Rosecrans Avenue would be two-way stop controlled and provide access to Lot 2. The 45-foot driveway on Camino Loma would be stop controlled and similarly provide access to Lot 2. Internal roadways would be 20 to 22 feet for private alleys and 36 feet for internal drive aisles. The internal roadway network would provide access to all residential units between Lot 1 and Lot 2. No restricted driveways or gated entries are proposed. Emergency access and routes are depicted in **Exhibit 2-10: Fire Master Plan**. Internal drive aisles would accommodate standard fire lane turning radiuses and hammerhead turnaround maneuvers for emergency vehicles and fire services.

Public and reciprocal access would be maintained as part of the Project. Further, two driveways along internal “Street A” would provide access to the existing office building at 1901 Euclid Street, and the adjacent “not-a-part” 1.42-acre commercial parcel.

Pedestrian access within the Project site would be provided by sidewalks and crosswalks. Existing pedestrian sidewalks along Rosecrans Avenue and Euclid Street would remain.



FRONT ELEVATION



RIGHT ELEVATION



REAR ELEVATION



LEFT ELEVATION

EXHIBIT 2-7a: Conceptual Multi-Family Residential Townhome Elevations - Building 100
The Pines at Sunrise Village Project

This page is intentionally left blank.



FRONT ELEVATION



RIGHT ELEVATION



REAR ELEVATION



LEFT ELEVATION

This page is intentionally left blank.



FRONT ELEVATION



RIGHT ELEVATION



REAR ELEVATION



LEFT ELEVATION

This page is intentionally left blank.



FRONT ELEVATION



RIGHT ELEVATION



REAR ELEVATION



LEFT ELEVATION

EXHIBIT 2-7d: Conceptual Multi-Family Residential Townhome Elevations - Building 400
The Pines at Sunrise Village Project

This page is intentionally left blank.



FRONT ELEVATION



RIGHT ELEVATION



REAR ELEVATION



LEFT ELEVATION

This page is intentionally left blank.



EXHIBIT 2-8a: Conceptual Multi-Family Residential Townhome Renderings
The Pines at Sunrise Village Project

This page is intentionally left blank.



EXHIBIT 2-8b: Conceptual Multi-Family Residential Townhome Renderings
The Pines at Sunrise Village Project

This page is intentionally left blank.



LEGEND

1. Central pocket park open space area with real turf for passive play, bench seating, outdoor BBQ counter, and table seating with overhead shade structure for small social events and group gatherings.
2. Secondary pocket park, with large turf area for passive and active play, bench seating, and shade / buffer trees.
3. Project Rec. Area with pool, cabanas, lounge seating, and outdoor fire-pit seating area with string lights.
4. Eight community cluster mailboxes and two parcel locker units for Townhomes, per USPS review and approval.
5. Four community cluster mailboxes and one parcel locker unit for SFD, per USPS review and approval.
6. Proposed tree, per Planting Plan.
7. 4" wide community natural colored concrete sidewalk, with light top-cast finish and saw-cut joints.
8. Modular Wetland System, per Civil plans.
9. 5x5 Pedestrian paver nodes.
10. Tree rock seating area with enhanced pedestrian pavers, focal tree, and adirondack seating.
11. Accessible parking stall and striping, per Civil plans.
12. Guest parking stall.
13. Natural colored concrete driveway, with light broom finish and tooled joints.
14. Private patio / yard area, homeowner maintained.
15. Common area landscape, builder installed and HOA maintained.
16. Community dog bag station (black in color), for pet owners.
17. Property line.
18. Public street R.O.W.
19. Proposed public street sidewalk, per Civil plans.
20. Transformer to be screened with landscape, quantity and final locations to be determined.
21. Short term bike parking (1 bike racks to accommodate 2 bike stalls).
22. Mixed-use unit patios with elevated unit entryways and paved patios.
23. Project monument sign wall at vehicular entryways (3), per future permit and submittal. See sheet L4 (Wall & Fence Plan).
24. Two proposed 4' x 6' tree grates for existing Lagerstroemia street trees.
25. Existing enhanced vehicular pavers to remain in place.
26. New proposed tree well and street tree per Planting Plan.
27. 4'-6" wide community natural colored concrete sidewalk at parking fronts, with light top-cast finish and saw-cut joints.
28. Main project entryway with enhanced roundabout and shrub planting.
29. Proposed wall, pilaster, gate or fence, per Wall & Fence Plan.



*Conceptual image of landscape screening.



21



16



6



4 5

*Conceptual images (provided herein are conceptual and subject to change)

EXHIBIT 2-9: Conceptual Landscape Plan
The Pines at Sunrise Village Project



Kimley»Horn

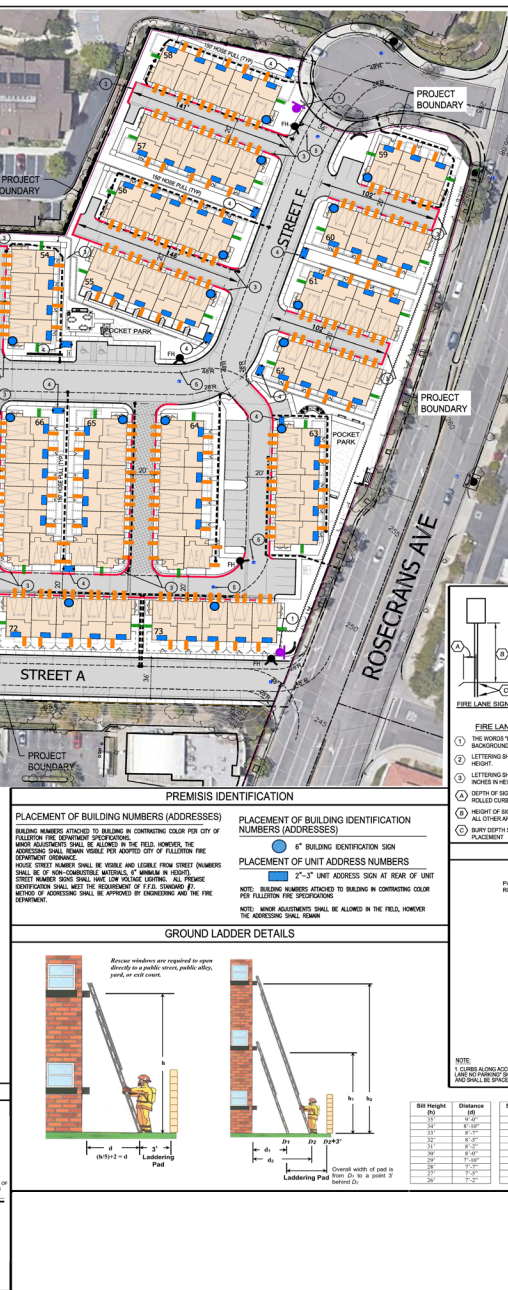
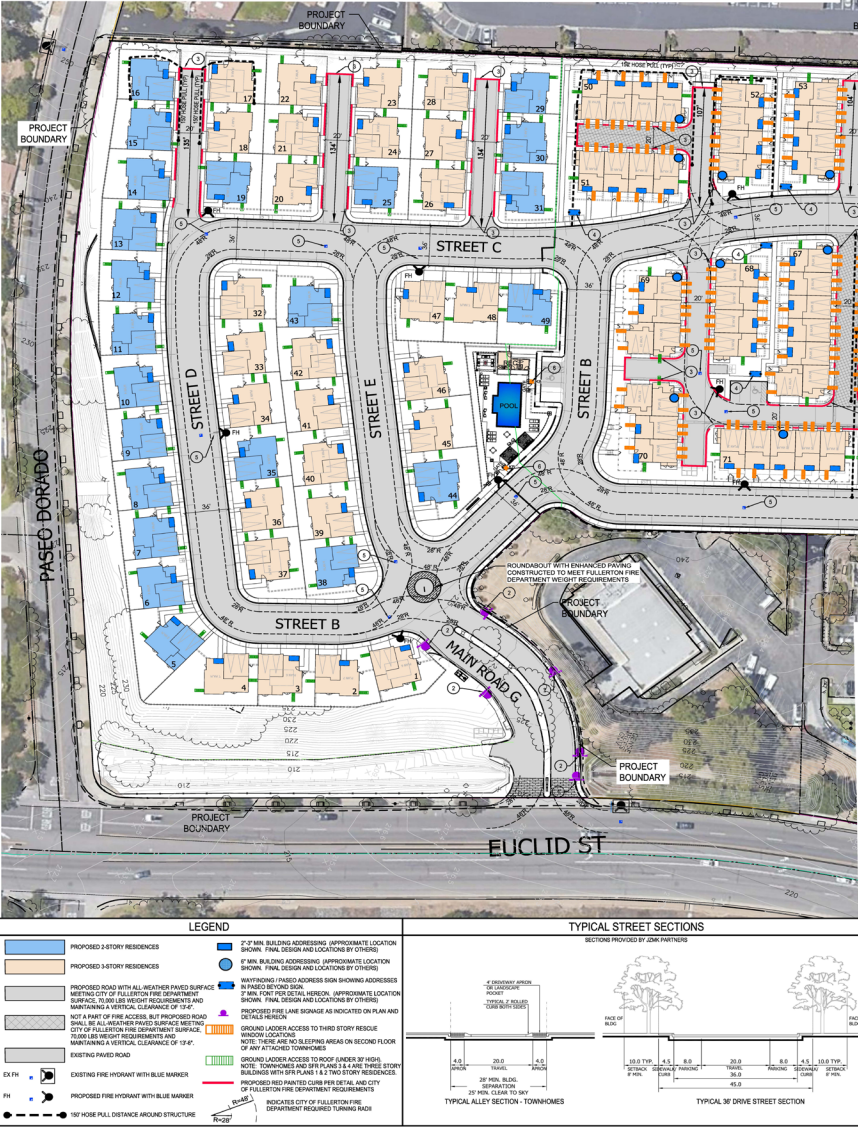
This page is intentionally left blank.

FIRE MASTER PLAN

THE PINES AT SUNRISE VILLAGE

FULLERTON, CA

TENTATIVE TRACT NO. 19148



PREMISES IDENTIFICATION

PLACEMENT OF BUILDING NUMBERS (ADDRESSES)

BUILDING NUMBERS ATTACHED TO BUILDING IN CONTINUOUS COLUMN PER CITY OF FULLERTON FIRE DEPARTMENT REQUIREMENTS. NUMBER ASSIGNMENTS SHALL BE ALLOWED IN THE FIELD, HOWEVER, THE ADDRESSING SHALL BE NON-COMBUSTIBLE MATERIALS. A MINIMUM IN HEIGHT SHALL BE 6" IN HEIGHT. THE SIGN SHALL BE 18 INCHES WIDE AND 36 INCHES HIGH. THE SIGN SHALL BE 18 INCHES WIDE AND 36 INCHES HIGH.

PLACEMENT OF BUILDING IDENTIFICATION NUMBERS (ADDRESSES)

4" x 6" UNIT ADDRESS SIGN

PLACEMENT OF UNIT ADDRESS NUMBERS

2" x 3" UNIT ADDRESS SIGN IN CENTER OF UNIT FOR FULLERTON FIRE DEPARTMENT

COMBUSTIBLE CONSTRUCTION LETTER

JULY 7, 2021
CITY OF FULLERTON FIRE DEPARTMENT
311 N. COLLETT AVENUE
FULLERTON, CA 92742

SUBJECT: COMBUSTIBLE CONSTRUCTION LETTER: THE PINES AT SUNRISE VILLAGE

THE PURPOSE OF THIS LETTER IS TO NOTIFY YOU THAT THIS PROJECT SHALL INITIAL ALL REQUIRED PAVED FIRE ACCESS ROADS THAT MEET FULLERTON FIRE DEPARTMENT REQUIREMENTS FOR THE APPROVED PLAN. ALL FIRE HYDRANTS AND WATER SUPPLY FOR FIRE FIGHTING PURPOSES SHALL BE INSTALLED FOR THE APPROVED PLAN AND SHALL MEET ALL FIRE FLOW REQUIREMENTS, PRIOR TO ANY COMBUSTIBLE CONSTRUCTION MATERIALS BEING DELIVERED FOR CONSTRUCTION.

PARKING ENFORCEMENT LETTER

JULY 7, 2021
CITY OF FULLERTON FIRE DEPARTMENT
311 N. COLLETT AVENUE
FULLERTON, CA 92742

RE: PARKING ENFORCEMENT PLAN THE PINES AT SUNRISE VILLAGE FOR THE ABOVE REFERENCED IS STATED AS FOLLOWS:

ALL FIRE LANES WITHIN SITE SHALL BE MAINTAINED AND NO EXCESS SIGNAGE SHALL BE PERMITTED ALONG ANY PORTION OF AN UNPAVED FIRE LANE. THE PROJECT DESIGN PER THROUGHOUT ENGINEERING COMMITMENTS AND AGREEMENTS WILL ESTABLISH THE TURNING AND NO PARKING AREAS WITHIN THE PROPERTY IN ACCORDANCE WITH SECTION 208B OF THE CALIFORNIA VEHICLE CODE AND FULLERTON FIRE DEPARTMENT REQUIREMENTS. THE ANY SAVED SIGNAGE SHALL BE INSTALLED IN ACCORDANCE WITH ALL APPLICABLE LAWS, INCLUDING WRITTEN MARKINGS, CILING, LIGHTING AND TOWING VEHICLES IN VIOLATION.

THE PROJECT DESIGNERS WILL CONTACT WITH A CERTIFIED APPRAISER AND A COST ESTIMATE TO REMOVE VEHICLES IN VIOLATION OF THESE REQUIREMENTS. THESE REQUIREMENTS SHALL BE ENFORCED BY THE CITY OF FULLERTON FIRE DEPARTMENT. FOR ALL COSTS INCURRED IN REMOVING SUCH VIOLATION, INCLUDING REMOVAL TOWING COSTS, CITATIONS AND FINE.

CONSTRUCTION NOTES

- INSTALL FIRE LANE ENTRANCE SIGN PER DETAIL HEREON
- INSTALL FIRE LANE - NO PARKING SIGN PER DETAIL HEREON
- INSTALL RED PAVED CURB PER DETAIL HEREON
- INSTALL WAYFINDING SIGN WITH MINIMUM 2" LETTERING, VISIBLE FROM FIRE ACCESS DRIVE PER DETAIL HEREON
- INSTALL BLUE REFLECTIVE MARKER ON HYDRANT SIDE OF ROADWAY FIRE DEPARTMENT PER FULLERTON FIRE DEPARTMENT REQUIREMENTS
- INSTALL KNOX BOX W/ 3 SETS OF GATE KEYS PER FULLERTON FIRE DEPARTMENT REQUIREMENTS

FIRE FLOW INFORMATION PER CITY OF FULLERTON FIRE DEPARTMENT REQUIREMENTS

REQUIRED FIRE FLOW OF 1,500 GPM / 3 HOURS AT 20 PSI FOR THE LARGEST BUILDING (TOWNHOMES) PLUS 0.5 GPM / 5 HOURS WITH 1/2" VES CONSTRUCTION RESISTANCES PROTECTED WITH NFPA 13 TOWNHOMES AND NFPA 13-D FOR SINGLE FAMILY DWELLINGS.

SHEET INDEX

SHEET 1 FIRE MASTER PLAN / NOTES / DETAILS

SHEET 2 AUTOTURN EXHIBIT AT ROUNDABOUT

EXHIBIT 2-10: Fire Master Plan
The Pines at Sunrise Village Project

This page is intentionally left blank.

2.4.7 Utilities and Infrastructure

Water Service. The Project site is served by existing utility infrastructure including a 12-inch Zone 2 water line in Euclid Street, a 24-inch Zone 2 water line and a 12-inch Zone 3 water line in Rosecrans Avenue, an 8-inch Zone 2 water line in Paseo Dorado, and an 8-inch Zone 2 water line in the Camino Loma cul-de-sac. The Project would connect to the existing 24-inch Zone 2 line in Rosecrans Avenue and 8-inch Zone 2 line in Euclid Street and loop a new public domestic water line in the proposed Street A and Main Road G internal driveways to bring water service to the site. Proposed private domestic water lines would then connect to each residential unit from the public water loop line to provide water service.

Sewer Service. The Project site is within the City's Sewer Maintenance District 2 and served by an existing 8-inch sewer line in Rosecrans Avenue with an 8-inch sewer lateral at the existing Rosecrans Avenue access driveway. The existing sewer line connects to a 10-inch line in Euclid Street. There are public sewer lines in Euclid Street and Paseo Dorado. The Project would use a gravity sewer system to carry flows to the existing sewer lines. The Lot 1 single-family residential units would connect to the existing 10-inch sewer main in Euclid Street and the Lot 2 townhome units would connect to the existing 8-inch sewer line in Rosecrans Avenue.

Stormwater. An existing trapezoidal-shaped storm drain channel is located parallel to Euclid Street and runs underneath the proposed Project driveway access on Euclid Street. There are existing catch basins on both sides of the Euclid Street driveway entrance. Additionally, grated inlets exist throughout the eastern part of the Project site. Stormwater currently sheet flows and drains easterly toward the inlets and storm drain channel. A proposed water quality device at the Euclid Street driveway access would discharge flows into the existing channel. The Project's proposed hydrology and drainage are further discussed in **Section 4.10: Hydrology and Water Quality**.

2.4.8 Requested Entitlements

General Plan Revision (LRP-2021-0006). The proposed Project would require a General Plan Revision from Commercial to Low/Medium Residential. The Low/Medium Residential land use designation allows for residential neighborhoods, which may include multiple-unit attached dwellings and Planned Residential Developments to a maximum density of 15 DU/AC. The intent is to provide for duplexes, mobile homes, townhouses and condominium developments with a variety of densities and living arrangements.

Zoning Amendment (LRP-2021-0007). The Project would require a zoning amendment from General Commercial to Planned Residential Development Infill (PRD-I). Per FMC §15.20.110, the PRD-I zone is intended to provide standards for infill development on sites less than 40 acres in size. Residential developments are permitted under the PRD-I zone.

Tentative Tract Map (SUB-2021-0002 / TTM No. 19148). The Project proposes a residential subdivision with two lots for condominium purposes.

Major Site Plan (ZON-2021-0032). The Project requires review of the site improvements and compliance with the applicable development standards.

Development Agreement (LRP-2021-0008). A draft Development Agreement specifies the standards and conditions that will govern development of the property and details the Applicant's and City's obligations. The Development Agreement assigns Applicant responsibilities for physical, off-site street improvements on project frontages along Camino Loma, Rosecrans Avenue, Euclid Street, and Paseo Dorado. Street

improvements would include a mix of grind and overlay, and in some portions of the above-mentioned streets, complete removal and replacement of pavement. Roadway improvements would adhere to the City's pavement thickness standards, which are as follows:

- Rosecrans Avenue and Euclid Street: 6-inch asphalt concrete over 8-inch aggregate base.
- Paseo Dorado and Camino Loma: 4-inch asphalt concrete over 6-inch aggregate base.

2.5 Project Construction Activities and Phasing

Project construction is proposed to begin in the third quarter of 2022 (July) and occur over approximately 18 to 24 months. For purposes of this environmental analysis, Project construction is assumed would occur over approximately 18 months, in the following sequence:

- Demolition site preparation: 45 days
- Grading: 55 days
- Building construction: 400 days
- Paving, architectural coating, and landscaping: 60 days
- Model unit opening is anticipated in June 2024. Project completion is estimated in July 2024.

Approximately 90,000 cubic yards (cy) of cut and fill grading activities are anticipated. Soils would be balanced onsite and no import/export of soils would be required. . The Final grading plan would be reviewed and approved by the City prior to Grading Permit issuance.

2.6 Agreements, Permits, and Approvals

The City, as Lead Agency, has discretionary authority over the proposed Project. Other agencies, in addition to the City of Fullerton, are expected to use this IS/MND in their decision-making process. To implement this Project, at a minimum, the following discretionary permits/approvals would be granted by the City and others:

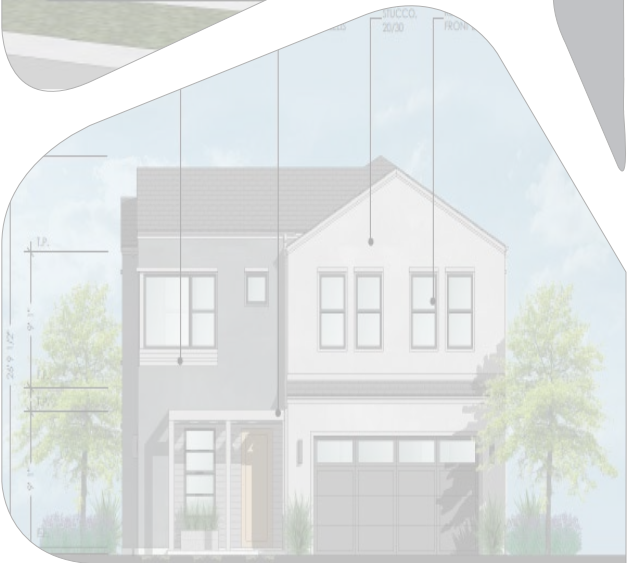
City of Fullerton

- General Plan Revision (LRP-2021-0006);
- Zoning Amendment (LRP-2021-0007);
- Tentative Tract Map (SUB-2021-0002 / TTM No. 19148);
- Major Site Plan (ZON-2021-0032)
- Development Agreement (LRP-2021-0008)

Other

- Santa Ana Regional Water Quality Control Board (Regional Board). National Pollutant Discharge Elimination System (NPDES) Compliance/Low Impact Development (LID) approvals
- Department of Toxic Substance Control – Approval of Response Plan and Report of Findings

Initial Study Checklist



3.0 ENVIRONMENTAL CHECKLIST FORM

3.1 Background

1.	Project Title: The Pines at Sunrise Village Project
2.	Lead Agency Name and Address: City of Fullerton 303 West Commonwealth Avenue Fullerton, California 92832
3.	Contact Person and Phone Number: Heather Allen, Planning Manager Email: heather.allen@cityoffullerton.com 714 738-6884
4.	Project Location: County of Orange, City of Fullerton, at 1144 Rosecrans Avenue, 1715/1723 Euclid Street, and 1701/1751/1801-1900 Euclid Street
5.	Project Sponsor's Name and Address: Shopoff Realty Investments, L.P. 2 Park Plaza, Suite 700 Irvine, California 92614
6.	General Plan Designation: Commercial
7.	Zoning: General Commercial
8.	Description of Project: See Section 2.4: Project Characteristics
9.	Surrounding Land Uses: See Section 2.3.1: Surrounding Land Uses
10.	Other public agencies whose approval is required (e.g., permits). <ul style="list-style-type: none">▪ Santa Ana Regional Water Quality Control Board▪ Department of Toxic Substance Control
11.	Have California Native American tribes traditionally and culturally affiliated with the Project area requested consultation pursuant to Public Resources Code §21080.3.1? If so, is there a plan for consultation that includes, for example, the determination of significance of impacts to tribal cultural resources, procedures regarding confidentiality, etc.? As of this writing, no California Native American tribe has requested consultation; see also Section 4.18.

3.2 Environmental Factors Potentially Affected

The environmental factors checked below would be potentially affected by the proposed Project, involving at least one impact that is a "Potentially Significant Impact" as indicated by the checklist on the following pages.

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

3.3 Lead Agency 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.	X
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 or a 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 EIR or NEGATIVE DECLARATION pursuant to applicable standards, and (b) have been avoided or mitigated pursuant to that earlier EIR or NEGATIVE DECLARATION, including revisions or mitigation measures that are imposed upon the proposed Project, nothing further is required.	

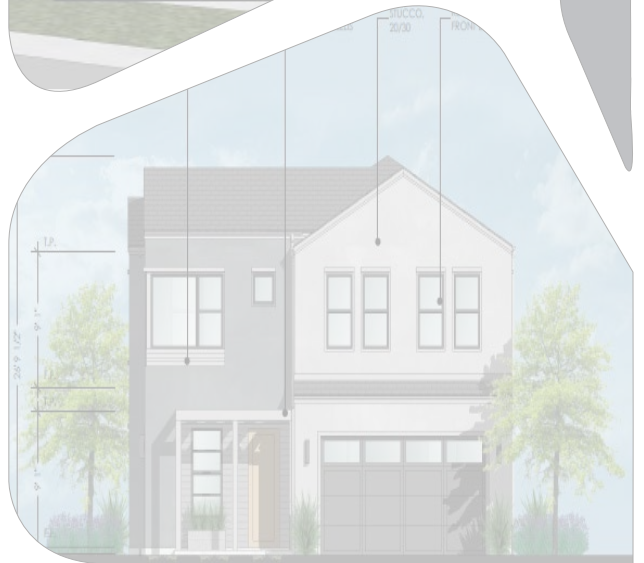
CITY OF FULLERTON

Heather Allen
Heather Allen, Planning Manager

9/16/2021
Date

This page intentionally left blank.

Environmental Analysis



4.0 EVALUATION OF ENVIRONMENTAL IMPACTS

The following environmental analysis is patterned after State CEQA Guidelines Appendix G. An explanation is provided for all responses except “No Impact” responses, which are supported by the cited information sources. The responses consider the whole action involved with the proposed Project: on and off the site, direct and indirect, and short-term construction and long-term operational. The explanation of each issue also identifies the significance criteria or threshold, if any, used to evaluate each question, and the mitigation identified, if any, to avoid or reduce the impact to less than significant. To each question, there are four possible responses:

No Impact. The Project would not have any measurable environmental impact.

Less Than Significant Impact. The Project would have the potential to impact the environment, although this impact would be below established thresholds that are considered to be significant.

Less Than Significant with Mitigation Incorporated. The Project would have the potential to generate impacts, which may be considered as a significant effect on the environment, although mitigation measures or changes to the Project’s physical or operational characteristics could reduce these impacts to a less than significant level.

Potentially Significant Impact. The Project could have impacts, which may be considered significant, and therefore additional analysis is required to identify mitigation. A determination that there is a potential for significant effects indicates the need to more fully analyze the Project’s impacts and identify mitigation.

As previously noted, the existing on-site commercial retail uses total approximately 108,300 SF, of which 45 percent are vacant. Consistent with relevant case law (*North County Advocates v. City of Carlsbad* (2015)—Cal.App.4th—Case No. D066488), this Initial Study assumes 100 percent occupancy and includes these vacant use’s historical operational information in establishing the environmental baseline for the Project’s impact analyses.

4.1 Aesthetics

Environmental Issue	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Except as provided in Public Resources Code §21099, would the project:				
a) Have a substantial adverse effect on a scenic vista?			X	
b) Substantially damage scenic resources, including, but not limited to trees, rock outcroppings, and historic buildings within a state scenic highway?				X
c) If in a non-urbanized area, 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?			X	
d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?			X	

4.1.1 IMPACT ANALYSIS

4.1a *Would the project have a substantial adverse effect on a scenic vista?*

Less Than Significant Impact. The General Plan EIR notes scenic vistas within the City include views of the West and East Coyote Hills from the southern portion of the City. The Project site is approximately 0.5 miles south of the West Coyote Hills area. The surrounding area is largely developed and built out, with a mix of residential and commercial uses. Due to existing topography and developed nature of the surrounding areas, views of the West Coyote Hills area are highly obstructed. According to The Fullerton Plan Exhibit 10: Scenic Corridors, Euclid Street from Malvern Avenue to the City’s jurisdictional border with City of La Habra and Rosecrans Avenue from Beach Boulevard to Euclid Street is considered a scenic corridor. The Project frontages on Rosecrans Avenue and Euclid Street are adjacent to the identified scenic corridors.

The City has Scenic Corridor Design guidelines, which provide special controls to maintain scenic corridors and viewsheds along specific roadways in the form of preserving natural grades and landscapes, stepped back facades, and landscaped screenings.

The proposed Project would allow for two- and three-story single-family residences and townhomes in a developed part of the City. Currently, the existing single-family residences located south of Paseo Dorado do not have views of the West Coyote Hills due to existing topography (approximately 212 feet msl compared to 241 feet msl at project site) and existing intervening uses. Existing development and uses

include structures at the Sunrise Village Shopping Center and ornamental landscaping, utility pole lines, mature trees, and other structures that block views to the north from Paseo Dorado.

The proposed Project would comply with the City's Scenic Corridor Design Guidelines by maintaining the existing setback from Paseo Dorado and maintain the landscaped slope fronting Euclid Street. As a result, the proposed residences are set back approximately 90 feet from Euclid Street. Additionally, several structures along Euclid Street within the Sunrise Village Shopping Center would remain and are not part of the proposed project. These structures include the building at 1901 Euclid Street and commercial uses at 1020 Rosecrans Avenue and 1026-1030 Rosecrans Avenue. As a result, the proposed Project would not alter existing views of West and East Coyote Hills from Euclid Street at Rosecrans Avenue. No off-site improvements are proposed as part of the Project. Therefore, Project implementation would not have an adverse effect on a scenic vista. Impacts would be less than significant, and no mitigation is required.

4.1b *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. There are no eligible or officially designated State scenic highways that traverse or are near the City. The designated scenic highway located nearest the City is SR-57, which is approximately 3.7 miles northeast of the Project site.⁷ There are no trees, rock outcroppings, or buildings on the Project site that could be considered a scenic resource. The Project would not damage scenic resources within a State scenic highway. Therefore, no impact would occur and no mitigation is required.

4.1c *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. The Project site is within an urbanized area and is fully developed as the Sunrise Village Shopping Center. Land uses bordering the Project site are listed in **Table 2-2: Surrounding Land Uses and Zoning**. Overall, land uses include multi-family residences, commercial uses, senior housing development, and single-family residences.

The Project proposes to demolish most of the existing on-site improvements on-site and construct 164 residences. The maximum proposed building height would be approximately 36 feet (to roof ridge). The proposed Project would introduce a residential land use that would complement the existing surrounding residential neighborhoods. The Project would use stucco, brick veneer, metal accents, siding, and several paint schemes with warm earth tones, whites, greens, greys as part of the architectural composition. The diversity of material choice and colors would match and complement the overall existing surrounding uses and single-family residences, creating a cohesive and compatible neighborhood identity.

The PRD-I zoning development standards and regulations specified in the FMC §15.20.110 do not include standards governing scenic quality. Although the City does not have a Scenic Corridor Overlay specified in the FMC, site plan review process detailed in FMC §15.47.060 would review and evaluate site plan design to ensure public views and scenic vistas are preserved from unreasonable encroachment. As discussed above, the General Plan EIR notes scenic vistas within the City include views of the West and East Coyote Hills from the southern portion of the City. In addition, the Project is adjacent to identified scenic corridors, and therefore subject to comply with the Scenic Corridor Design Guidelines. The Project would setback the residential development from Paseo Dorado and Euclid Street and maintain landscaped slopes

⁷ California Department of Transportation. (2018). *California Scenic Highway Mapping System*. Available at: <https://caltrans.maps.arcgis.com/apps/webappviewer/index.html?id=2e921695c43643b1aaf7000dfcc19983>, Accessed June 1, 2021.

along Euclid Street to maintain viewsheds. The Project site is approximately 0.5 mile south of the West Coyote Hills area. The City would ensure compliance with all required development standards through the City's Planning and Building Division's review during the application process and future review of building permits. Therefore, impacts would be less than significant and no mitigation is required

4.1d *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. Existing outdoor lighting at or near the Project site includes residential lighting, commercial signage and parking light standards associated with the shopping center, and street lighting along Euclid Street and Rosecrans Avenue. The proposed Project would generate lighting from two primary sources: lighting from building interiors that would pass through windows, and lighting from exterior sources (e.g., street lighting, recreation areas and pocket parks lighting, building illumination, security lighting, and landscape lighting).

The Project proposes lighting typical of a residential community. Pedestrian sidewalk lighting bollards and street lighting standards with shielded covers would be placed throughout the internal streets. Residences would include wall sconces for exterior nighttime lighting and security. Landscaped areas would have tree uplighting. Lighting would be directed onto driveways and walkways within the Project site and away from residences and adjacent properties. The lighting system (includes common areas and front yards) would be automated using an electronic transformer time switch device. Project lighting would be required to comply with FMC §15.56.110 (General Provisions for Illumination), which requires lighting provided to illuminate parking areas be arranged so as to reflect the light and glare away from adjacent properties. Street parking and guest parking on the Project site would comply with FMC §15.56.110 to ensure that lighting spillage would be less than significant.

In addition, the City's Planning and Building Division would review any proposed lighting to ensure conformance with the California Building Code, Title 24 (California Code of Regulations), as well as the California Green Building Standard Code (Part 11 of Title 24, California Code of Regulations), such that only the minimum amount of lighting is used and no light spillage occurs. Although the proposed Project would introduce new light sources, the surrounding area is urban and already illuminated. The proposed lighting conditions would be similar to that currently surrounding the Project site, which would not cause adverse effects; therefore, a less than significant impact would occur and no mitigation is required.

Reflected light (glare) can be caused by sunlight or artificial light reflecting from finished surfaces such as window glass or other reflective materials. Buildings constructed of highly reflective materials from which the sun reflects at a low angle commonly cause adverse glare. The proposed Project would not use materials known to cause glare, such as mirrored/reflective glass. The residences would include a variety of materials, including stucco, painted metal awnings and porch trellis, vinyl sliding doors, vinyl windows, and horizontal sidings. These materials would not generate noticeable glare. Therefore, a less than significant impact would occur and no mitigation is required.

4.2 Agricultural and Forestry Resources

Environmental Issue	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Department of Conservation as an optional model to use in assessing impacts on agriculture and farmland. 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?				X
b) Conflict with existing zoning for agricultural use, or a Williamson Act contract?				X
c) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code §12220(g)), timberland (as defined by Public Resources Code §4526), or timberland zoned Timberland Production (as defined by Government Code §51104(g))?				X
d) Result in the loss of forest land or conversion of forest land to non-forest use?				X
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?				X

4.2.1 INTRODUCTION

The California Department of Conservation Farmland Mapping and Monitoring Program (FMMP) was established by the State Legislature in 1982 to assess the location, quality, and quantity of agricultural lands and conversion of these lands over time. The FMMP has established five farmland categories:

- Prime Farmland comprises the best combination of physical and chemical features able to sustain long-term agricultural production. The land must be able to store moisture and produce high yields.
- Farmland of Statewide Importance possesses similar characteristics to Prime Farmland with minor shortcomings, such as less ability to hold and store moisture and more pronounced slopes.
- Unique Farmland has a production history of propagating crops with high-economic value.
- Farmland of Local Importance is important to the local agricultural economy. Local advisory committees and county-specific board of supervisors determine this status.
- Grazing Land is suitable for browsing or grazing of livestock.

The FMMP has also established an Urban and Built-Up Land category, which is defined as land developed at a density of at least 1.0 DU per 1.5 acres, or approximately 6 structures to a 10-acre parcel. Land uses include, but are not limited to, residential, industrial, office/commercial, institutional, and public administration. The Williamson Act, codified in 1965 as the California Land Conservation Act, allows local governments to enter into contracts with private landowners with the intent of restricting the use of land to agricultural or related open space through tax incentives. These incentives tax farmers based on an open space designation, which is a much lower rate than the full market value tax. Through this contract, farmers agree to freeze development of their land for 10 years.

4.2.2 IMPACT ANALYSIS

4.2a 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 FMMP does not identify any Prime Farmland, Unique Farmland, Farmland of Statewide Importance, or Farmland of Local Importance on the Project site or in the Project vicinity.⁸ The FMMP has designated the Project site as Urban and Built-Up Land. No farmland would be converted to non-agricultural use. Therefore, no impact would occur and no mitigation is required.

4.2b Would the project conflict with existing zoning for agricultural use, or a Williamson Act contract?

No Impact. Neither the Project site nor the adjacent properties are zoned for agricultural use; see **Exhibit 2-4**. Additionally, the most recent California Department of Conservation Williamson Act Map does not identify the Project site or the surrounding area as being under a Williamson Act contract.⁹ Therefore, no impact would occur and no mitigation is required.

4.2c Would the project conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code §12220(g)), timberland (as defined by Public Resources Code §4526), or timberland zoned Timberland Production (as defined by Government Code §51104(g))?

4.2d Would the project result in the loss of forest land or conversion of forest land to non-forest use?

No Impact. The Project site and surrounding areas are not zoned forest land or timberland; see **Exhibit 2-4**. The Fullerton Plan does not identify any forest land or timberland preservation goals or policies. Therefore, the proposed Project would not conflict with existing zoning for, or cause rezoning of, forest land and timberland. Additionally, the proposed Project would not result in a loss of forest land or conversion of forest land to non-forest use, as none are present on or near the Project site. No impact would occur and no mitigation is required.

⁸ State of California Department of Conservation, California Important Farmland Finder, available at: <http://maps.conservation.ca.gov/ciff/ciff.html>, Accessed June 7, 2021.

⁹ California Department of Conservation. (2016). *Williamson Act/Land Conservation Act*. <http://www.conservation.ca.gov/dlrp/lca>. Accessed June 7, 2021.

4.2e *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 and surrounding areas are developed with urban land uses with no farmland or forest land exist nearby. The Project would not result in the conversion of Farmland to non-agricultural use or conversion of forest land to non-forest use. Therefore, no impact would occur and no mitigation is required.

4.3 Air Quality

Air quality modeling outputs and results are included in **Appendix A: Air Quality and Greenhouse Gas Emissions Data**, and summarized herein.

Environmental Issue	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to make the following determinations. Would the project:				
a) Conflict with or obstruct implementation of the applicable air quality plan?			X	
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?			X	
c) Expose sensitive receptors to substantial pollutant concentrations?			X	
d) Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?			X	

4.3.1 IMPACT ANALYSIS

4.3a *Would the project conflict with or obstruct implementation of the applicable air quality plan?*

Less Than Significant Impact. The Project site is in the South Coast Air Basin (Air Basin) which includes all of Orange County and the non-desert portions of San Bernardino, Los Angeles, and Riverside counties. The Air Basin is approximately 6,600 square miles extending from the Pacific Ocean to the San Gabriel, San Bernardino, and San Jacinto Mountains. The Air Basin is a coastal plain with broad valleys and low hills, and semi-arid climate. The South Coast Air Quality Management District (South Coast AQMD) and the California Air Resources Board (CARB) monitor the Air Basin’s air quality.

The Air Quality Management Plan (AQMP) is prepared by South Coast AQMD and the Southern California Association of Governments (SCAG). Air quality plans describe air pollution control strategies and measures to be implemented by a city, county, region, and/or air district. The primary purpose of an air quality plan is to bring an area that does not attain federal and State air quality standards into compliance with the requirements of the federal Clean Air Act and California Clean Air Act. Non-attainment is used to refer to an air basin where one or more ambient air quality standards are exceeded. In addition, air quality plans are developed to ensure that an area maintains a healthful level of air quality based on the National Ambient Air Quality Standards (NAAQS) and the California Ambient Air Quality Standards (CAAQS).

The current plan is the 2016 AQMP, which was adopted on March 3, 2017. The 2016 AQMP is designed to meet the federal and State Clean Air Act planning requirements and focuses on federal ozone and ultra-

fine particulate matter (PM_{2.5}) standards. The South Coast AQMD's AQMP was prepared to accommodate growth; to reduce the high levels of pollutants within the areas under the jurisdiction of South Coast AQMD; and to attain clean air within the region. Projects that are considered consistent with the AQMP would not interfere with attainment because this growth is included in the projections used to formulate the AQMP.

The South Coast AQMD's *CEQA Air Quality Handbook* identifies two key indicators of consistency with the AQMP:

1. Whether a project will result in an increase in 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 AQMP.
2. Whether a project will exceed the assumptions in the AQMP based on the year of project buildout and phase.

Concerning the first criterion, based on the air quality modeling analysis conducted for the proposed Project, Project construction and operation would not result in significant impacts based on the South Coast AQMD thresholds of significance. Therefore, Project construction and operation would not increase the frequency or severity of existing air quality violations. The proposed Project would not contribute to the exceedance of any air pollutant concentration standards.

Concerning the second criterion, SCAG's 2016 AQMP was adopted on March 3, 2017. The 2016 AQMP is designed to meet the State and federal Clean Air Act planning requirements and focuses on federal ozone and ultra-fine particulate matter (PM_{2.5}) standards. The South Coast AQMD's AQMP was prepared to: accommodate growth; reduce the high levels of pollutants within the areas under the jurisdiction of South Coast AQMD; and attain clean air within the region. Projects that are considered consistent with the AQMP would not interfere with attainment because this growth is included in the projections used to formulate the AQMP.

SCAG has developed growth forecasts for cities and counties, which are based on General Plans and included in SCAG's *Connect SoCal 2020-2045 Regional Transportation Plan/Sustainable Communities Strategy (RTP/SCS)*; see Threshold 4.14a below. However, the 2016 AQMP was adopted prior to the most recent SCAG RTP/SCS. Rather, the South Coast AQMD used the SCAG 2012 – 2035 RTP growth forecasts to develop the 2016 AQMP.

The Project site is designated Commercial and zoned General Commercial. The proposed Project would require a General Plan Revision to change the land use designation from Commercial to Low/Medium Density Residential and a Zoning Amendment to change the zoning from General Commercial to Planned Residential Development Infill (PRD-I).

There is no population assumed for the Project site under the existing General Plan or SCAG forecasts, which are also assumed in the AQMP, given the Project site is designated Commercial. The proposed Project would increase the City's population by 474 persons; see Response 4.14a. This increase represents nominal population growth (approximately 0.34 percent) of SCAG's forecast population for the City of 139,905 persons for 2045. Therefore, the Project would not induce substantial population growth. As such, the proposed Project would not interfere with attainment because this growth is nominal and would not conflict with the projections used to formulate the AQMP.

As addressed in the following analysis, total Project emissions are less than the South Coast AQMD significance thresholds and localized emissions during construction and operations would not exceed South Coast AQMD Localized Significance Thresholds (LSTs); see Thresholds 4.3b and 4.3c below. The Project-related emissions increase would not conflict with or obstruct implementation of the AQMP or attainment of ambient air quality standards. As such, the Project would be consistent with Criterion No. 2.

The determination of AQMP consistency is primarily concerned with the long-term influence of a project on air quality in the Air Basin. The proposed Project would not result in a long-term impact on the region's ability to meet federal and State air quality standards. Also, the proposed Project would be consistent with the AQMP goals and policies for fugitive dust control. As discussed above, the proposed Project would not conflict with or obstruct implementation of the AQMP and a less than significant impact.

4.3b *Would the project 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?*

Construction Emissions

Less Than Significant Impact. Air quality standards in Southern California are identified by the U.S. Environmental Protection Agency (U.S. EPA) in the NAAQS and by CARB in the California CAAQS. The air quality standards of the following five criteria pollutants relate to development projects: ozone (O₃), carbon monoxide (CO), nitrogen dioxide (NO₂), sulfur dioxide (SO₂), and particulate matter (PM₁₀ and PM_{2.5}). Of these criteria pollutants, the Air Basin, in which Fullerton lies, is designated nonattainment for O₃ and particulate matter, meaning the Air Basin has recorded exceedances of the air quality standards for these pollutants in recent years.¹⁰

The Project's construction activities would generate short-term emissions of criteria air pollutants. The criteria pollutants of primary concern within the Project area include ozone-precursor pollutants (i.e., reactive organic gases [ROG] and NO_x), PM₁₀, and PM_{2.5}. Construction-generated emissions are short-term, lasting only as long as construction activities occur, but would be considered a significant air quality impact if the volume of pollutants generated exceed the South Coast AQMD's thresholds of significance.

Construction equipment would include excavators, dozers, rollers, rubber-tired loaders, tractors, trenchers, and pavers. Exhaust emission factors for typical diesel-powered heavy equipment are based on the California Emissions Estimator Model (CalEEMod) program defaults. Variables factored into estimating total construction emissions include the level of activity, length of construction period, number of pieces and types of equipment in use, site characteristics, weather conditions, number of construction personnel, and the amount of materials to be transported on or off the site. The analysis of daily construction emissions has been prepared using CalEEMod.

In accordance with the South Coast AQMD Guidelines, CalEEMod was used to model construction emissions for ROG, NO_x, CO, SO_x, PM₁₀, and PM_{2.5}. Nitrogen oxides (NO_x) are a family of highly reactive gases that are a primary precursor to the formation of ground-level O₃ and react in the atmosphere to form acid rain. NO₂ (often used interchangeably with NO_x) is a reddish-brown gas that can cause breathing difficulties at high levels. Peak readings of NO₂ occur in areas that have a high concentration of combustion sources (e.g., motor vehicle engines, power plants, refineries, and other industrial

¹⁰ A portion of the Air Basin in Los Angeles County is also designated a non-attainment basin for lead, which is not a criteria pollutant that is relevant to this Project, since air emissions of lead would not be generated by the Project.

operations). Sulfur oxides (SO_x) belong to the family of sulfur oxide gases that are formed when fuel containing sulfur from coal and oil are burned and during industrial metal smelting processes. SO₂ contributes to respiratory illness, particularly in children and the elderly, and aggravates existing heart and lung diseases.

CalEEMod allows the user to input dust control measures such as watering the construction area to limit fugitive dust. Standard conditions that were input into CalEEMod allow for certain reduction credits (i.e., compliance with South Coast AQMD rules) and result in a decrease of pollutant emissions. Reduction credits are based upon studies developed by CARB, South Coast AQMD, and other air quality management districts throughout California, and were programmed within CalEEMod. **Table 4.3-1: Construction Emissions** identifies the anticipated daily short-term construction emissions, assuming reductions associated with Standard Conditions (SC) AQ-1 (Dust Control) and SC AQ-2 (Architectural Coatings), and indicates Project construction activities would not exceed any significance thresholds. Impacts would be less than significant for all criteria pollutants during construction. The Project would be required to adhere to South Coast AQMD Rules 403 and 402, as part of SC AQ-1 to reduce PM₁₀ and PM_{2.5} emissions resulting from fugitive dust, and Rule 1113 as part of SC AQ-2 to reduce ROG emissions. The Project’s construction-related impacts would be less than significant for all criteria pollutants.

Table 4.3-1: Construction Emissions						
Emissions Source	Pollutant (pounds per day) ^{a, b}					
	ROG	NO _x	CO	SO ₂	PM ₁₀	PM _{2.5}
Construction: 2022	3.70	38.89	29.61	0.06	19.88	11.47
Construction: 2023	2.10	16.50	20.24	0.05	2.31	1.10
Construction: 2024	33.66	25.07	34.92	0.07	2.86	1.49
<i>South Coast AQMD Threshold</i>	<i>75</i>	<i>100</i>	<i>550</i>	<i>150</i>	<i>150</i>	<i>55</i>
South Coast AQMD Threshold Exceeded?	No	No	No	No	No	No

ROG = reactive organic gases; NO_x = nitrogen oxides; CO = carbon monoxide; SO_x = sulfur oxides; PM₁₀ = particulate matter 10 microns or less in diameter; PM_{2.5} = particulate matter 2.5 microns or less in diameter

a. Emissions were calculated using the California Emissions Estimator Model (CalEEMod), as recommended by the South Coast AQMD. Refer to Appendix A.

b. The modeling incorporates reduction/credits for construction emissions based on measures included in CalEEMod and as required by the South Coast AQMD through Rule 403. This includes the following: properly maintain mobile and other construction equipment; replace ground cover in disturbed areas quickly; water exposed surfaces three times daily; cover stockpiles with tarps; water all haul roads twice daily; and limit speeds on unpaved roads to 15 miles per hour. Reductions percentages from the South Coast AQMD CEQA Handbook (Tables XI-A through XI-E) were applied. No mitigation was applied to construction equipment.

Source: Kimley-Horn, 2021.

Operational Emissions

It is noted that the air quality emissions presented in **Table 4.3-2: Operational Emissions** are modeled for the proposed Project only, and do not take credit for existing operational emissions from the commercial uses at Sunrise Village Shopping Center that would be removed. Therefore, the Project emissions shown the table are conservative and would likely be lower when considering a net change from existing and proposed conditions.

Less Than Significant Impact. The Project’s long-term operational emissions are summarized in **Table 4.3-2.** Project-generated operational emissions would be associated with motor vehicle use, energy,

and area sources, such as the use of natural gas-fired appliances, landscape maintenance equipment, and architectural coatings. Mobile and stationary (area and energy) source operational emissions would result from normal daily activities on the Project site after occupancy. Mobile source emissions would be generated by the motor vehicles traveling to and from the Project site. Area source emissions would be generated due to an increased demand for consumer products, architectural coating, and landscaping. Energy source emissions would be generated from electricity and natural gas (non-hearth) usage associated with the proposed Project. The primary use of electricity and natural gas by the Project would be for space heating and cooling, water heating, ventilation, lighting, appliances, and electronics. As shown in **Table 4.3-2**, Project operational emissions would not exceed South Coast AQMD thresholds for ROG, NO_x, CO, SO_x, PM₁₀, or PM_{2.5}; therefore, Project operational emissions would be less than significant.

Emissions Source	Pollutant (pounds per day) ^a					
	ROG	NO _x	CO	SO ₂	PM ₁₀	PM _{2.5}
Area Source	7.53	2.47	14.52	0.02	0.26	0.26
Energy Use	0.10	0.83	0.35	0.01	0.07	0.07
Mobile Source	1.70	6.19	23.33	0.10	9.52	2.59
Total	9.33	9.49	38.20	0.13	9.85	2.92
<i>South Coast AQMD Threshold</i>	<i>55</i>	<i>55</i>	<i>550</i>	<i>150</i>	<i>150</i>	<i>55</i>
South Coast AQMD Threshold Exceeded?	No	No	No	No	No	No

ROG = reactive organic gases; NO_x = nitrogen oxides; CO = carbon monoxide; SO_x = sulfur oxides; PM₁₀ = particulate matter 10 microns or less in diameter; PM_{2.5} = particulate matter 2.5 microns or less in diameter
a. Emissions were calculated using the California Emissions Estimator Model (CalEEMod), as recommended by the South Coast AQMD.
Source: Kimley-Horn, 2021.

A significant impact to air quality would occur if a project would result in a cumulative considerable net increase of any criteria pollutant for which the region is non-attainment under an applicable NAAQS or CAAQS (including releasing emissions which exceed quantitative thresholds for ozone precursors). The ozone precursors include ROG and NO_x. The Air Basin is in non-attainment for ozone (federal and State), PM₁₀ (State), PM_{2.5} (State and federal), and lead (federal, partial non-attainment in a portion of Los Angeles County). To determine whether the Project would result in a cumulatively considerable increase in nonattainment criteria pollutants or exceed the quantitative thresholds for ozone precursors, Project emissions may be evaluated based on the quantitative emission thresholds established by the South Coast AQMD in its *CEQA Air Quality Handbook* (SCAQMD 1993, as amended). The South Coast AQMD has established quantitative thresholds against which a project’s emissions could be evaluated to determine if there is a potential for a significant impact. As previously addressed, the proposed Project would not result in significant construction or operational air quality impacts including nonattainment criteria pollutants. Therefore, the Project’s contribution to regional pollutant concentrations would not be cumulatively considerable.

Concerning the Project’s construction-period air quality emissions and cumulative Air Basin conditions, the South Coast AQMD has developed strategies to reduce criteria pollutant emissions outlined in the AQMP pursuant to the federal Clean Air Act mandates. As such, the Project would comply with South Coast’s AQMD’s Rule 403 (see SC AQ-1). Rule 403 requires that fugitive dust be controlled with the best available control measures in order to reduce dust so that it does not remain visible in the atmosphere

beyond the property line of a project site. Per South Coast AQMD rules and mandates, as well as the CEQA requirement that significant impacts be mitigated to the extent feasible, these same requirements (i.e., Rule 403 compliance, implementation of all feasible measures, and compliance with adopted AQMP emissions control measures) would also be imposed on construction projects throughout the Air Basin, which would include related projects. Compliance with South Coast AQMD rules and regulations would preclude significant construction-related impacts. Therefore, Project-related construction emissions, in combination with those from other projects in the area, would not substantially deteriorate the local air quality.

As previously discussed, the proposed Project would result in less than significant long-term air quality impacts, as Project operational emissions would not exceed South Coast AQMD operational thresholds. Additionally, adherence to South Coast AQMD rules and regulations (SC AQ-1 and SC AQ-2) would alleviate potential impacts related to cumulative conditions on a project-by-project basis. Emission reduction technology, strategies, and plans are constantly being developed. As a result, the proposed Project would not contribute a cumulatively considerable net increase of any nonattainment criteria pollutant. Impacts would be less than significant and no mitigation is required.

4.3c *Would the project expose sensitive receptors to substantial pollutant concentrations?*

Less Than Significant Impact. A significant impact may occur when a project would generate pollutant concentrations to a degree that would significantly affect sensitive receptors, which include populations that are more susceptible to the effects of air pollution than the population at large. Exposure of sensitive receptors is addressed for the following situations: CO hotspots; localized emissions concentrations, toxic air contaminants (TACs, specifically diesel PM) from on-site construction; and asbestos during demolition.

Carbon Monoxide Hot Spots

An analysis of CO “hot spots” is needed to determine whether an intersection’s change in level of service (LOS) as a result of a project would have the potential to result in exceedances of the CAAQS or NAAQS. It has long been recognized that CO exceedances are caused by vehicular emissions, primarily when vehicles are idling at intersections. Vehicle emissions standards have become increasingly stringent in the last 20 years. Currently, the CO standard in California is a maximum of 3.4 grams per mile for passenger cars (requirements for certain vehicles are more stringent). With the turnover of older vehicles, introduction of cleaner fuels, and implementation of control technology on industrial facilities, CO concentrations have steadily declined. The Air Basin was re-designated as attainment in 2007 and is no longer addressed in the South Coast AQMD’s AQMP.

The Project would not produce the volume of traffic required to generate a CO hotspot. Therefore, CO hotspots are not an environmental impact of concern for the proposed Project. Localized air quality impacts related to mobile-source emissions would therefore be less than significant. As a result, no significant impacts would occur and no additional mitigation measures are required.

Localized Significance Threshold Analysis

Localized Significance Analysis. The Localized Significance Threshold (LST) Methodology provides a look-up table for construction and operational emissions based on the emission rate, location, and distance from receptors, and provides a methodology for air dispersion modeling to evaluate whether a construction or operation could cause an exceedance of an ambient air quality standard. The local air quality emissions from construction were analyzed using the South Coast AQMD’s Mass Rate Localized Significant Threshold Look-Up Tables and the methodology described in *Localized Significance Threshold*

Methodology (South Coast AQMD, revised July 2008) to determine if the daily emissions of CO, NO_x, PM₁₀, and PM_{2.5}, from the Project would result in a significant impact to local air quality. Construction emissions were compared to the South Coast AQMD’s screening thresholds. The Project would require approximately 90,000 cy of cut and fill. The nearest sensitive receptors to the Project site are multi-family residences and a senior housing development approximately 30 feet west of the Project site, and the daycare facility proposed at 1901 Euclid Street, approximately 30 feet east of the Project site boundary.¹¹

As shown in **Table 4.3-3: Localized Significance of Construction and Operational Emissions**, neither construction nor operational emissions would exceed South Coast AQMD LSTs. Therefore, the Project would not result in significant localized construction or operational emissions.

Table 4.3-3: Localized Significance of Construction and Operational Emissions				
Emission Source	Pollutant (pounds per day)			
	NO_x	CO	PM₁₀	PM_{2.5}
Construction Emissions				
Demolition (2022)	25.72	20.59	2.64	1.37
Site Preparation (2022)	33.08	19.70	8.31	5.16
Grading (2022)	38.84	29.04	4.85	2.84
Building Construction (2022)	15.62	16.36	0.81	0.76
Building Construction (2023)	14.38	16.24	0.70	0.66
Building Construction (2024)	13.44	16.17	0.61	0.58
Paving (2024)	9.52	14.63	0.47	0.43
Architectural Coating (2024)	1.22	1.81	0.06	0.06
South Coast AQMD Localized Significance Threshold (Adjusted for 4 acres of disturbance at 30 feet)	195	1,201	13	6
South Coast AQMD Threshold Exceeded?	No	No	No	No
Operational Emissions				
On-Site Emissions (Area and Energy)	3.30	14.88	0.33	0.33
South Coast AQMD Localized Significance Threshold (Adjusted for 5 acres of disturbance at 30 feet)	219	1,395	4	2
South Coast AQMD Threshold Exceeded with Mitigation?	No	No	No	No
ROG = reactive organic gases; NO _x = nitrogen oxides; CO = carbon monoxide; Sox = sulfur oxides; PM ₁₀ = particulate matter 10 microns or less in diameter; PM _{2.5} = particulate matter 2.5 microns or less in diameter Note: South Coast AQMD Rule 403 Fugitive Dust applied. Refer to Appendix A for model data outputs. Although the site is 12.52 acres, the Consultant conservatively used the 5-acre screening lookup threshold as the thresholds increase with size. The construction LST threshold is based on the number of equipment hours and the maximum daily soil disturbance activity possible for each piece of equipment. Sources: CalEEMod version 2016.3.2 and Kimley-Horn, 2021.				

Toxic Air Contaminants

Project construction activities would generate diesel particulate matter (diesel PM) emissions from the use of off-road diesel equipment required for grading and excavation, paving, and other construction activities. The amount to which the receptors are exposed (a function of concentration and duration of exposure) is the primary factor used to determine health risk (i.e., potential exposure to toxic air

¹¹ A Conditional Use Permit Application for a daycare facility use at 1901 North Euclid Street was received by the City on August 17, 2021.

contaminant emission levels that exceed applicable standards). Health-related risks associated with diesel-exhaust emissions are primarily linked to long-term exposure and the associated risk of contracting cancer.

The use of diesel-powered construction equipment would be temporary and episodic. The duration of exposure would be short and exhaust from construction equipment is highly dispersive and concentrations of diesel PM dissipates rapidly. Current models and methodologies for conducting health risk assessments are associated with longer-term exposure periods of 9, 30, and 70 years, which do not correlate well with the temporary and highly variable nature of construction activities. Project construction involves phased activities in several areas across the site and the Project would not require the extensive use of heavy-duty construction equipment or diesel trucks in any one location over the duration of development, which would limit the exposure of any proximate individual sensitive receptor to TACs.

Additionally, construction is subject to and would comply with California regulations (e.g., California Code of Regulations, Title 13, Division 3, Article 1, Chapter 10, §§2485 and 2449), which reduce diesel PM and criteria pollutant emissions from in-use off-road diesel-fueled vehicles and limit the idling of heavy-duty construction equipment to no more than five minutes. These regulations would further reduce nearby sensitive receptors' exposure to temporary and variable diesel PM emissions. Given the temporary and intermittent nature of construction activities likely to occur within specific locations in the Project site (i.e., construction is not likely to occur in any one location for an extended time), the dose of diesel PM of any one receptor is exposed to would be limited. Therefore, considering the relatively short duration of diesel PM-emitting construction activity at any one location at the Project site and the highly dispersive properties of diesel PM, sensitive receptors would not be exposed to substantial concentrations of construction-related TAC emissions. Impacts would be less than significant, and no mitigation is required.

4.3d *Would the project result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?*

Less Than Significant Impact. The South Coast AQMD *CEQA Air Quality Handbook* identifies certain land uses as sources of odors. These land uses include agriculture, wastewater treatment plant, food processing plants, chemical plants, composting, refineries, landfills, dairies, and fiberglass molding. The proposed Project is a residential development and does not propose to include any odor-inducing uses on the site.

During construction-related activities, some odors (not substantial pollutant concentrations) that may be detected are those typical of construction vehicles (e.g., diesel exhaust from grading and construction equipment). These odors are a temporary short-term impact that is typical of construction projects and would disperse rapidly. The Project would not include any of the land uses that have been identified by the South Coast AQMD as odor sources. Therefore, impacts would be less than significant, and no mitigation is required.

Mitigation Program

Standard Conditions and Requirements

SC AQ-1 **Dust Control.** During construction, construction contractors shall comply with South Coast AQMD Rules 402 and 403 in order to minimize construction emissions of dust and particulates. South Coast AQMD Rule 402 requires that air pollutant emissions not be a nuisance off-site. Rule 402 prohibits the 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.

South Coast AQMD Rule 403 requires that fugitive dust be controlled with Best Available Control Measures so that the presence of such dust does not remain visible beyond the property line of the emission source. This rule is intended to reduce PM₁₀ emissions from any transportation, handling, construction, or storage activity that has the potential to generate fugitive dust. This requirement shall be included as notes on the contractor specifications. Table 1 of Rule 403 lists the Best Available Control Measures that are applicable to all construction projects. The measures include, but are not limited to, the following:

- a. Portions of a construction site to remain inactive longer than a period of three months will be seeded and watered until grass cover is grown or otherwise stabilized.
- b. All on-site roads will be paved as soon as feasible or watered periodically or chemically stabilized.
- c. All material transported off-site will be either sufficiently watered or securely covered to prevent excessive amounts of dust.
- d. The area disturbed by clearing, grading, earthmoving, or excavation operations will be minimized at all times.
- e. Where vehicles leave a construction site and enter adjacent public streets, the streets will be swept daily or washed down at the end of the workday to remove soil tracked onto the paved surface.

SC AQ-2 Architectural Coatings. South Coast AQMD Rule 1113 requires manufacturers, distributors, and end-users of architectural and industrial maintenance coatings to reduce reactive organic gas (ROG) emissions from the use of these coatings, primarily by placing limits on the ROG content of various coating categories. Architectural coatings shall be selected so that the volatile organic compound (VOC) content of the coatings is compliant with South Coast AQMD Rule 1113. This requirement shall be included as notes on contractor specifications.

Mitigation Measures

No mitigation is required.

4.4 Biological Resources

This section is based on the *Biological Resources Due Diligence Assessment* (ELMT Consulting, June 2021) prepared for the proposed Project, which is included in **Appendix B: Biological Resources Due Diligence Assessment**.

Environmental Issue	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project:				
a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special-status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?				X
b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?			X	
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?			X	
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?			X	
e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?			X	
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?				X

4.4.1 IMPACT ANALYSIS

4.4a 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 U.S. Fish and Wildlife Service?

No Impact. The Project site is fully improved as a commercial retail shopping plaza with surface parking lots. The Project site contains landscaping consisting of ornamental trees and shrubs. Additionally, the Project site contains an existing concrete-lined channel adjacent to Euclid Street that is classified as a riparian habitat; see Threshold 4.4c. Based on review of the existing and surrounding site conditions, the Project site does not provide suitable habitat for special-status plant or wildlife species and no candidate, sensitive, or special-status plant or wildlife species is present on the Project site. The concrete channel does not provide for suitable habitat and functions primarily as a drainage channel. Therefore, no direct or indirect impacts to candidate, sensitive, or special-status plant or wildlife species would occur from Project implementation. No impact would occur and no mitigation is required.

4.4b Would the project have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?

Less than Significant Impact. Based on the U.S. Fish and Wildlife Service (USFWS) National Wetlands Inventory, there are several riparian present on the Project site.¹² The USFWS database identifies the concrete-lined drainage channel adjacent to Euclid Street as a riparian habitat. Specifically, the drainage channel is classified as Forested/Shrub Riparian (Rp1SS). This classification code describes a riparian habitat with woody vegetation or shrub less than six meters in height. The proposed Project would not directly or indirectly impact this habitat. The Project does not propose any development or modifications to the drainage channel and therefore would not impact the classified riparian habitat. Therefore, a less than significant impact to riparian habitat would result from the proposed Project and no mitigation is required.

4.4c 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?

Less than Significant Impact. According to the USFWS National Wetlands Inventory, there is a 0.21-acre Riverine habitat and a 0.19 acre Freshwater Forested/Shrub Wetland habitat located on the Project site fronting Euclid Street. The USFWS's National Wetlands Inventory classifies this habitat as Riverine, Intermittent, Streambed, Temporary Flooded, and Excavated (R4SBAX) and Freshwater Forested/Shrub Wetland (PSSA), respectively. Aerial imagery and field visit confirm both habitats are part of the existing trapezoidal-shaped storm drain channel parallel to Euclid Street. The proposed Project would not directly or indirectly impact this habitat. The Project site is fully developed; the Project site does not contain any protected wetlands. Therefore, a less than significant impact to State or federally protected wetlands would occur and no mitigation is required.

¹² U.S. Fish and Wildlife Service, *National Wetlands Inventory*. www.fws.gov/wetlands/Data/Mapper.html, accessed January 29, 2021.

4.4d *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?*

Less Than Significant Impact. The Project site and surrounding areas are fully improved and developed with urban land uses. The Project site is not a recognized wildlife corridor and site redevelopment would not impede fish or wildlife movement. Notwithstanding, the proposed Project would result in removal of landscaped vegetation (trees and shrubs) on a portion of the Project site with the potential to support nesting migratory birds that are protected by the Migratory Bird Treaty Act (MBTA) and California Fish and Game Code (CFGF). On June 15 2021, a biological field investigation inventoried all trees expected to be impacted by Project implementation, see **Appendix B**. The field investigation identified 178 living trees, as presented in **Table 4.4-1: On-Site Trees**.

Table 4.4-1: On-Site Trees		
Common Name	Specific Name	Quantity Observed
Afghan pine	<i>Pinus eldarica</i>	53
Brazilian pepper	<i>Schinus terebinthia</i>	1
Italian cypress	<i>Cupressus sempervirens</i>	1
Jacaranda	<i>Jacaranda mimosifolia</i>	16
Persian silk tree	<i>Albizia julibrissin</i>	4
Podocarpus	<i>Podocarpus spp.</i>	9
Red River Gum	<i>Eucalyptus camaldulensis</i>	18
Silver Dollar Gum	<i>Eucalyptus polyanthemos</i>	43
Weeping Fig	<i>Ficus benjamina</i>	1
Western Sycamore	<i>Platanus racemosa</i>	32

Source: Biological Due Diligence Investigation. (July 2021). ELMT Consulting.

Under MBTA provisions, it is unlawful “by any means or manner to pursue, hunt, take, capture (or) kill” any migratory birds except as permitted by regulations issued by the USFWS. The term “take” is defined by USFWS regulation to mean to “pursue, hunt, shoot, wound, kill, trap, capture or collect” any migratory bird or any part, nest or egg of any migratory bird covered by the conventions, or to attempt those activities. In addition, the CFGF extends protection to non-migratory birds identified as resident game birds (CFGF §3500) and any birds in the orders Falconiformes or Strigiformes (birds-of-prey) (CFGF §3503). The on-site trees and vegetation could provide suitable nesting habitat for birds. To address potential impacts to migratory birds, the proposed Project would be subject to compliance with Standard Condition (SC) BIO-1, which addresses construction activities within the nesting season. Following compliance with SC BIO-1, the proposed Project’s potential impacts to nesting migratory birds would be less than significant and no mitigation is required.

4.4e *Would the project conflict with local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?*

Less Than Significant Impact. FMC Chapter 9.06, Community Forestry, addresses the planning, planting, maintenance, and removal of trees and other landscaping materials in any street or public area; landscape material in any street median; parkway strip or other landscaped portion of a public right-of-way; trees

and other landscape materials in other public spaces under the jurisdiction of the City; and over certain trees on private property. Additionally, the City of Fullerton's Community Forest Management Plan prohibits unpermitted impacts to trees that occur on public property within the City.

Since the Project occurs entirely within privately-owned property, no impacts to trees on public property or public rights-of-way would occur. As such, on-site tree removal would not be subject to Community Forest Management Plan regulations. Removal and replacement of street trees would still occur pursuant to review and approval of the Community Forest Management Plan. The proposed Project would not conflict with local policies or ordinances protecting biological resources. Therefore, impacts would be less than significant and no mitigation is required.

4.4f 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. The Project site is not located within the boundaries of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State habitat conservation plan. Therefore, no impact would occur and no mitigation is required.

Mitigation Program

Standard Conditions and Requirements

SC BIO-1 Nesting Migratory Birds. During construction, grubbing, brushing, or tree removal shall be conducted outside of the state identified nesting season for migratory birds (i.e., typically March 15 through September 1), if possible. If construction activities cannot be conducted outside of nesting season, a Pre-Construction Nesting Bird Survey within and adjacent to the Project site shall be conducted by a qualified biologist within three days prior to initiating construction activities. If active nests are found during the Pre-Construction Nesting Bird Survey, a Nesting Bird Plan (NBP) shall be prepared by a qualified biologist and implemented during construction. At a minimum, the NBP shall include guidelines for addressing active nests, establishing buffers, monitoring, and reporting. The size and location of all buffer zones, if required, shall be based on the nesting species, nesting stage, nest location, its sensitivity to disturbance, and intensity and duration of the disturbance activity.

Mitigation Measures

No mitigation is required.

4.5 Cultural Resources

This Section is based on the *Cultural Records Search* (Material Culture Consulting, July 2021), which is included in its entirety in **Appendix C: Cultural Record Search**.

Environmental Issue	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?				X
b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5?			X	
c) Disturb any human remains, including those interred outside of dedicated cemeteries?			X	

4.5.1 IMPACT ANALYSIS

4.5a *Would the project cause a substantial adverse change in the significance of a historical resource pursuant to §15064.5?*

No Impact. The Project site was first developed as a commercial retail center in the late 1970s and has remained in operation since that time. The shopping center does not meet the criteria of “architecturally significant” or a “historic resource” under CEQA. On February 19, 2021, a records search request was submitted to the South-Central Coastal Information Center (SCCIC). On March 19, 2021, SCCIC staff completed a records search (File No. 22134.8300) of the California Historical Resource Information System (CHRIS). The search identified previously recorded cultural resources and previously conducted investigations within the Project area and a one-mile radius of the Project site boundaries. The CHRIS search also included a review of the National Register of Historic Places (NRHP), the California Register of Historical Resources (CRHR), the California Points of Historical Interest list, the California Historical Landmarks list, the Archaeological Determinations of Eligibility list, and the California State Inventory of Historic Resources. The record search did not identify any historical buildings or resources on the Project site. Additionally, The Fullerton Plan EIR does not identify any historic structures located on the Project site. Therefore, the proposed Project would not cause a change in the significance of a historical resource. No impact would occur and no mitigation is required.

4.5b *Would the project cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5?*

Less Than Significant Impact. The records search (see Threshold 4.5a) identified 26 cultural resource investigations, dated between 1977 and 2015, that have been previously conducted within a one-mile radius of the Project site. One of the previous investigations included portions of the Project site. The records search did not identify any previously recorded archaeological resources within the Project site boundaries; however, it did identify five archaeological resources within the one-mile buffer. These resources include four prehistoric archaeological sites documented in 1939, 1950, and the 1970s and a

single historic-era can scatter recorded in 2009. All four of the prehistoric sites are obscured or have been removed by development following their identification and documentation. Due to previous ground disturbance of the Project site, it is considered to have low sensitivity for the presence of archaeological deposits. However, because resources have been previously discovered within one-mile of the site, the potential exists for the discovery of archaeological resources during ground disturbing activities. Therefore, the Project would be required to comply with Standard Condition (SC) CR-1, which details the appropriate steps should archaeological resources be encountered during ground-disturbing activities. Following compliance with SC CR-1, the Project's potential impacts concerning the significance of an archaeological resource would be less than significant.

4.5c *Would the project disturb any human remains, including those interred outside of dedicated cemeteries?*

Less Than Significant Impact. No formal cemeteries are on or near the Project site. Most Native American human remains are found in association with prehistoric archaeological sites. As discussed previously, the Project site does not contain any previously identified or recorded archaeological resources. The Project site and surrounding areas are located within the former 10,000-acre Bastanchury Ranch – later Sunny Hills Ranch and used as orchard groves according to historical aerial imagery review. As noted in the Project Description, the Project area was developed with residential subdivisions as early as the 1950s while the Project site was developed as a commercial shopping center in the 1970s.

Given the extent of on-site disturbances from previous development, there is low potential for the Project's ground-disturbing activities to encounter human remains. If previously unknown human remains are discovered during the Project's ground-disturbing activities, a substantial adverse change in the significance of such a resource could occur. If human remains are found, those remains would require proper treatment in accordance with applicable laws, including State of California Health and Safety Code (HSC) §§7050.5-7055 and PRC §§5097.98 and 5097.99 as outlined under SC CR-2. Should any remains be uncovered, HSC §7050.5 requires that all activities cease immediately, and a qualified archaeologist and Native American monitor be contacted immediately. As prescribed by SC CR-2, the procedures set forth in PRC §5087.98 would be implemented, including evaluation by the County Coroner and notification of the NAHC. The NAHC would designate the "Most Likely Descendent" of the unearthed human remains. Compliance with SC CR-2 would reduce the Project's potential impacts concerning human remains would be less than significant and no mitigation is required.

Mitigation Program

Standard Conditions and Requirements

SC CR-1 In the event that cultural resources (archaeological, historical, paleontological) resources are inadvertently unearthed during excavation and grading activities of any future development project, the contractor shall immediately cease all earth disturbing activities within a 100-foot radius of the area of discovery. The Applicant shall retain a qualified professional (i.e., archaeologist, historian, architect, paleontologist, Native American Tribal monitor), subject to approval by the City of Fullerton, to evaluate the significance of the finding and appropriate course of action. If avoidance of the resource(s) is not feasible, salvage operation requirements pursuant to Section 15064.5 of the State CEQA Guidelines shall be followed. After the find has been appropriately avoided or mitigated, work in the area may resume.

SC CR-2 In the event that human remains are unearthed during excavation and grading activities of any future development project, all activity shall cease immediately. Pursuant to State Health and Safety Code Section 7050.5, no further disturbance shall occur until the County coroner has made the necessary findings as to origin and disposition pursuant to Public Resources Code Section 5097.98. If the remains are determined to be of Native American descent, the coroner shall within 24 hours notify the Native American Heritage Commission (NAHC). The NAHC shall then contact the most likely descendant of the deceased Native American, who shall serve as consultant on how to proceed with the remains.

Mitigation Measures

No mitigation measures are applicable to the proposed Project.

4.6 Energy

Environmental Issue	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project:				
a) Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?			X	
b) Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?				X

4.6.1 BACKGROUND

Building Energy Conservation Standards

Energy conservation standards for new residential and non-residential buildings were adopted by the California Energy Resources Conservation and Development Commission (now the California Energy Commission) in June 1977 and are updated every three years (Title 24, Part 6, of the California Code of Regulations). Title 24 requires the design of building shells and building components to conserve energy. The periodic update allows for the consideration and possible incorporation of new energy efficiency technologies and methods. On May 9, 2018, the California Energy Commission (CEC) adopted the 2019 Building Energy Efficiency Standards (Energy Code), which went into effect on January 1, 2020.

The CEC is currently preparing the 2022 Energy Code, which will improve upon the 2019 Energy Code for new construction of, and additions and alterations to, residential and non-residential buildings. Proposed standards will be adopted in 2021 with an effective date of January 1, 2023.¹³ The current 2019 Energy Code improves upon the previous 2016 Energy Code. Under the 2019 Title 24 standards, residential buildings are about 7 percent more energy efficient, and when the required rooftop solar is factored in for low-rise residential construction, residential buildings that meet 2019 Title 24 standards use about 53 percent less energy than those built to meet the 2016 standards. Non-residential buildings use about 30 percent less energy due mainly to lighting upgrades.

California Code of Regulations Title 20 sets minimum efficiency levels for energy and water consumption in products, such as consumer electronics, household appliances, and plumbing equipment. Amendments to the Title 20 Appliance Efficiency Regulations were adopted in 2018 and 2020 and were effective in October 2018 and March 2021, respectively. The updated regulations include mandates for energy-efficient appliances for residential and non-residential uses.

¹³ California Energy Commission, 2022 Building Energy Efficiency Standards, Available at: <https://www.energy.ca.gov/programs-and-topics/programs/building-energy-efficiency-standards/2022-building-energy-efficiency>, Accessed May 28, 2021.

Senate Bill 350

In September 2015, then California Governor Jerry Brown signed Senate Bill (SB) 350 into law. SB 350 established tiered increases to the Renewable Portfolio Standard: 40 percent by 2024, 45 percent by 2027, and 50 percent by 2030.

Senate Bill 100

On September 10, 2018, Governor Brown signed SB 100. Referred to as “The 100 Percent Clean Energy Act of 2019,” SB 100 increases the required Renewable Portfolio Standards. Under SB 100, the total kilowatt hours of energy sold by electricity retailers to their end-use customers must consist of at least 50 percent renewable resources by 2026, 60 percent renewable resources by 2030, and 100 percent renewable resources by 2045. SB 100 also establishes a State policy that eligible renewable energy resources and zero-carbon resources supply 100 percent of all retail sales of electricity to California end-use customers and 100 percent of electricity procured to serve all State agencies by December 31, 2045. Under the bill, the State cannot increase carbon emissions elsewhere in the western grid or allow resource shuffling to achieve the 100 percent carbon-free electricity target.

The Fullerton Plan

The Fullerton Built Environment Element contains policies that promote energy and resource efficiency.

P1.12 Energy- and Resource-Efficient Design Support projects, programs, policies and regulations to encourage energy and resource efficient practices in site and building design for private and public projects.

3.18 Encourage Sustainability and Green Building Practices

3.20 Efficient use of energy resources in residential development

4.6.2 IMPACT ANALYSIS

4.6a Would the project result in a potentially significant impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during Project construction or operation?

It is noted that the Project energy consumption estimates do not take credit for existing operational emissions from the Sunrise Village Shopping Center tenants currently operating at the Project site that would be displaced. As a result, the energy usage estimates presented below are conservative and would likely be lower when considering a net change from existing and proposed conditions.

Less Than Significant Impact

Electricity. Southern California Edison (SCE) provides electrical service to the area. The Project is expected to use approximately 918,543 kilowatt-hours per year (kWh/year) based on California Emissions Estimator Model (CalEEMod); refer to Appendix A: Air Quality and Greenhouse Gas Emissions Data. Project implementation would result in a permanent increase in electricity over existing conditions. The increased demand is expected to be adequately served by the existing SCE electrical facilities. Total electricity demand in SCE’s service area is forecast to increase by approximately 12,000 gigawatt-hours (GWh)—or 12 billion kWh—between 2015 and 2026.¹⁴ The increase in electricity demand from the proposed Project

¹⁴ California Energy Commission, California Energy Demand 2018-2030 Revised Forecast, Figure 49 Historical and Projected Baseline Consumption SCE Planning Area, January 2018.

would represent an insignificant percent increase compared to overall demand in SCE's service area. Therefore, projected electrical demand would not significantly impact SCE's level of service.

It should also be noted that the Project's design and materials would be required to comply with Building Energy Efficiency Standards. Prior to issuance of a building permit, the City of Fullerton Building and Safety Division would review and verify that the Project plans demonstrate compliance with the current version of the Building and Energy Efficiency Standards. The Project would also be required adhere to the provisions of the CALGreen Code, which establishes planning and design standards for sustainable site development, energy efficiency (in excess of the California Energy Code requirements), water conservation, material conservation, and internal air contaminants.

Project implementation would not interfere with the 60 percent Renewable Portfolio Standard set forth in SB 100 for 2030 or the 100 percent standard for 2045. These goals apply to SCE and other electricity retailers. As electricity retailers reach these goals, emissions from end user electricity use would decrease from current emission estimates.

Natural Gas. Southern California Gas Company (SoCalGas) provides natural gas service to the Project area. The Project is expected to use approximately 3,293,690 kilo-British thermal units per year (KBTU/year) of natural gas based on California Emissions Estimator Model (CalEEMod); refer to Appendix A. The increased demand can be adequately served by the existing SoCalGas facilities and infrastructure. From 2020 to 2035, demand is expected to decline from 934 million cubic feet (mcf) to 806 mcf, while supplies remain constant at 3.775 billion cubic feet per day¹⁵ (bcfd) from 2015 through 2035.¹⁶ Therefore, the natural gas demand from the proposed Project would represent a nominal percentage of overall demand in SoCalGas' service area. The proposed Project would not result in a significant impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during Project construction or operation.

Fuel. During construction, transportation energy use depends on the type and number of trips, vehicle miles traveled, fuel efficiency of vehicles, and travel mode. Transportation energy use during construction would come from the transport and use of construction equipment, delivery vehicles and haul trucks, and construction employee vehicles that would use diesel fuel and/or gasoline. The use of energy resources by these vehicles would fluctuate according to the phase of construction and would be temporary. Most construction equipment during demolition and grading would be gas-powered or diesel-powered, and the later construction phases would require electricity-powered equipment. Impacts related to transportation energy use during construction would be temporary and would not require expanded energy supplies or the construction of new infrastructure; impacts would not be significant.

During Project operations, energy consumption would be associated with resident, visitor, and trips by maintenance and repair crews to residences in the neighborhood. The Project is a residential-use infill development, located near public transportation, and within one mile of community goods and services (e.g., schools, churches, pharmacies, grocery stores, hospitals, etc.), all of which would reduce the need to drive long distances. The City and surrounding areas are highly urbanized with numerous gasoline fuel facilities and infrastructure. Consequently, the proposed Project would not result in a substantial demand for energy that would require expanded supplies or the construction of other infrastructure or expansion

¹⁵ 1 bcfd is equivalent to about 1.03 billion kBTU

¹⁶ California Gas and Electric Utilities, 2020 California Gas Report, Southern California Gas Company Annual Gas Supply 2020-2035 Table 1-SCG, Available at: https://www.socalgas.com/sites/default/files/2020-10/2020_California_Gas_Report_Joint_Utility_Biennial_Comprehensive_Filing.pdf, Accessed May 28, 2021.

of existing facilities. Additionally, fuel consumption associated with vehicle trips generated by the proposed Project would not be considered inefficient, wasteful, or unnecessary.

The proposed Project would not result in wasteful, inefficient, or unnecessary consumption of energy resources. Impacts are less than significant and no mitigation is required.

4.6b *Would the project conflict with or obstruct a State or local plan for renewable energy or energy efficiency?*

No Impact. As previously addressed, the Project’s design and operation would comply with State Building Energy Efficiency Standards, appliance efficiency regulations, and green building standards (CALGreen). Project development would not cause inefficient, wasteful and unnecessary energy consumption and no adverse impact would occur. The proposed Project would include design features such as high efficiency windows to reduce heating and cooling loads; energy-efficient appliances in compliance with Title 20; and high efficiency heating and cooling systems to reduce energy consumption, and therefore reduce GHG emissions. Therefore, the Project is consistent with AB 32, which aims to decrease emissions statewide to 1990 levels by 2020 and the SB 32 goal of reducing emissions 40 percent below 1990 by 2030.

The Fullerton Plan Chapter 17 Air Quality and Climate Change explains the City’s energy efficiency efforts and identify various conservation opportunities. Key elements of the energy efficiency strategies include energy conservation measures, energy and resource conservation programs, educational materials and technical assistance, and water conservation. The proposed Project would not conflict with the City’s energy conservation programs. Relevant policies include the following: s

- **P3.20: Efficient Use of Energy Resources in Residential Development** – The City shall continue to support energy conservation through encouraging the use of Energy Star-rated appliances, and other energy-saving technologies and conservation.
- **P1.12: Energy and Resource Efficient Design** - Support projects, programs, policies and regulations to encourage energy and resource efficient practices in site and building design for private and public projects.
- **P21.6: Construction Impacts** - Support projects, programs, policies and regulations to reduce impacts to air quality caused by private and public construction projects.
- **P22.9: Development** - Support projects which voluntarily desire to implement site and/or building design features exceeding minimum requirements to reduce project greenhouse gas emissions.

Compliance with the Title 24 Energy Code standards and CALGreen Code standards would ensure the proposed Project incorporates rooftop solar panels, energy efficient windows, insulation, lighting, ventilation systems, water efficient fixtures, and other energy-efficient features. Further, the 2019 CALGreen Code standards requires the recycling and/or salvaging of a minimum of 65 percent of non-hazardous construction and demolition waste. Adherence to the California Public Utilities Commission’s energy requirements, as well as the most current Title 24 and CALGreen Code standards would ensure conformance with The Fullerton Plan goals and policies, as well as the State’s goal of promoting energy efficiency and renewable energy. Therefore, the proposed Project would not conflict with or obstruct a State or local plan for renewable energy or energy efficiency. Impacts are less than significant and no mitigation is required.

Mitigation Program

Standard Conditions and Mitigation Measures

No standard conditions or mitigation measures are required.

4.7 Geology and Soils

This Section is based on the *Geotechnical and Infiltration Evaluation* (GeoTek, Inc., 2020) which is included in its entirety in **Appendix D: Geotechnical and Infiltration Evaluation**.

Environmental Issue	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.				X
ii) Strong seismic ground shaking?		X		
iii) Seismic-related ground failure, including liquefaction?		X		
iv) Landslides?				X
b) Result in substantial soil erosion or the loss of topsoil?			X	
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?			X	
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?			X	
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?				X
f) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?		X		

4.7.1 IMPACT ANALYSIS

4.7ai Would the project directly or indirectly cause potential substantial adverse effects, including the risks of loss, or death involving the 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.

No Impact. The Alquist-Priolo Earthquake Fault Zoning Act was passed in 1972 to mitigate the hazard of surface faulting to structures for human occupancy by preventing the construction of buildings used for human occupancy on the surface trace of active faults. The Act requires the State Geologist to establish regulatory zones, known as “Alquist-Priolo Earthquake Fault Zones,” around the surface traces of active faults and to issue appropriate maps. If an active fault is found, a structure for human occupancy cannot be placed over the trace of the fault and must be set back from the fault (typically 50 feet). The geotechnical investigation concluded that the Project site is not within an Alquist-Priolo Earthquake Fault Zone. Therefore, the Project would not expose people or structures to adverse effects involving rupture of a known earthquake fault. No impact would occur.

4.7aai Would the project directly or indirectly cause potential substantial adverse effects, including the risks of loss, or death involving strong seismic ground shaking?

Less Than Significant Impact with Mitigation Incorporated. The City is in a seismically active region with several active fault zones including the West Coyote Hills fault and the Elsinore Fault Zone-Whittier Section located approximately 1.30 miles to the northwest and 4.1 miles to the northeast, respectively. The faults could cause moderate to intense ground shaking during the Project’s lifetime. Additionally, the Project site has experienced earthquake-induced ground shaking in the past and can be expected to experience further shaking in the future.

However, the proposed Project would adhere to local and State regulatory standards that address seismic hazards and building design per SC GEO-1. Pursuant to FMC Chapter 14.03 – Building Code, the City has adopted the 2019 California Building Standards Code, subject to certain amendments and changes, including standards that address seismic resistance. The Project would be subject to compliance with all applicable FMC regulations (and adopted California Building Standards Code), including design requirements that mitigate the effects of potential earthquake hazards. Moreover, the Geotechnical Evaluation examined various geologic and seismic hazards (i.e., seismic ground shaking, liquefaction, total and differential settlement, surface displacement, landslides, slope instabilities, seismically-induced settlement, seismically-induced flooding, seismically-induced landslides, seiche, and tsunami) based on site-specific parameters, field exploration, laboratory testing, and data analysis. The Geotechnical Evaluation makes preliminary recommendations concerning seismic design parameters, foundations, slabs, and general earthwork and grading, among other factors). The Geotechnical Evaluation concludes that, based on the data collected, the Project appears feasible for development. MM GEO-1 requires that the proposed Project comply with the Geotechnical Investigation’s recommendations. The City’s Building and Safety Division would review construction plans to verify the Project’s compliance with the FMC and the Geotechnical Investigation’s recommendations. Following compliance with the local and State regulatory standards and implementation of MM GEO-1, the Project would not cause potential substantial adverse effects involving strong seismic ground shaking. With mitigation, a less than significant impact would occur.

4.7aiii *Would the project directly or indirectly cause potential substantial adverse effects, including the risks of loss, or death involving seismic-related ground failure, including liquefaction?*

Less Than Significant Impact with Mitigation Incorporated. Liquefaction occurs when earthquake-induced ground vibrations increase the pore pressure in saturated, granular soils until it is equal to the confining, overburden pressure. When this occurs, the soil can completely lose its shear strength and enter a liquefied state. According to the California Geological Survey's Earthquake Zones of Required Investigation La Habra Quadrangle Map the Project site lies within a "Zone of Required Investigation for Liquefaction."¹⁷ Further, according to City's Local Hazard Mitigation Plan Figure 3-10, the Project site is adjacent to an identified liquefaction hazard area on Euclid Street.

The Geotechnical Evaluation noted that the Project site is underlain by La Habra Formation bedrock at shallow depths, and that the regional groundwater is located at 85 feet or deeper. For liquefaction to occur, free groundwater must exist in the sediment, a condition that does not exist on site. Given the depth of the groundwater table, liquefaction potential would be non-existent. Following compliance with the local and State regulatory standards and implementation of MM GEO-1, the Project would not cause potential substantial adverse effects involving liquefaction. Impacts would be less than significant with mitigation.

4.7aiv *Would the project directly or indirectly cause potential substantial adverse effects, including the risks of loss, or death involving landslides?*

No Impact. Landslides are mass movements of the ground that include rock falls, relatively shallow slumping and sliding of soil, and deeper rotational or transitional movement of soil or rock. The Project site is relatively flat and bordered by urban development. The Geotechnical Evaluation did not observe ancient landslides or slope instabilities on the Project site and concluded that the potential for landslides was negligible. Additionally, the California Geological Survey's Landslide Inventory reports the Project site is not within a landslide hazard zone.¹⁸

Given the Project site's setting and conditions, the Project would not directly or indirectly cause potential substantial adverse effects involving landslides. No impact would occur and no mitigation is required.

4.7b *Would the project result in substantial soil erosion or the loss of topsoil?*

Less Than Significant Impact. The Geotechnical Evaluation concluded that the Project site is composed of artificial fill, at depths of 20 feet below surface. The fill is composed of clayey sand. Given the Project site's existing condition, the potential loss of topsoil is low. Grading and earthwork activities during Project construction would expose soils to potential short-term erosion by wind and water. During construction, the Project would be subject to compliance with erosion and siltation control measures and the National Pollutant Discharge Elimination System (NPDES) General Permit for Stormwater Discharges Associated with Construction and Land Disturbance Activities (Order No. 2009-0009-DWQ, and all subsequent amendments) (Construction General Permit); see Threshold 4.10a. The NPDES permit requires development and implementation of a Stormwater Pollution Prevention Plan (SWPPP) and monitoring plan, which must include erosion-control and sediment-control Best Management Practices (BMPs) that would meet or exceed measures required by the Construction General Permit to control potential

¹⁷ California Department of Conservation. (2015). Earthquake Zones Required Investigation La Habra Quadrangle. Available at: <https://maps.conservation.ca.gov/cgs/informationwarehouse/regulatorymaps/>, Accessed June 15, 2021.

¹⁸ California Department of Conservation. 2019. *Landslide Inventory Beta*. Available at: <https://maps.conservation.ca.gov/cgs/lsl/app/>, Accessed June 16, 2021.

construction-related pollutants. Erosion-control BMPs are designed to prevent erosion, whereas sediment controls are designed to trap sediment once it has been mobilized. Following compliance with NPDES and FMC Chapter 12.18 - Water Quality requirements, the Project would not result in substantial soil erosion or the loss of topsoil. Impacts are less than significant and no mitigation is required.

4.7c 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- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?

4.7d Would the project 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?

Less Than Significant Impact. The Project site would not be subject to seismically-induced liquefaction (see Threshold 4.7aⁱⁱⁱ) or landslides (see Threshold 4.7a^{iv}). The Geotechnical Evaluation did not identify a potential for lateral spreading or collapse but identified that subsidence of up to 0.1-foot could occur. Additionally, the surface site soils were tested and found to have a low expansion potential. The proposed Project would be subject to compliance with FMC Chapter 14.03 – Building Code and MM GEO-1, which requires compliance with the *Geotechnical and Infiltration Evaluation* (GeoTek, Inc. 2020) recommendations. Compliance with the local and State regulatory standards and implementation of MM GEO-1 would reduce the Project’s potential impacts concerning unstable geologic units and expansive soils to a less than significant level.

4.7e 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?

No Impact. The Project does not propose the use of septic tanks. The proposed Project would connect to the existing sanitary sewer system on Rosecrans Avenue and Euclid Street. Therefore, no impact would occur concerning use of septic tanks or alternative wastewater disposal systems and no mitigation is required.

4.7f Would the project directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?

Less Than Significant with Mitigation Incorporated. Paleontological resources are the fossilized remains of organisms from prehistoric environments found in geologic strata. The potential for fossil occurrence depends on the rock type exposed at the surface in a given area. La Habra Formation sedimentary bedrock was encountered near the ground surface and below the fill and older alluvium within the Project’s northeastern and south-central portions. The La Habra Formation bedrock was mostly comprised of silty sandstone and sandstone with some siltstone and claystone. According to The Fullerton Plan EIR, paleontological resources have been identified within the area north of the West Coyote Hills area. Although the proposed Project is 1,000 feet south of the West Coyote Hills area, there is potential for Project construction activities to impact as yet unidentified paleontological resources. MM GEO-2 details the appropriate steps should paleontological resources be encountered during ground-disturbing activities. Following compliance with MM GEO-2, the Project’s potential impacts to a unique paleontological resource/site or geologic feature would be less than significant.

Mitigation Program

Standard Conditions and Requirements

SC GEO-1 Project plans and designs shall comply with FMC Chapter 14.03 – Building Code, which incorporates the 2019 California Building Standards Code which contains all regulations for how buildings are designed and constructed, and are intended to ensure the maximum structural integrity and safety of private and public buildings.

Mitigation Measures

MM GEO-1 Prior to Grading Permit issuance, the City shall review all Project plans and all other relevant construction permits to verify compliance with the *Geotechnical and Infiltration Evaluation* (GeoTek, Inc. 2020) recommendations and other applicable Code requirements.

MM GEO-2 **Paleontological Resources.** In the event that paleontological resources are inadvertently unearthed during excavation and grading activities, the contractor shall immediately cease all earth-disturbing activities within a 100-foot radius of the area of discovery. The Applicant shall retain a qualified professional paleontologist subject to approval by the City of Fullerton, to evaluate the significance of the finding and appropriate course of action. If avoidance of the resource(s) is not feasible, the Applicant shall follow salvage operation requirements pursuant to State CEQA Guidelines §15064.5. After the Applicant has appropriately avoided or mitigated the find, work in the area may resume.

4.8 Greenhouse Gas Emissions

The greenhouse gas (GHG) modeling outputs and results are included in **Appendix A: Air Quality and Greenhouse Gas Emissions Data**, and summarized herein.

Environmental Issue	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?			X	
b) Conflict with applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases?			X	

4.8.1 BACKGROUND

The “greenhouse effect” is the natural process that retains heat in the troposphere, the bottom layer of the atmosphere. Without the greenhouse effect, thermal energy would “leak” into space resulting in a much colder and inhospitable planet. With the greenhouse effect, the global average temperature is approximately 61°F (16°C). Greenhouse gases (GHGs) are the components of the atmosphere responsible for the greenhouse effect. The amount of heat that is retained is proportional to the concentration of GHGs in the atmosphere. As more GHGs are released into the atmosphere, GHG concentrations increase and the atmosphere retains more heat, increasing the effects of climate change. Six gases were identified by the Kyoto Protocol for emission reduction targets: carbon dioxide (CO₂), methane (CH₄), nitrous oxide (N₂O), hydrofluorocarbons (HFC), perfluorocarbons (PFC), and sulfur hexafluoride (SF₆). When accounting for GHGs, all types of GHG emissions are expressed in terms of CO₂ equivalents (CO₂e) and are typically quantified in metric tons (MT) or million metric tons (MMT).

Approximately 80 percent of the total heat stored in the atmosphere is caused by CO₂, CH₄, and N₂O. These three gases are emitted by human activities and natural sources. Each of the GHGs affects climate change at different rates and persists in the atmosphere for varying lengths of time. The relative measure of the potential for a GHG to trap heat in the atmosphere is called global warming potential (GWP). The GWP was developed to allow comparisons of the global warming impacts of different gases. Specifically, it is a measure of how much energy the emissions of one ton of a gas will absorb over a given period of time, relative to the emissions of one ton of CO₂. The larger the GWP, the more that a given gas warms the Earth compared to CO₂ over that time period. GWPs provide a common unit of measure, which allows analysts to add up emissions estimates of different gases (e.g., to compile a national GHG inventory), and allows policymakers to compare emissions reduction opportunities across sectors and gases.

Stationary source combustion of natural gas in equipment such as water heaters, boilers, process heaters, and furnaces emit GHGs, primarily CO₂, CH₄, and N₂O. GHGs are also emitted from mobile sources such as on-road vehicles and off-road construction equipment burning fuels such as gasoline, diesel, biodiesel, propane, or natural gas (compressed or liquefied). Indirect GHG emissions result from electric power generated elsewhere (i.e., power plants) used to operate process equipment, lighting, and utilities at a

facility. Included in GHG quantification is electric power which is used to pump the water supply (e.g., aqueducts, wells, pipelines) and disposal and decomposition of municipal waste in landfills.¹⁹

Regulations and Significance Criteria

Former California Governor Arnold Schwarzenegger issued Executive Order S-3-05 in June 2005, which established the following GHG emission reduction targets: (a) by 2010: Reduce GHG emissions to 2000 levels; (b) by 2020: Reduce GHG emissions to 1990 levels; and (c), by 2050: Reduce GHG emissions to 80 percent below 1990 levels.

Assembly Bill (AB) 32 Statutes of 2006, Health and Safety Code Section 38500 et seq. require that CARB determine what the Statewide GHG emissions level was in 1990 and approve a Statewide GHG emissions limit that is equivalent to that level, to be achieved by 2020. CARB has approved a 2020 emissions limit of 427 million metric tons of CO₂ equivalent (MTCO_{2e}). Additionally, Executive Order B-30-15 requires Statewide GHG emissions to be reduced 40 percent below 1990 levels by 2030.

Executive Order B-30-15 also requires statewide GHG emissions to be reduced 40 percent below 1990 levels by 2030. SB 32, signed into law in September 2016, codifies the 2030 GHG reduction target in Executive Order B-30-15. SB 32 authorizes CARB to adopt an interim GHG emissions level target to be achieved by 2030 and to adopt rules and regulations in an open public process to achieve the maximum, technologically feasible, and cost-effective GHG reductions. With SB 32, the California Legislature passed companion legislation AB 197, which provided additional direction for developing an updated Scoping Plan. CARB released the second update to the Scoping Plan to reflect the 2030 target set by Executive Order B-30-15 and codified by SB 32 in November 2017.

Additionally, signed into law in September 2018, SB 100 increased California's renewable electricity portfolio from 50 to 60 percent by 2030. SB 100 also established a further goal to have an electric grid that is entirely powered by clean energy by 2045.

Due to the nature of global climate change, no single development project would be expected to have a substantial effect on global climate change. GHG emissions from the proposed Project would combine with emissions emitted across California, the United States, and the world to contribute cumulatively to global climate change.

Addressing GHG emissions generation impacts requires an agency to determine what constitutes a significant impact. The CEQA Guidelines specifically allow lead agencies to determine thresholds of significance that illustrate the extent of an impact and are a basis from which to apply mitigation measures. This means that each agency must determine whether a project's GHG emissions would have a "significant" impact on the environment. The guidelines direct that agencies are to use "careful judgment" and "make a good-faith effort, based to the extent possible on scientific and factual data, to describe, calculate or estimate" a project's GHG emissions (14 CRC §15064.4(a)).

On September 28, 2010, the South Coast AQMD GHG CEQA Significance Threshold Stakeholder Working Group recommended an interim screening level numeric bright-line threshold of 3,000 metric tons of CO_{2e} annually, as well as an efficiency-based threshold of 4.8 metric tons of CO_{2e} per service population (residents plus employees) per year in 2020 and 3.0 metric tons of CO_{2e} per service population per year

¹⁹ California Air Resources Board, Climate Change Scoping Plan, 2008.

in 2035.²⁰ The South Coast AQMD formed the Working Group to assist the South Coast AQMD's efforts to develop a GHG significance threshold. The Working Group included a wide variety of stakeholders including the State Office of Planning and Research (OPR), CARB, the Attorney General's Office, city and county planning departments in the Air Basin, various utilities such as sanitation and power companies throughout the Air Basin, industry groups, and environmental and professional organizations. The Working Development developed the numeric bright line and efficiency-based thresholds to be consistent with CEQA requirements for developing significance thresholds. Substantial evidence supports the recommended thresholds, which provide guidance to CEQA practitioners and lead agencies concerning determining whether GHG emissions from a proposed project are significant.

The City of Fullerton has not adopted project-specific significance thresholds. For the proposed Project, the South Coast AQMD's proposed 3,000 MTCO₂e/yr non-industrial screening threshold is used as the significance threshold in addition to the qualitative thresholds of significance from State CEQA Guidelines Appendix G Section VII.

4.8.2 IMPACT ANALYSIS

4.8a *Would the project generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?*

Less Than Significant Impact. Pursuant to State CEQA Guidelines Appendix G, a project would have a potentially significant impact if it generates GHG emissions, directly or indirectly, that may have a significant impact on the environment; or conflicts with an applicable plan, policy, or regulation adopted to reduce GHG emissions. State CEQA Guidelines §15064.4 specifies how the significance of GHG emissions is to be evaluated. The process is broken down into quantification of project-related GHG emissions, making a determination of significance, and specification of any appropriate mitigation if impacts are found to be potentially significant.

The proposed Project would result in direct emissions of GHGs from construction and operations. Direct project-related GHG emissions include emissions from construction activities, area sources, and mobile sources, while indirect sources include emissions from electricity consumption, water demand, and solid waste generation. Operational GHG estimations are based on energy emissions from natural gas usage and automobile emissions. CalEEMod relies upon trip data; the Traffic Impact Analysis (Environment, Planning, Development Solutions, Inc., 2021) and Project-specific land use data was used to calculate emissions. **Table 4.8-1: Project Greenhouse Gas Emissions** presents the Project's estimated GHG emissions.

It is noted that the GHG emissions presented in **Table 4.8-1** are modeled for the proposed Project only, and do not take credit for existing operational GHG emissions from the commercial uses at Sunrise Village Shopping Center that would be removed. Therefore, the Project emissions shown in **Table 4.8-1** are

²⁰ In *Cleveland National Forest Foundation v. San Diego Association of Governments* (2017) 3 Cal.5th 497, the Supreme Court held that the EIR prepared for the San Diego Association of Governments' (SANDAG) 2050 Regional Transportation Plan/Sustainable Communities Strategy did not need to include an analysis of the Plan's consistency with GHG emission reduction goals of 80 percent below 1990 levels by 2050 (established by Executive Order S-3-05 to comply with CEQA. The Court's opinion stated that the lead agency made "a good-faith effort, based to the extent possible on scientific and factual data, to describe, calculate or estimate" in part because it disclosed the 2050 emissions levels and identified the significance of the 2050 threshold to climate change impacts (i.e., to stabilization of temperature increases). The Court also noted that "a recent California Energy Commission report concludes, however, that the primary strategies to achieve this target should be major 'decarbonization' of electricity supplies and fuels, and major improvements in energy efficiency."

conservative and would likely be lower when considering a net change from existing and proposed conditions.

Project construction would generate approximately 1,066 metric tons of CO₂e during construction (or 35.53 metric tons amortized over 30 years).²¹ Once construction is complete, construction-related GHG emissions would cease. The amortized construction emissions are added to the annual average operational emissions.

Table 4.8-1: Project Greenhouse Gas Emissions	
Emissions Source	CO ₂ e (Metric Tons/Year)
Construction Emissions (2022)	301.00
Construction Emissions (2023)	528.00
Construction Emissions (2024)	237.00
Total Construction Emissions	1,066.00
Construction Emissions Amortized over 30 Years	35.53
Area Source	37.00
Energy	399.00
Mobile	1,572.00
Waste	28.00
Water	56.00
Total	2,127.53
South Coast AQMD Threshold	3,000
Exceeds Threshold?	No
Note: CalEEMod version 2016.3.2. Refer to Appendix A for model data outputs.	
Source: Kimley-Horn, 2021.	

Operational emissions consist of area sources, energy sources, mobile sources, solid waste generation, water use, and wastewater treatment. Area source emissions occur from architectural coatings, landscaping equipment, and consumer products. Mobile source emissions are based on the net new vehicle trips generated by the proposed Project. Water consumption emissions occur from energy use for conveyance and treatment, and emissions from solid waste occur as materials decompose. The proposed Project would result in project-related GHG emissions of 2,127.53 MTCO₂/year (inclusive of the amortized construction emissions), which would be below the South Coast AQMD 3,000 MTCO₂/year significance threshold. Therefore, the Project would not generate GHG emissions, directly or indirectly, that would have a significant impact on the environment. Impacts would be less than significant and no mitigation is required.

4.8b *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. On September 3, 2020, SCAG’s Regional Council adopted the *Connect SoCal 2020-2045 Regional Transportation Plan/Sustainable Communities Strategy (RTP/SCS)*. The RTP/SCS is a long-range visioning plan that balances future mobility and housing needs with economic, environmental,

²¹ The Project lifetime is based on the standard 30-year assumption of the South Coast Air Quality Management District (South Coast Air Quality Management District, Minutes for the GHG CEQA Significance Threshold Stakeholder Working Group #13, August 26, 2009).

and public health goals. The RTP/SCS embodies a collective vision for the region's future and is developed with input from local governments, county transportation commissions, tribal governments, non-profit organizations, businesses, and local stakeholders in the counties of Orange, Imperial, Los Angeles, Riverside, San Bernardino, and Ventura. SCAG's RTP/SCS establishes GHG emissions goals for automobiles and light-duty trucks for 2020 and 2035 as well as an overall GHG target for the Project region consistent with both the target date of AB 32 and the post-2020 GHG reduction goals of Executive Orders 5-03-05 and B-30-15.

Title 24 is part of the State's plans and regulations for reducing emissions of GHGs to meet and exceed AB 32 and SB 32 energy reduction goals. Since Title 24 standards require energy conservation features in new construction, the standards help reduce GHG emissions. The proposed Project would be subject to compliance with all building codes in effect at the time of construction, which include energy conservation measures mandated by Title 24 of the California Building Standards Code – Energy Efficiency Standards (e.g., high-efficiency lighting, high-efficiency heating, ventilating, and air-conditioning (HVAC) systems, thermal insulation, double-glazed windows, water conserving plumbing fixtures). California's Building Energy Efficiency Standards are updated on an approximately three-year cycle. The most recent 2019 standards went into effect January 1, 2020.

Further, the Project would not interfere with the State's goals of reducing GHG emission. The Project would comply with The Fullerton Plan's policies and State Building Code provisions intended to reduce GHG emissions. Additionally, the City of Fullerton adopted a Climate Action Plan (CAP) in 2012 which outlines four emission reduction strategies to reduce the GHG emissions. The strategies are as follows:

Transportation and Mobility Strategy

Promote a balanced transportation system that promotes the use of public transportation and bicycles, reduces congestion, and helps encourage residents to engage in healthy and active lifestyles. The transportation and mobility strategy identify opportunities to improve mobility such as walking, bicycling, and transit use, and to decrease the need to drive.

Energy Use and Conservation Strategy

Reduce the carbon footprint of municipal operations to serve as a leader for the community and support the construction of buildings that are energy efficient and incorporate clean, renewable energy sources. The energy use and efficiency strategy recommend ways to increase energy efficiency in existing buildings, enhance energy performance for new construction, and increase use of renewable energy.

Water Use and Efficiency Strategy

Conserve and protect water resources and promote efficiency through public education. The intent of this strategy is to conserve water through efficient use and conservation.

Solid Waste Reduction and Recycling Strategy

Manage solid waste generation and diversion in order to achieve a zero-waste future. The strategy builds on past City successes by increasing waste diversion, reducing consumption of materials that otherwise end up in landfills, and increasing recycling.

The proposed Project would comply with the CAP provisions designed to reduce GHG emissions, as shown in **Table 4.8-2: Project Consistency with CAP**

Table 4.8-2: Project Consistency with CAP	
CAP Measure	Consistency Analysis
T-1 Reduction of Single Occupant Vehicle Trips: Support Regional and sub-regional efforts to increase alternatives to and infrastructure supporting a reduction of single occupant vehicle trips.	Consistent. The Project is near transit served by OCTA Route 37, which runs seven days a week between the Cities of La Habra and Fountain Valley. The Project would place future residents closer to public transit opportunities.
T-2 Inter-Jurisdiction Connections: Support efforts to maintain, expand and create new connections between the Fullerton bicycle network and the bicycle networks of adjacent cities, Orange County, and the region.	Consistent. The Project would not inhibit the use of bicycle by future residents and employees.
E-1 GHG Emissions from Electrical Generation: Support regional and sub-regional efforts to reduce greenhouse gas emissions associated with electrical generation through energy conservation strategies and alternative/renewable energy programs	Consistent. The proposed Project would purchase electricity from a utility subject to the SB 350 Renewable Mandate and the SB 100 Renewable Portfolio Standards.
E-2 Energy- and Resource-Efficient Design: Support projects, programs, policies and regulations to encourage energy and resource efficient practices in site and building design for private and public projects.	Consistent. The proposed Project is a residential development that would place future residents closer to existing commercial developments in the City, which would reduce energy consumption via reduced reliance on vehicular transportation.
SW-3 Waste Stream Separation and Recycling: Support projects, programs, policies and regulations to expand source separation and recycling opportunities to all households (including multi-family housing), businesses, and City operations.	Consistent. The proposed Project includes dedicated spaces for refuse and recycling bins within the attached garages and throughout the site.
Source: City of Fullerton. 2012. The Fullerton Plan. Appendix H: Climate Action Plan	

The proposed Project would comply with all applicable South Coast AQMD rules and regulations during construction and operations and would not interfere with the State’s goals of reducing GHG emission to 1990 levels by 2020, as stated in AB 32. In addition, the proposed Project would not interfere with State efforts to reduce GHG emissions to 40 percent below 1990 levels by 2030 in accordance with SB 32. Approximately 93 percent of the Project’s emissions are from energy and mobile sources, which would be further reduced by implementation of CARB’s 2017 Scoping Plan provisions. Concerning mobile source emissions, the City does not control vehicle emissions (approximately 74 percent of the Project’s total emissions would be from mobile sources). However, these emissions would decline in the future due to statewide measures including the reduction in the carbon content of fuels, CARB’s advanced clean car program, CARB’s mobile source strategy, fuel efficiency standards, cleaner technology, and fleet turnover. Additionally, SCAG expects implementation of its RTP/SCS to help the State reach its GHG reduction goals, with projected reductions in per capita transportation emissions by 19 percent by 2035.²² The Project is an infill development bordered by existing commercial areas and residential development, and near

²² Southern California Association of Governments, *The 2020-2045 Regional Transportation Plan/Sustainable Communities Strategy of The Southern California Association of Governments*, adopted September 3, 2020, p. 9.

several bus stops, thereby potentially reducing the need to travel long distances.²³ Accordingly, the Project would not interfere with the State's efforts to reduce GHG emissions in 2030.

Concerning Executive Order S-3-05 goals for 2050, it is not possible to quantify all emissions savings from future regulatory measures because they have not yet been developed. Just as the Project's GHG emissions would decrease over time from compliance with regulations that will be phased in throughout the State over time, it can be anticipated that Project operations would comply with or benefit from all applicable measures enacted by State lawmakers to reach the goal of an 80 percent reduction below 1990 levels by 2050. This percentage reduction is the level of GHG emissions that the State's GHG regulators believe the State needs to achieve in order to stabilize GHG-induced temperature increases and limit GHG impacts in California's environment. This Initial Study analysis documents what can reasonably be known about the current regulation of GHG emissions and predict GHG impacts to the extent possible based on scientific and factual data. Further analysis would be speculative; therefore, in compliance with CEQA, no further analysis or conclusions are made concerning the Project's long-term GHG impacts.

As noted above, the Project is required to comply with all building codes in effect at the time of construction, which include energy conservation measures mandated by Title 24 of the California Building Standards Code – Energy Efficiency Standards. Therefore, the Project would have a less than significant impact concerning GHG emissions. Consistent with the CARB 2017 Scoping Plan, SCAG RTP/SCS, SB 32, and Title 24, the Project would not conflict with any applicable plan, policy or regulation of an agency adopted for the purpose of reducing GHG emissions. Impacts would be less than significant and no mitigation is required.

Mitigation Program

Standard Conditions and Requirements

- SC GHG-1** Prior to issuance of building permits, the Applicant shall be required to demonstrate to the Community and Economic Development Department, Building Division that building plans meet the applicable Title 24 Energy Efficiency Standards for Residential Buildings (*California Code of Regulations* [CCR], Title 24, Part 6). These standards are updated, nominally every three years, to incorporate improved energy efficiency technologies and methods.
- SC GHG-2** Prior to issuance of building permits, the Applicant shall be required to demonstrate to the Community and Economic Development Department, Building Division that building plans meet the applicable California Green Building Standards (CalGreen) Code (24 CCR 11).

Mitigation Measures

No mitigation is required.

²³ The California Air Pollution Control Officers Association, *Quantifying Greenhouse Gas Mitigation Measures* (August 2010) identifies that infill developments, such as the proposed Project reduce vehicle miles traveled which reduces fuel consumption. Infill projects such as the proposed Project would have an improved location efficiency.

4.9 Hazards and Hazardous Materials

The basis for the information provided in this section is the Phase I Environmental Site Assessment Report (Phase I) (Roux Associates, Inc., February 2021) and the Report of Findings (Roux Associates, Inc. August 2021); these reports are included in **Appendix E: Phase I Environmental Site Assessment and Report of Findings**.

Environmental Issue	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?			X	
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?		X		
c) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?				X
d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code §65962.5 and, as a result, would it create a significant hazard to the public or the environment?				X
e) For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?				X
f) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?			X	
g) Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?				X

4.9.1 IMPACT ANALYSIS

4.9a 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. Project construction would involve the transport, storage, use and/or disposal of limited quantities of hazardous materials, such as fuels, solvents, degreasers, and paints. The use of these materials during would be short-term and would occur in accordance with standard construction practices, as well as with applicable federal, State, and local regulations. Potentially hazardous materials would be contained, stored, and used during construction in accordance with manufacturers' instructions and handled in compliance with applicable standards and regulations. Examples of such activities include fueling and servicing construction equipment and applying paints and other coatings. Project construction would be temporary, and on-site activities would be governed by existing regulations of several agencies. Construction activities would be subject to compliance with relevant regulatory requirements and restrictions concerning the transport, use, or disposal to prevent a significant hazard to the public or environment. The primary regulatory requirements include South Coast Air Quality Management District Rules 1166 (volatile organic compound emissions) and 1466 (fugitive dust-toxic air contaminants).

The Project proposes the construction of 164 DU, including 49 detached single-family residential units and 115 multi-family townhome units, at a density of 13.1 DU/net AC. During operations, the Project would not emit hazardous emissions or involve hazardous or acutely hazardous materials, substances, or waste. However, the Project could involve the use of materials associated with routine property maintenance, such as janitorial supplies for cleaning purposes and/or herbicides and pesticides for landscaping. These uses would not involve the routine transport, use, or disposal of quantities of hazardous materials that could create a significant hazard to the public or environment. The hazardous materials used during operations would be stored, handled, and disposed of in accordance with applicable regulations. Therefore, following compliance with the regulatory requirements, the Project would not create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials. Impacts would be less than significant and no mitigation is required.

4.9b 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 with Mitigation Incorporated. The Project site is fully developed with approximately 108,300 sf of retail commercial uses as part of the Sunrise Village Shopping Center, tennis courts associated with a prior use, and one smaller separate commercial building used by the Red Cross Blood Donation Center. Due to the Project site's current use as a commercial retail center, there is a potential that prior tenants and land uses could have resulted in the accidental release of hazardous materials into the environment. As a result, Project construction could create a significant hazard to the public through the release of hazardous materials into the environment, as discussed below.

Recognized Environmental Conditions (REC)

A REC is defined as a recognized environmental condition resulting from a past release of hazardous substances or petroleum products that has been addressed to the satisfaction of the applicable agency, with hazardous substances or petroleum products allowed to remain in place subject to the implementation of required controls.

The Project site has been occupied by multiple tenants, including restaurants and commercial businesses. In particular, a dry cleaner (Sunrise Cleaners) formerly operated on the site at 1801 Euclid Street between approximately 1980 and 2014. Sunrise Cleaners operated with documented South Coast AQMD equipment permits for the use of tetrachloroethene (PCE), also known as perchloroethylene (PERC), between February 1980 and January 2008. Due to a release of chlorinated volatile organic compounds (VOCs) into the subsurface related to the dry-cleaning operations, the site entered the voluntary assistance program for regulatory oversight of the Orange County Health Care Agency (OCHCA). Between 2008 and 2012, OCHCA oversaw subsurface investigations and remediation in the form of soil vapor extraction of the Sunrise Cleaners facility. Following remediation, OCHCA performed a desktop vapor risk assessment and issued a letter of No Further Action Certification for unrestricted land use on June 19, 2012.

Other Environmental Features (OEF)

Other environmental features (OEFs) are environmental conditions that do not meet the definition of a REC, but which may warrant mention in a comprehensive Phase I ESA. The Phase I ESA identified several environmental cases in the surrounding areas, none of which had the presence or likely presence of any hazardous substances or petroleum products. These environmental cases are listed and discussed below.

- Former Chevron gasoline service station (2001 Euclid Street). The service station ceased operations in 1995. According to the City's Fire Department records, an Underground Storage Tank Removal Report indicated four underground storage tanks (USTs) were abandoned in 1995. Excavation of impacted soils and testing did not identify any residual contamination. The former service station has not been the subject of subsurface investigation and no documented releases have been reported. This historical use does not constitute a REC and is therefore considered an OEF.
- New Oxford Cleaners/Good Cleaners (1031 Rosecrans Avenue). A former dry cleaner facility with documented PCE use operated approximately 250 feet north of the Project site. No documented release of chlorinated solvents exists on available regulatory agency records. No evidence of impacts from this former dry cleaner facility to the Project site has been identified during on-site subsurface investigations. This historical use does not constitute a REC and is therefore considered an OEF.
- The Project site and surrounding parcels were historically used for agricultural operations from 1947 to 1963. Agricultural operations most likely involved the use of chemicals, such as pesticides, herbicides, and fertilizers. No documentation of known impacts from agricultural use exists. Further, development of the Project site into the existing commercial retail use occurred by 1972. The Project site is currently paved with asphalt and contains concrete slabs, limiting any potential past exposure of agricultural uses to subsurface soils. Therefore, this historical use does not constitute a REC and is therefore considered an OEF.

As discussed previously, OCHCA oversaw subsurface investigations and remediation in the form of soil vapor extraction of the Sunrise Cleaners facility. Following remediation, OCHCA performed a desktop vapor risk assessment and issued a letter of No Further Action Certification for unrestricted land use on June 19, 2012. Although a letter of No Further Action Certification was issued for the Sunrise Cleaners dry cleaning use, the Phase I ESA noted several data gaps. Roux staff were unable to interview previous owners and operators of several existing businesses and were not able to access some of the commercial

suites during the site reconnaissance. Further, the Residual concentrations of VOC reported in the soil vapor samples present a vapor intrusion risk in excess of current residential standards. Additionally, the historical soil vapor data collected in the immediate vicinity of the former dry-cleaners use does not delineate the soil vapor plume laterally or vertically. Lastly, historical groundwater samples exceed current regulatory limits. In response to these conditions, the property owner entered into a California Land Reuse and Revitalization Act (CLRRRA) agreement with the DTSC on June 9, 2021. The CLRRRA agreement establishes a process for the property owner to implement a response action as necessary, to ensure that the property can be reused or redeveloped. As a result, Roux Associates, Inc., prepared and submitted a Report of Findings to DTSC for review in August 2021.

As part of the Report of Findings, a Human Health Screening Evaluation was prepared for the Project. The calculated health risks concluded that elevated risk from VOCs in soil vapor may be present for future residents within the southwestern portion of the Project site. As a result, preparation of a Response Plan would be required. The Response Plan includes mitigation measures, future operation and monitoring activities, and administrative controls (Land Use Covenant Restrictions) to mitigate potential risk to future residents at the southwestern corner of Project site. A Land Use Covenant and Operations and Maintenance Agreement would be prepared for the Project, which would restrict certain land use activities on the Project site and detail maintenance requirements per the Response Plan. Additionally, engineering controls would include passive Vapor Intrusion Monitoring Systems (VIMS) beneath future residential building slabs at and near the location of the former dry cleaner where VOCs concentrations in soil vapor are greatest. Implementation of the Response Plan mitigation measures and recommendations are prescribed under MM HAZ-1. MM HAZ-1 would require the Applicant to implement and adopt the Response Plan's recommendations and measures to address the potential release of hazardous materials into the environment. With mitigation, impacts would be less than significant.

Additionally, some of the existing on-site structures were constructed in the 1970s and may contain lead-based paints and asbestos-containing materials. Project implementation would include demolition of existing structures which may involve release of lead-based paints and asbestos-containing materials into the environment. Therefore, the Project would be required to comply with SC HAZ-1, which requires that a Certified Environmental Professional confirm the presence or absence of ACM and LBPs, prior to structural demolition/renovation activities.

Following implementation of MM HAZ-1 and compliance with SC HAZ-1, the 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. With mitigation, impacts would be less than significant.

4.9c *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?*

No Impact. The nearest existing school to the Project site is D. Russell Parks Junior High School, located at 1710 Rosecrans Avenue, approximately 0.2 mile to the west. The nearest proposed school to the Project site is the daycare facility proposed at 1901 Euclid Street, immediately to the west/adjacent to the Project site. The Project is a residential development that would not emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste. As such, no impact would occur and no mitigation is required.

4.9d Would the project be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code §65962.5 and, as a result, would it create a significant hazard to the public or the environment?

No Impact. Government Code §65962.5 refers to the Hazardous Waste and Substances Site List, commonly known as the Cortese List, maintained by the State of California Department of Toxic Substances Control (DTSC). The Cortese List identifies hazardous waste and substance sites including public drinking water wells with detectable levels of contamination; sites with known USTs having a reportable release; and solid waste disposal facilities from which there is a known migration. The Cortese List also includes hazardous substance sites selected for remedial action; historic Cortese sites; and sites with known toxic material identified through the abandoned site assessment program. Review of EnviroStor²⁴ and GeoTracker²⁵ databases indicate the Project site is not on a list of hazardous materials sites compiled pursuant to Government Code §65962.5. No impact would occur and no mitigation is required.

4.9e For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?

No Impact. The Project site is approximately 2.3 miles northeast of the nearest airport- the Fullerton Municipal Airport, and not within the Fullerton Municipal Airport Influence Areas.²⁶ Therefore, the Project would not result in a safety hazard or excessive noise for people working or residing at the Project site. No impact would occur and no mitigation is required.

4.9f Would the project impair implementation of or physically interfere with an emergency response plan or emergency evacuation plan?

Less Than Significant Impact. The Fullerton Plan EIR identifies all major streets would serve as evacuation routes. City highways and arterial streets that connect to the SR-91 and SR-57 would serve as evacuation routes in the event of an extraordinary emergency situation. Project-related construction activities could temporarily impact street access and traffic flow due to roadway improvements and potential extension of construction activities into the rights-of-way for utility connections, resulting in temporary lane closures. As discussed in **Section 4.17: Transportation**, the Project would not result in full lane closures during construction per SC TRA-1. Access to existing roadways within the Project area would not be impeded. Therefore, the Project would not impair the implementation of or physically interfere with an emergency response plan or emergency evacuation plan. Project impacts would be less than significant and no mitigation is required.

4.9g 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 California Department of Forestry and Fire Protection (CAL FIRE) has mapped fire threat potential throughout California. CAL FIRE ranks fire threats based on the availability of fuel and the likelihood of an area burning (based on topography, fire history, and climate). The Project site is in a Non-

²⁴ Department of Toxic Substance Control. (2021). *Envirostor Database*. Retrieved from <https://www.envirostor.dtsc.ca.gov/public/>.

²⁵ State Water Resources Control Board. (2021). *GeoTracker*. Retrieved from <https://geotracker.waterboards.ca.gov/>.

²⁶ Airport Land Use Commission for Orange County. (2019). *AELUP Notification Area for FMA*. Retrieved from https://files.ocair.com/media/2021-05/influence-area-fullerton_muni.pdf?VersionId=NXvUATIB6XT2qatYXABQ5oT4A4wuKthA.

Very High Fire Hazard Severity Zone (VHFHSZ) zone within a local responsibility area.²⁷ (See Section 4.20, Wildfires). Therefore, the Project would not expose people or structures to risk involving wildland fires. No impact would occur and no mitigation is required.

Mitigation Program

Standard Conditions and Requirements

SC HAZ-1 Prior to structural demolition/renovation activities, a Certified Environmental Professional shall confirm the presence or absence of ACM's and LBPs. Should ACMs or LBPs be present, demolition materials containing ACMs and/or LBPs shall be removed and disposed of at an appropriate permitted facility.

Mitigation Measures

MM HAZ-1 **DTSC Response Plan.** Prior to the issuance of demolition permits, the City shall review all Project plans and all other relevant engineering drawings to verify compliance with the recommendations from the DTSC approved Response Plan. The Response Plan would include mitigation and recommendations to address the potential soil contamination and soil vapor hazards from the prior Sunrise Cleaners dry cleaning use. Actions include the following:

- Contaminated soil identified as exceeding screening levels shall be excavated, segregated, managed in temporarily stockpiles with appropriate cover, profiled, and transported to a licensed disposal facility.
- A vapor intrusion mitigation system (VIMS) consisting of a passive sub slab depressurization system (SSD) coupled with a vapor barrier system shall be installed under the proposed residences (Lots 10-34, 41-43 and building blocks 50 and 51)²⁸. If conditions warrant, as determined by DTSC, the SSD system shall be converted to an active system, which will actively remove vapors from beneath the footprint of structures.

²⁷ CalFire. (June, 2019). *FHSZ Viewer*. Available at: <https://egis.fire.ca.gov/FHSZ/>. Accessed June 2, 2021.

²⁸ Roux Associates, Inc. (August 2021). *Report of Findings, Figure 4*.

4.10 Hydrology and Water Quality

This section is based on the Water Quality Management Plan (WQMP) (Huitt-Zollars , May 2021) which is included in its entirety in **Appendix F: Water Quality Management Plan** and the Preliminary Drainage Report (Huitt-Zollars , June 2021) which is included in its entirety in **Appendix G: Preliminary Drainage Report**.

Environmental Issue	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project:				
a) Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality?			X	
b) Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the projects may impede sustainable groundwater management of the basin?			X	
c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:			X	
(i) Result in substantial erosion or siltation on- or off-site.			X	
(ii) Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site;			X	
(iii) Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff? or			X	
(iv) Impede or redirect flood flows?			X	
d) In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?				X
e) Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?			X	

4.10.1 IMPACT ANALYSIS

4.10a *Would the project violate water quality or waste discharge requirements or otherwise substantially degrade surface or ground water quality?*

Less Than Significant Impact. Project impacts related to water quality could occur over three different periods:

- During the earthwork and construction phase, where the potential for erosion, siltation, and sedimentation would be the greatest;
- Following construction, before the establishment of ground cover, when the erosion potential may remain relatively high; and
- After project completion, when impacts related to sedimentation would decrease markedly but those associated with urban runoff would increase.

Urban runoff in dry and wet weather conditions discharges into storm drains, and flows directly to creeks, rivers, lakes, and the ocean. Polluted runoff can have harmful effects on drinking water, recreational water, and wildlife. Urban runoff pollution includes a wide array of environmental, storm water characteristics depend on site conditions (e.g., land use, impervious cover, and pollution prevention practices), rain events (duration, amount of rainfall, intensity, and time between events), soil type and particle sizes, the amount of vehicular traffic, and atmospheric deposition. Major pollutants typically found in runoff from urban areas include sediments, nutrients, oxygen-demanding substances, heavy metals, petroleum hydrocarbons, pathogens, and bacteria. Most urban storm water discharges are non-point sources, coming from multiple sources including excess fertilizers, herbicides and insecticides from agricultural lands and residential areas, and oil, grease and toxic chemicals from urban runoff.

Existing Conditions

The Project site has a sloped topography with elevations ranging from approximately 268 feet (msl) near its northwestern corner to approximately 215 feet msl at its southeastern boundary. Under existing conditions, drainage sheet flows east toward Euclid Street via inlets which then direct flows into the existing six-foot-wide by seven-foot-long trapezoidal concrete channel, parallel to Euclid Street. Any existing on-site drainage that does not flow to the concrete channel drains directly onto Euclid Street. Storm water runoff entering Euclid Street flows in a southerly direction towards Fullerton Creek Channel for ultimate discharge into the San Gabriel River Estuary and the Pacific Ocean at San Pedro Bay.

Construction

Short-term impacts related to water quality can occur during the earthwork and construction phases when the potential for erosion, siltation, and sedimentation would be the greatest. Additionally, impacts could occur prior to the establishment of ground cover when the erosion potential may remain relatively high. Project construction has activities could produce typical pollutants, such as nutrients, heavy metals, pesticides and herbicides, and chemicals related to construction and cleaning, waste materials, including wash water, paints, wood, paper, concrete, food container, sanitary wastes, fuel, and lubricants. Impacts to storm water quality could occur from construction, and associated earthmoving, and increased pollutant loading.

Construction activity subject to the Construction General Permit for Stormwater Discharge Associated with Construction Activity (Construction General Permit) includes any construction or demolition activity, including, but not limited to, clearing, grading, grubbing, or excavation, or any other activity that results

in a land disturbance of equal to or greater than one acre. The Project would disturb approximately 12.52 acres; therefore, the Project would be subject to the Construction General Permit. The Construction General Permit requires development and implementation of a SWPPP and monitoring plan, which must include erosion-control and sediment-control BMPs that would meet or exceed measures required by the General Permit to control potential construction-related pollutants. Erosion-control BMPs are designed to prevent erosion, whereas sediment controls are designed to trap sediment once it has been mobilized.

To obtain coverage under the Construction General Permit, the Applicant is required to file with the State Water Board, the Permit Registration Documents (PRDs), which include a Notice of Intent (NOI) and other compliance-related documents. The Construction General Permit requires preparation and implementation of a SWPPP and monitoring plan, which must include erosion-control and sediment-control BMPs that would meet or exceed measures required by the Construction General Permit to control potential construction-related pollutants. Erosion-control BMPs prevent erosion, whereas sediment controls trap sediment once it has been mobilized. The types of required BMPs are relative to the amount of soil disturbed, the types of pollutants used or stored at the Project site, and proximity to water bodies.

FMC §14.03.010 adopts the 2019 Edition of the California Building Code, Volumes 1 and 2. FMC §14.03.200 codifies Section J109.5 of Appendix J of the 2019 California Building Code. Section J109.5, Storm Water Control Measures, requires grading permit applications to document and detail temporary and permanent erosion-control and runoff management measures. The Project would be required to demonstrate consistency with FMC §14.03.200 through compliance with the NPDES Program specified under SC HYD-1 and HYD-2. Following compliance SC HYD-1 and SC HYD-2, which include implementation of BMPs, the Project's construction-related activities would not violate any water quality standards or otherwise substantially degrade surface or groundwater quality. Therefore, impacts would be less than significant and no mitigation is required.

Operations

The Orange County Flood Control District (OCFCD), the County of Orange, and the City of Fullerton, along with 25 incorporated cities therein (Permittees) discharge pollutants from their municipal separate storm sewer (drain) systems (MS4s). Stormwater and non-stormwater enter and are conveyed through the MS4s and discharged to Santa Ana Region surface water bodies. These discharges are subject to countywide waste discharge requirements contained in *Order No. R8-2010-0062 (NPDES Permit No. CAS618030), Waste Discharge Requirements for the County of Orange, OCFCD and the Incorporated Cities of Orange County within the Santa Ana Region Areawide Urban Storm Water Runoff*, which was adopted on January 29, 2020. The MS4 Permit Order provides the revised waste discharge requirements for MS4 discharges within the Orange County watersheds, which includes Fullerton. The MS4 Permit Order supersedes Order No. R8-2009-0030. Orange County uses its Model Water Quality Management Program (MWQMP) to require that projects comply with NPDES MS4 Permit water quality requirements.

The MS4 Permit Order requires development and implementation of a Water Quality Management Plan (WQMP) for all "New Development" and "Redevelopment" projects subject to the Order. New development and redevelopment projects/activities subject to Orange County's LID requirements include all development projects equal to 1.0 acre or greater of disturbed area and new development that creates 10,000 sf or greater of new impervious surface on a previously undeveloped site. In addition, redevelopment that adds or replaces 5,000 sf or greater of impervious surface on an already developed site is also subject Orange County's LID requirements. The Project involves approximately 6.96 gross-acres of disturbed area; and the replacement of more than 10,000 sf of impervious surface area. The Project

site is currently developed as a shopping center; approximately 20 percent of the site is pervious. In the post-development condition, approximately 34 percent of the Project site would be pervious associated with landscape and open space areas. Project implementation represents an increase in pervious area. The Project's post development design to capture and treat stormwater is subject to Orange County's Model Water Quality Management Program (MWQMP) requirements.

Concerning water quality, the following materials are anticipated to be used or generated during Project operations, which would potentially contribute to pollutants, other than sediment, to stormwater runoff:

- Vehicle fluids, including oil, grease, petroleum, and coolants from personal vehicles;
- Landscaping materials and wastes (topsoil, plant materials, herbicides, fertilizers, mulch, pesticides);
- General trash debris and litter; and
- Pet waste (bacteria/ fecal coliforms).

The Project would treat site runoff in accordance with the Orange County's MWQMP requirements. The proposed Project would maintain the existing drainage pattern to the maximum extent feasible. Ultimate site improvements would also include drainage inlets and on-site private storm drains. Specifically, on-site street slopes would convey the flows to five drainage management areas. Surface flows would be directed into an area drain piping system or on-site curb and gutters which would convey flows to five Modular Wetland Systems (MWS) to treat runoff. Each MWS would capture, treat, and convey runoff into a storm drain pipe that discharges into the existing concrete channel along the eastern edge of the site, parallel to Euclid Street.

The MWS Biofiltration vault designs would provide a three-phase treatment "train." When storm water initially enters the system, a trash rack, filter media, and settling chamber would capture large trash/debris and sediment in the storm water before entering the planting media. This design would treat storm water flow horizontally. Before storm water enters the planting or "wetland" chamber, the runoff flows through the second phase, a pre-filter cartridge, which captures fine total suspended solids (TSS), metals, nutrients and bacteria. The pre-filter chamber eliminates additional maintenance of the planting area. The wetland chamber is the system's third design phase, which provides final treatment through a combination of physical, chemical and biological processes.

Inclusion of the MWS units to meet flood control and LID treatment requirements would further reduce the proposed runoff to the existing storm drain system. The proposed system has been sized and designed to mitigate proposed 100-year flow rates to existing condition. It is anticipated that the MWS units would fill to capacity in large storm events and overflow or bypass to a capture point downstream and prior to going off of the site. Overflow drainage would sheet flow toward Euclid Street in a runoff pattern similar to existing conditions.

The Project's WQMP Appendix G Chapter IV.3: LID BMP Selection and Project Conformance Analysis, identifies the Project's proposed non-structural BMPs. Retention criteria would be met with the proposed MWS. Accordingly, evapotranspiration, rainwater harvesting BMPs are not required. Non-structural BMPs, which consist of educating employees and occupants, developing and implementing HOA guidelines, and implementing BMPs are proposed.

Hydromodification refers to changes in the magnitude and frequency of stream flows and its associated sediment load due to urbanization or other changes in the watershed land use and hydrology and the

resulting impacts on receiving channels, such as erosion, sedimentation, and potentially degradation of in-stream habitat. Due to the decrease of impervious surfaces, from 80 to 66 percent, runoff from the Project site would decrease with Project implementation. Implementation of storm water BMPs and on-site MWS would further reduce the potential for off-site impacts. Implementation of BMPs would address the pollutants of concern associated with a residential development.

Following compliance with NPDES and OCFCD requirements, which include LID BMPs, Project operations would not violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality. Therefore, Project impacts would be less than significant and no mitigation is required.

4.10b *Would the project substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?*

Less Than Significant Impact. The City of Fullerton Public Works Department Water Division provides water service to residents and businesses. The Project site is within Pressure Zone 2, which is the northern portion of the City.

The City works with two primary agencies, the Metropolitan Water District of Southern California (MWD) and the Orange County Water District (OCWD), to ensure water supply reliability. Groundwater from the Orange County Groundwater Basin (Basin) accounts for approximately 79 percent of the City's overall supply and imported water is approximately 21 percent. It is projected that by 2045, the City's water supply portfolio will change to approximately 85 percent groundwater and 15 percent imported water. If the City exceeds its groundwater allocation, a purchase agreement is in place with MWD that allows purchase of supplemental imported water. The City maintains seven imported water connections to MWD and six emergency interconnections with other utilities.

The City's Public Works Department Water Division operates 15 reservoirs with a capacity of 67.5 million gallons (MG), 12 booster pumping stations, and 8 active groundwater wells, and manages 424 miles of water mains with approximately 31,936 service connections. The Fullerton 2020 Urban Water Management Plan (UWMP) forecasts the City's total retail water demand to be 27,850-acre feet (AF) by 2045.²⁹

As noted above, Project implementation would decrease the site's effective imperviousness from 80 percent to 66 percent, resulting in potentially less stormwater runoff and greater percolation. The Project would not reduce the maximum availability of storm water for groundwater recharge through percolation of precipitation. Therefore, the Project would not interfere with groundwater recharge groundwater recharge would be impeded.

As identified in Threshold 4.10e, the Project's average daily water demand would be approximately 81,150 gallons per day (GPD), an increase of 31,070 GPD from existing conditions. As discussed under Threshold 4.19b, the Project would require a General Plan Revision from Commercial to Low/Medium Density Residential. The Project's proposed land uses would differ from land uses and associated water demands assumed in the UWMP. However, as discussed in Section 4.14, Project implementation would only nominally increase the City's population and would be below SCAG's population forecast for the City

²⁹ Arcadis. (June 2021). 2020 UWMP for City of Fullerton. Available at: <https://www.cityoffullerton.com/home/showpublisheddocument/5052/637598829614070000>, Accessed July 15, 2021.

of Fullerton, thus, resulting in only nominal increases in water demands. Therefore, the Project would not conflict with UWMP demand projections and would not substantially decrease groundwater supplies. Project impacts would be less than significant and no mitigation is required.

4.10c *Would the project substantially alter the existing drainage pattern of the site or area, including through the alterations of the course of stream or river or through the addition of impervious surfaces, in a manner which would:*

- (i) Result in substantial erosion or siltation on- or off-site?*
- (ii) Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site?*
- (iii) Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff?*
- (iv) Impede or redirect flood flows?*

Less Than Significant Impact. As noted in Threshold 4.10a, under existing conditions, runoff on the Project site sheet flows toward Euclid Street via inlets which then direct flows into the existing six-foot-wide by seven-foot-long trapezoidal concrete channel located parallel to Euclid Street. Channel flows outlet into a 72-inch OCFCD storm drain located within Euclid Street. The Project would not result in a significant change to the site's drainage pattern and flows would continue to sheet flow east toward Euclid Street. The Project would not involve the alteration of the course of a stream or river. As previously addressed, the Project would follow existing drainage patterns.

Upon Project implementation, runoff from the Project site would decrease compared to existing conditions due to the increase in pervious surfaces. Furthermore, the City requires that development projects not increase storm water runoff under SC HYD-3. Therefore, the Project would not increase the rate or amount of surface runoff. Further, peak discharges would be mitigated for all frequency events and no flooding would occur on the Project site due to the use of MWS. Therefore, the Project is within the capacity of the City's existing storm drain system and satisfies surface water quality requirements. During construction, the construction plans would be reviewed along with supporting hydrology reports and calculations and the Project would be required to comply with NPDES and FMC requirements to ensure that any potential impacts associated with runoff and water quality during grading and Project construction would be addressed. Therefore, impacts would be less than significant and no mitigation is required.

4.10d *In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?*

No Impact. Flood Insurance Rate Map (FIRM) 0659C0039J indicates that the Project site is within Zone X, an area of minimal flood hazard.³⁰ Therefore, the Project site is not located within the 100-year hazard flood zone area. The Project site is not subject to flooding and Project implementation would not impede or redirect flood flows. No impact would occur and no mitigation is required.

³⁰ United States, Federal Emergency Management Agency. FEMA. Flood Insurance Rate Map 0659C0039J. Available at <https://msc.fema.gov/portal/search?AddressQuery=euclid%20and%20rosecrans%2C%20fullerton#searchresultsanchor>. Accessed June 28, 2021.

4.10e *Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?*

Less Than Significant Impact. As noted in Threshold 4.10b, the City's local groundwater water supply is produced from the Orange County Groundwater Basin (OC Basin). The OC Basin underlies the northerly half of Orange County beneath broad lowlands. The OC Basin, managed by OCWD, covers an area of approximately 350 square miles, bordered by the Coyote and Chino Hills to the north, the Santa Ana Mountains to the northeast, and the Pacific Ocean to the southwest.

Historically, the Santa Ana River has served as the primary source of water to recharge the OC Basin. Santa Ana River flows are expected to decrease as additional future water recycling projects are built in the upper watershed. OCWD continues to work with the U.S. Army Corps of Engineers to temporarily impound and slowly release up to approximately 20,000 AF of stormwater in the Prado Dam Conservation Pool. When available, OCWD would continue to augment groundwater recharge through the purchase of imported water through MWD. OCWD monitors and evaluates future water supply projects to sustainably manage and protect the OC Basin for future generations.

Water use within the City's service area has been relatively stable in the past decade with an annual average of 26,098 AF. Stable population growth of 1.4 percent per year and the City's relative built out nature along with water conservation measures have stabilized per capita water use. In accordance with the California Urban Water Management Planning Act, the City of Fullerton must prepare and adopt a UWMP every five years. The City's most recent 2020 UWMP, which was published in 2021, describes the City's management operations in achieving the maximum practicable conservation and efficient use of local water resources.

The 2020 UWMP estimated a total water demand of 27,850 AF by 2045. Additionally, the City's population is expected to increase from 141,648 persons in 2020 to 189,687 persons by 2045. In case of a water supply shortage, the City has prepared a Water Shortage Contingency Plan to ensure adequate service. The Water Shortage Contingency Plan serves as the operating manual detailing processes and procedures to be deployed during shortage conditions, enabling the City and water retail agencies to identify and efficiently implement pre-determined steps to mitigate a water shortage. The Project site is currently developed as the Sunrise Village Shopping Center and other commercial uses. Project implementation would result in a net change between the existing uses and proposed residential uses (see Section 4.19, Utilities and Service Systems, for further discussion). The net change in water demand is estimated at 31,070 gpd, or 34.8 AF per year. Total groundwater demand in 2020 was estimated at 18,758 AF. The Project's water demand, if solely relied upon from groundwater resources, would represent approximately 0.18 percent of the City's total groundwater demand in 2020. The City would continue to comply with SB X7-7 requirements, which aim to reduce urban water usage by 20 percent by 2020. Compliance and SB X7-7 reduction targets would reduce any project-related impacts on sustainable groundwater management plans. Impacts are less than significant and no mitigation is required.

Mitigation Program

Standard Conditions

SC HYD-1 Prior to issuance of any Grading or Building Permit, and as part of the future development's compliance with the NPDES requirements, a Notice of Intent shall be prepared and submitted to the Santa Ana RWQCB providing notification and intent to comply with the State of California General Construction Permit. Also, a Stormwater

Pollution Prevention Plan (SWPPP) shall be reviewed and approved by the Director of Engineering for water quality construction activities on-site. A copy of the SWPPP shall be available and implemented at the construction site at all times. The SWPPP shall outline the source control and/or treatment control BMPs to avoid or mitigate runoff pollutants at the construction site to the “maximum extent practicable.” All recommendations in the Plan shall be implemented during area preparation, grading, and construction. The project applicant shall comply with each of the recommendations detailed in the Study, and other such measure(s) as the City deems necessary to mitigate potential stormwater runoff impacts.

SC HYD-2 Prior to issuance of any Grading Permit, future development projects shall prepare, to the satisfaction of the Director of Engineering, a Water Quality Management Plan or Stormwater Mitigation Plan, which includes Best Management Practices (BMPs), in accordance with the Orange County DAMP. All recommendations in the Plan shall be implemented during post construction/operation phase. The project applicant shall comply with each of the recommendations detailed in the Study, and other such measure(s) as the City deems necessary to mitigate potential water quality impacts.

SC HYD-3 Site development shall not result in the increase of storm water run-off and flow intensity to the adjacent properties nor obstruct storm water flow into the site

Mitigation Measures

No mitigation measures are required.

4.11 Land Use and Planning

Environmental Issue	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project:				
a) Physically divide an established community?				X
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?			X	

4.11.1 IMPACT ANALYSIS

4.11a *Would the project physically divide an established community?*

No Impact. An example of a project that has the potential to divide an established community includes a new freeway or highway through an established neighborhood. The proposed Project is an infill residential development, which would demolish the existing Sunrise Village Shopping Center, commercial pads, and tennis court sand, in their place, develop a residential community consisting of 164 residences. Specifically, 49 detached single-family residential units on Lot 1 and 115 multi-family townhomes on Lot 2 are proposed. Given its nature and scope, the Project would not physically divide an established community. No impact would occur and no mitigation is required.

4.11b *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 Fullerton Plan Land Use Plan Map depicts the City’s land use designations and indicates the Project site is designated “Commercial.” The Commercial designation is meant to establish and protect opportunities for convenient commerce within both neighborhood and regional shopping centers. The Project proposes a planned residential development, which would not be consist with the Commercial designation. Therefore, the Project requires a General Plan Revision (LRP-2021-0006) to change the land use designation from Commercial to Low-Medium Residential. The Low-Medium Residential land use designation allows for residential neighborhoods, which may comprise multiple-unit attached dwellings and Planned Residential Developments to a maximum density of 15 DU/AC. The intent is to provide for duplexes, mobile homes, townhouses, and condominium developments with a variety of densities and living arrangements. **Table 4.11-1: General Plan Consistency** below demonstrates the Project’s consistency with applicable Fullerton Plan policies.

Table 4.11-1: General Plan Policies Consistency	
Policy	Consistency
Chapter 1 Community Development and Design	
<p>1.11 Compatibility of Design and Uses. Support programs, policies and regulations to consider the immediate and surrounding contexts of projects to promote positive design relationships and use compatibility with adjacent built environments and land uses, including the public realm.</p>	<p>The Project is an infill residential development within a developed area of the City. The Project site is bordered by existing commercial and residential uses. Project implementation would complement existing neighborhoods by proposing similar residential uses. The proposed architecture would incorporate various materials and setbacks to break up building massing and would include both 2- and 3-story units. The maximum proposed building height would be approximately 36 feet (to roof ridge), consistent with existing multi-family developments in the vicinity. Residences proposed near the existing single-family neighborhood along Paseo Dorado would be limited to two-story at a maximum height of 26.5 feet.</p>
Chapter 2 Housing	
<p>3.4 Facilitate Infill Development. The built-out nature of the City require the evaluation of land currently developed with existing uses for potential residential development. The City will continue to facilitate infill development within feasible development sites for homeownership and rental units through proactive and coordinated efforts...</p>	<p>The Project would develop 164 DUs on an underutilized commercial retail property with a vacancy rate of approximately 45 percent. Project implementation would introduce housing near existing single- and multi-family residential communities in the City. The proposed market rate units would provide additional housing opportunities in the City.</p>
<p>3.20 Efficient Use of Energy Resources in Residential Development. The City shall continue to encourage housing developers to maximize energy conservation through proactive site, building and building systems design, materials, and equipment...</p>	<p>The Project would comply with State Building Energy Efficiency Standards, appliance efficiency regulations, and green building standards (CALGreen). The proposed Project would include design features such as high efficiency windows to reduce heating and cooling loads; energy-efficient appliances in compliance with Title 24; and high efficiency heating and cooling systems to reduce energy consumption. See Section 4.6, Energy for further discussion.</p>
Chapter 6 Growth Management	
<p>7.2 Housing Growth. Support projects, programs, policies and regulations to accommodate housing growth consistent with the Regional Housing Needs Assessment in areas of the City with existing and planned infrastructure capabilities.</p>	<p>The City of Fullerton’s Regional Housing Needs Assessment (RHNA) for the 2021-2029 planning period identifies the City’s future housing need at 13,209 units. The Project would be in furtherance of the City meeting its future housing need for the 2021-2029 planning period. The Project would contribute an additional 164 DUs to the City’s housing inventory. The proposed Project would be consistent with the SCAG growth projections and RHNA for the City.</p>

Table 4.11-1: General Plan Policies Consistency	
Policy	Consistency
Chapter 10 Public Safety	
13.2 Adequate Resources for Emergencies. Support policies and programs that ensure adequate resources are available in all areas of the City to respond to health, fire and police emergencies.	Project implementation would increase the City' population by approximately 474 persons; see Threshold 4.14a. The Project is an infill development on a site currently served by public services. Accordingly, the Project would not result in substantial increased demand on the City's services. See Section 4.15, Public Services for further discussion.
Chapter 11 Public Health	
14.2 Healthy Living. Support policies, projects, programs and regulations that result in changes to the physical environment to improve health, well-being and physical activity.	The Project would include useable open space including on-site parks and recreational facilities for residents. The recreation area proposed in Lot 1 would include a swimming pool, pool deck with lounge chairs, and fire-pit seating. Two pocket parks proposed in Lot 2 would provide outdoor dining table seating, outdoor BBQ counters, bench seating, and turf areas.
Chapter 16 Water	
19.2 Conservation Efforts. Support regional and subregional efforts to promote water efficiency and conservation.	The Project would comply with all State and local standards concerning water supply and conservation. The Project would include low water, drought tolerant landscaping and water efficient fixtures to promote efficient use and conservation of water resources.
19.5 Water Quality. Support projects, programs, policies and regulations to ensure the quality of the water supply.	The Project would comply with all federal, State, and local standards concerning water quality. Construction-related effects would be addressed through compliance with a SWPPP and erosion and siltation control measures as required by the NPDES Construction General Permit. Long-term operational effects would be addressed through proposed site design features including LID BMPs. Stormwater runoff would be treated by MWS units and discharge into the existing concrete channel along the eastern edge of the site. Accordingly, the Project would minimize potential impacts on water supply and water resources.
20.2 Urban Runoff Management. Support regional and subregional efforts to support cleaner and reduced urban runoff.	As discussed above, the Project would comply with NPDES requirements and implement LID BMPs to minimize potential impacts to water resources. Proposed site improvements include drain inlets and multiple Bioclean proprietary modular wetland system units (MWS) to capture, treat and convey runoff to the existing concrete channel along Euclid Street.

Table 4.11-1: General Plan Policies Consistency	
Policy	Consistency
20.7 Development Impacts. Support projects, programs, policies and regulations to reduce impacts to watersheds and urban runoff caused by the design or operation of a site or use.	As discussed above, the Project would implement LID BMPs to minimize runoff from the site and would include MWS to capture, treat, and convey runoff prior to discharge into existing storm drainage facilities.
Chapter 18 Integrated Waste Management	
23.7 Waste Management. Support projects, programs, policies and regulations to consider project level solid waste management needs at the site and building design stages.	The Project would comply with State law, which requires a 65 percent diversion rate for construction and demolition projects. During operations, the Project would be served by Republic Services. There is sufficient landfill capacity to accommodate solid waste generated on-site; see Section 4.19, Utilities and Service Systems.
Source: City of Fullerton. (2012). <i>The Fullerton Plan</i> . Retrieved from https://www.cityoffullerton.com/government/departments/community-and-economic-development/planning-zoning/general-plan?locale=en .	

Mitigation Program

Standard Conditions and Mitigation Measures

No standard conditions or mitigation measures are required.

4.12 Mineral Resources

Environmental Issue	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?				X
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?				X

4.12.1 IMPACT ANALYSIS

4.12a 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?

4.12b 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. The Surface Mining and Reclamation Act of 1975 (SMARA) requires classification of land into mineral resource zones (MRZs) according to the known or inferred mineral potential of the area.³¹ The City has land classified as MRZ-2, marking the measured or indicated presence of significant mineral deposits. However, the Project site is not classified MRZ-2. Additionally, the City does not contain any locally important mineral resource recovery sites due to its highly urbanized nature.³² Neither The Fullerton Plan nor The Fullerton Plan EIR discusses significant mineral resources within the City. Additionally, the Project is a planned residential development, which would not involve any mineral extraction activities. Therefore, the Project would not result in the loss of a known mineral resource or loss of availability of a known mineral resource or locally important mineral resource site. No impact would occur and no mitigation is required.

Mitigation Program

Standard Conditions and Mitigation Measures

No standard conditions or mitigation measures are required.

³¹ California Department of Conservation. (2018). *California Statutes and Regulations for the California Geological Survey*. Sacramento, CA: California Geological Survey.

³² California Department of Conservation. (2015). *CGS Information Warehouse: Regulatory Maps*. Retrieved from <http://maps.conservation.ca.gov/cgs/informationwarehouse/>.

4.13 Noise

A noise analysis was prepared by Kimley-Horn and Associates, Inc. (Kimley-Horn, 2021) for the proposed Project. The noise modeling is included in **Appendix H: Noise Data** and the results are summarized below.

Environmental Issue	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project:				
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?			X	
b) Generation of excessive ground borne vibration or groundborne noise levels?			X	
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 two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?				X

4.13.1 BACKGROUND

This analysis describes sound in terms of amplitude (loudness) and frequency (pitch). Sound can be described as the mechanical energy of a vibrating object transmitted by pressure waves through a medium (e.g., air) to human (or animal) ear. If the pressure variations occur frequently enough (at least 20 times per second), they can be heard and are called sound. The number of pressure variations per second is called the frequency of sound and is expressed as cycles per second, or hertz (Hz).

Noise is defined as loud, unexpected, or annoying sound. In acoustics, the fundamental model consists of a noise source, a receptor, and the propagation path between the two. The loudness of the noise source, obstructions, or atmospheric factors affecting the propagation path, determine the perceived sound level and noise characteristics at the receptor. Acoustics deal primarily with the propagation and control of sound. A typical noise environment consists of a base of steady background noise that is the sum of many distant and indistinguishable noise sources. Superimposed on this background noise is the sound from individual local sources. These sources can vary from an occasional aircraft or train passing by to continuous noise from traffic on a major highway. Perceptions of sound and noise are highly subjective from person to person.

Measuring sound directly in terms of pressure would require a large range of numbers. To avoid this, the decibel (dB) scale was devised. The dB scale uses the hearing threshold of 20 micropascals (μPa) as a point of reference, defined as 0 dB. Other sound pressures are then compared to this reference pressure, and

the logarithm is taken to keep the numbers in a practical range. The dB scale allows a million-fold increase in pressure to be expressed as 120 dB, and changes in levels correspond closely to human perception of relative loudness.

Several rating scales have been developed to analyze the adverse effect of community noise on people. Since environmental noise fluctuates over time, these scales consider that the effect of noise on people is largely dependent on the total acoustical energy content of the noise as well as the time of day when the noise occurs. For example, the equivalent continuous sound level (L_{eq}) is the acoustic energy content of noise for a stated period of time; thus, the L_{eq} of a time-varying noise and that of a steady noise are the same if they deliver the same acoustic energy to the ear during exposure. The Day-Night Sound level (L_{dn}) is a 24-hour average L_{eq} with a 10 dBA “weighting” added to noise during the hours of 10:00 p.m. to 7:00 a.m. to account for noise sensitivity in the nighttime. The Community Noise Equivalent Level (CNEL) is a 24-hour average L_{eq} with a 10 dBA weighting added to noise during the hours of 10:00 p.m. to 7:00 a.m. and an additional 5 dBA weighting during the hours of 7:00 p.m. to 10:00 p.m. to account for noise sensitivity in the evening and nighttime.

Existing Setting

The Project site is currently developed with commercial uses and the surrounding area is primarily characterized with residential and commercial uses; see Section 2.2.3. Mobile noise sources, especially cars and trucks, are the most common and significant sources of noise within the area. Most of the existing mobile noise in the area is generated from vehicles along surrounding roadways, primarily Rosecrans Avenue and Euclid Street. The primary sources of stationary noise are urban activities (i.e., mechanical equipment, parking areas, and pedestrians). The noise associated with these sources may represent a single-event noise occurrence, short-term or long-term/continuous noise.

Noise-Sensitive Receptors. Noise-sensitive receptors are generally considered to include those uses where noise exposure could result in health-related risks to individuals, as well as places where quiet is an essential element of their intended purpose. Residential dwellings are of primary concern because of the potential for increased and prolonged exposure of individuals to both interior and exterior noise levels. Additional land uses such as parks, historic sites, cemeteries, and recreation areas are considered sensitive to increases in exterior noise levels. Schools, churches, hotels, libraries, and other places where low interior noise levels are essential are also considered noise-sensitive land uses. Noise-sensitive uses surrounding the Project site include multi-family and single-family residences to the north, east, south, and west of the Project site boundary. The noise-sensitive uses located nearest the Project site are the multi-family residences and senior housing development situated approximately 30 feet west of the Project site, and the daycare facility proposed at 1901 Euclid Street, approximately 30 feet east of the Project site boundary.

Noise Measurements. To quantify existing ambient noise levels in the Project area, Kimley-Horn conducted three short-term noise measurements on June 23, 2021. The noise measurement sites were representative of typical existing noise exposure immediately adjacent to the Project site. The 10-minute measurements were taken between 2:00 p.m. and 4:00 p.m. near potential sensitive receptors. Short-term L_{eq} measurements are considered representative of the noise levels throughout the day. The noise levels and sources of noise measured at each location are listed in **Table 4.13-1: Existing Noise Measurements**.

Table 4.13-1: Existing Noise Measurements					
Site	Location	Leq (dBA)	Lmin (dBA)	Lmax (dBA)	Time
1	Northwest of the Project site at 1900 E. Camino Loma	61.1	44.6	82.0	2:56 p.m.
2	East of Euclid Street	56.9	45.7	75.7	3:30 p.m.
3	Southwest of the Project site at 1530 Camino Loma, south of Paseo Dorado.	50.8	43.8	71.1	3:56 p.m.

Source: Noise measurements taken by Kimley-Horn, June 23, 2021. See **Appendix H** for noise measurement results.

Regulatory Setting

California Code of Regulations, Title 24

The State’s noise insulation standards are codified in the California Code of Regulations, Title 24: Part 1, Building Standards Administrative Code, and Part 2, California Building Code. These noise standards are applied to new construction in California for the purpose of interior noise compatibility from exterior noise sources. The regulations specify that acoustical studies must be prepared when noise-sensitive structures, such as residential buildings, schools, or hospitals, are located near major transportation noise sources, and where such noise sources create an exterior noise level of 65 dBA CNEL or higher. Acoustical studies that accompany building plans must demonstrate that the structure has been designed to limit interior noise in habitable rooms to acceptable noise levels. The City of Fullerton requires compliance with Title 24 requirements under SC NOI-1. For new residential buildings, schools, and hospitals, the acceptable interior noise limit for new construction is 45 dBA CNEL.

The Fullerton Plan

The Fullerton Plan Chapter 7, addresses the policies that provide protection from the adverse effects of noise. The City of Fullerton also establishes its noise compatibility standards in Noise Element Table 8. Environments with ambient noise levels up to 65 A-weighted decibel (dBA) Community Noise Equivalent Level (CNEL) for new residential developments are considered “normally acceptable.” Environments with noise levels ranging from 60 dBA to 70 dBA CNEL are considered “conditionally acceptable” for residential land use developments.

City of Fullerton Noise Ordinance

The City’s noise regulations are included in FMC Chapter 15.90 (Noise Standards and Regulation), also known as the Noise Ordinance. Construction-related and operational noise restrictions are discussed below.

FMC §15.90.030 (A) defines the interior and exterior noise level limits for residential zones; **Table 4.13-2: City of Fullerton Sound Level Limits** shows the City’s sound level limits for residential zones. The City does not have noise level limits for commercial or industrial zones.

Table 4.13-2: City of Fullerton Sound Level Limits		
Residential Zones	Sound Level Limits dBA L_{eq} – 1-hour average	
	7:00 a.m. to 10:00 p.m. (day and evening)	10:00 p.m. to 7:00 a.m. (night)
Interior Noise Levels Limits	55	45
Exterior Noise Level Limits	55	50

Source: City of Fullerton, *The Fullerton Plan Final Program EIR*, Section 5.6, May 2012.

FMC §15.90.030 (C) states “It shall be unlawful for any person at any location within the incorporated area of the city to create any noise which can be classified as being continuous, reoccurring, predictable, or whose operation of noise-generating capability can be stopped or started at a specified time, or allow the creation of any noise on property owned, leased, occupied or otherwise controlled by such person, which causes the noise level, when measured on the property, either incorporated or unincorporated, to exceed:

1. The noise standard for a cumulative period of more than 30 minutes in any hour;
2. The noise standard plus 5 dBA for a cumulative period of more than 15 minutes but less than 30 minutes in any hour;
3. The noise standard plus 10 dBA for a cumulative period of more than 5 minutes but less than 15 minutes in any hour; or
4. The noise standard plus 15 dBA for a cumulative period of more than one minute but less than five minutes in any hour; and 5. The noise standard plus 20 dBA for a cumulative period of less than one minute in an hour.”

The City does not set specific noise level limits on construction-related activity. FMC §15.90.050, activities with special provisions, is the relevant ordinance controlling construction noise. Subsection A states, “the following activities shall be exempt from the noise level standards specified by this chapter provided they take place between the hours of 7:00 a.m. and 8:00 p.m. on any day except Sunday or a City-recognized holiday.

- Noise sources associated with construction, repair, remodeling, or grading of any real property;
- Mobile noise sources associated with agricultural operations; and
- Noise sources associated with the maintenance of real property, including normal maintenance and repair by city and utility crews.”

Although FMC §15.90.050 limits the hours of construction, it does not provide specific noise level performance standards for construction. However, the Federal Transit Administration’s (FTA) does establish an absolute daytime noise level limit of 80 dBA L_{eq} .

4.13.2 IMPACT ANALYSIS

4.13a Would the project result in the 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 ordinances, or applicable standards of other agencies?

Less Than Significant Impact.

Construction. Construction noise represents a potential short-term impact on ambient noise levels. Noise generated by equipment for demolition and construction equipment, including trucks, graders, bulldozers, concrete mixers and portable generators can reach high levels. Existing noise-sensitive uses would be exposed to increased noise levels from construction activities at the Project site. In typical construction projects, including the proposed Project, the loudest noise generally occurs during grading activity because it involves the largest equipment. Maximum noise levels generated by construction equipment are shown in **Table 4.13-3: Maximum Noise Levels Generated by Construction Equipment**. It should be noted that the noise levels identified in the table are maximum sound levels (L_{max}), which are the highest individual sound occurring at an individual time period. Operating cycles for these types of construction equipment may involve one or two minutes of full power operation followed by three to four minutes at lower power settings. Other primary sources of acoustical disturbance would be due to random incidents, which would last less than one minute (such as dropping large pieces of equipment or the hydraulic movement of machinery lifts).

Table 4.13-3: Maximum Noise Levels Generated by Construction Equipment			
Equipment	Typical Noise Level (dBA)		
	Acoustical Use Factor	L_{max} at 50 Feet (dBA)	L_{max} at 100 Feet (dBA)
Concrete Saw	20	90	84
Crane	16	81	75
Concrete Mixer Truck	40	79	73
Backhoe	40	78	72
Dozer	40	82	76
Excavator	40	81	75
Forklift	40	78	72
Paver	50	77	71
Roller	20	80	74
Tractor	40	84	78
Water Truck	40	80	74
Grader	40	85	79
General Industrial Equipment	50	85	79

dBA: A-weighted decibels; L_{max} : maximum noise level
 Note: Acoustical Use Factor (percent): Estimates the fraction of time each piece of construction equipment is operating at full power (i.e., its loudest condition) during a construction operation.
 Source: Federal Highway Administration, *Roadway Construction Noise Model User's Guide*, January 2006.

The noise levels identified in **Table 4.13-4: Project Construction Noise Levels**, show the exterior construction noise levels, which have been estimated by FHWA's Roadway Construction Noise Model (RCNM). The nearest sensitive receptors to the Project site are the multi-family residences and senior housing development located approximately 30 feet west of the Project site, and the daycare facility proposed at 1901 Euclid Street, approximately 30 feet east of the Project site boundary. All construction equipment was assumed to operate simultaneously at a construction area near to sensitive receptors. These assumptions represent a worst-case noise scenario as construction activities would routinely be spread throughout the construction site further away from noise sensitive receptors.

Table 4.13-4: Project Construction Noise Levels						
Construction Phase	Receptor Location			Worst Case Modeled Exterior Noise Level (dBA L_{eq})	Noise Threshold (dBA L_{eq}) ²	Exceeded?
	Land Use	Direction	Distance to Project Site Center (feet) ¹			
Demolition	Residential	Southwest	400	68.4	80	No
Site Preparation	Residential	Southwest	400	69.6	80	No
Grading	Residential	Southwest	400	70.2	80	No
Building Construction	Residential	Southwest	400	71.3	80	No
Paving	Residential	Southwest	400	68.5	80	No
Architectural Coating	Residential	Southwest	400	55.6	80	No

1. Per the methodology described in the FTA *Transit Noise and Vibration Impact Assessment Manual* (September 2018), distances are measured from the nearby buildings to the center of the Project construction site. Therefore, distance may not match those identified in **Table 4.13-4**, which are measured from the property line.

2. Threshold from Federal Transit Administration, *Transit Noise and Vibration Impact Assessment Manual*, Table 7-3, 2018.

Source: Federal Highway Administration, *Roadway Construction Noise Model*, 2006. See Appendix A for noise modeling results.

As shown in **Table 4.13-4**, exterior noise levels during different phases are between 55.6 dBA and 71.3 dBA and would not exceed the Federal Transit Administration’s (FTA) 80 dBA L_{eq} threshold. Therefore, sensitive receptors may be exposed to elevated noise levels during Project construction. However, construction equipment would operate throughout the Project site and the associated noise levels would not occur at a fixed location for extended periods of time. Additionally, SC N-1 enforces FMC Section 15.90, which regulates the City’s noise standards. Specifically, FMC Section 15.90 limits construction and general maintenance activities that are anticipated to exceed the noise standards to the hours of 7 a.m. to 8 p.m. Monday through Saturday, except in the case of an emergency. Noise associated with construction, repair, remodeling or grading of any real property must comply with the standards set forth in FMC Section 15.90 between 8 p.m. and 7 a.m. Monday through Saturday and at any time on Sunday or City-recognized holidays. All on-site construction equipment shall have properly operating mufflers and applicant should utilize the quietest equipment available. The construction contractor would be required to comply with noise regulations prescribing the hours allowed for construction activity identified in the FMC. construction noise would be acoustically dispersed throughout the Project site and not concentrated in one area near surrounding sensitive uses. Additionally, implementation of SC N-2 would further minimize impacts from construction noise as it requires construction equipment to be equipped with properly operating and maintained mufflers and other State required noise attenuation devices. Implementation of SC N-1 and SC N-2 would preclude construction-related noise impacts.

Operation. After Project completion, typical noise associated with residential land uses include children playing, pet noise, amplified music, pool and spa equipment, and delivery drop offs. Noise from residential stationary sources would be consistent with the surrounding uses and would primarily occur during the “daytime” activity hours of 7:00 a.m. to 10:00 p.m. The residences would be required to comply with the noise standards set forth in FMC §15.90.030 (A), Interior and Exterior Noise Limits. Both ground attached HVAC systems for the single-family residences on Lot 1 and roof-mounted HVAC systems for the attached multi-family townhomes on Lot 2 would comply with FMC Chapter 15.90. Noise generated from HVAC systems would be attenuated by building structure components (i.e., backyards, fencing, roof screening).

Further, the Project proposes on-site recreational outdoor amenities, such as courtyards and parks, however, these amenities are within the site's interior and noise would be attenuated by the residences. Therefore, nearby sensitive receptors would not experience significant noise levels from the on-site recreational activities. Existing mobile source noise along Rosecrans Avenue and Euclid Street would also mask operational noise levels at nearby sensitive receptors.

Project implementation would generate increased traffic volumes along nearby roadway segments. In general, a traffic noise increase of less than 3 dBA is barely perceptible to people, while a 5-dBA increase is readily noticeable.³³ Generally, traffic volumes on Project area roadways would have to approximately double for the resulting traffic noise levels to increase by 3 dBA.³⁴ Therefore, permanent increases in ambient noise levels of less than 3 dBA would be less than significant. According to Orange County Transportation Authority (OCTA) Annual Traffic Volume Maps³⁵, Euclid Street experiences 30,000 average daily vehicles while Rosecrans Avenue experiences 17,000 average daily vehicles. The proposed Project would generate approximately 1,340 daily vehicle trips (see Threshold 4.17a), which would not double the existing traffic volumes along Rosecrans Avenue or Euclid Street, thus, would not result in a perceivable noise increase.

Overall, Project operations would not generate a substantial temporary or permanent increase in ambient noise levels in the Project site vicinity in excess of City noise standards. The Project's operational noise impacts would be less than significant due to Project design features (placement of recreation area in center of Project site, landscaped slopes and intervening structures acting as noise attenuation throughout development), existing environmental factors, and following compliance with the FMC §15.90.030 (A).

4.13b *Would the project result in the generation of excessive groundborne vibration or groundborne noise levels?*

Less Than Significant Impact. Project construction can generate varying degrees of groundborne vibration, depending on the construction procedure and the construction equipment used. Construction equipment operations generate vibrations that spread through the ground and diminish in amplitude with distance from the source. The effect on buildings located near the construction site often varies depending on soil type, ground strata, and construction characteristics of the receiver building(s). 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 vibrations from construction activities rarely reach levels that damage structures.

The FTA has published standard vibration velocities for construction equipment operations. In general, the FTA architectural damage criterion for continuous vibrations (i.e., 0.20 inch/second) appears to be conservative. The types of construction vibration impact include human annoyance and building damage. Human annoyance occurs when construction vibration rises significantly above the threshold of human perception for extended periods of time. Building damage can be cosmetic or structural. Typical vibration levels produced by construction equipment is identified in **Table 4.13-5: Typical Vibration Levels for Construction Equipment**.

³³ Federal Highway Administration, *Highway Traffic Noise Analysis and Abatement Policy and Guidance, Noise Fundamentals*, https://www.fhwa.dot.gov/Environment/noise/regulations_and_guidance/polguide/polguide02.cfm, accessed May 28, 2021.

³⁴ California Department of Transportation, *Technical Noise Supplement to the Traffic Noise Analysis Protocol*, 2013.

³⁵ Orange County Transportation Authority, *Annual Traffic Volume Maps*, <https://www.octa.net/pdf/2019-ADT.pdf>, accessed May 25, 2021.

Table 4.13-5: Typical Vibration Levels for Construction Equipment		
Equipment	Approximate Peak Particle Velocity at 25 Feet (inches/second)	Approximate Peak Particle Velocity at 50 Feet (inches/second)
Large bulldozer	0.089	0.0315
Loaded trucks	0.076	0.0269
Small bulldozer	0.003	0.0011
Jackhammer	0.035	0.0124
Notes: 1. Federal Transit Administration, <i>Transit Noise and Vibration Impact Assessment Manual</i> , September 2018. Table 7-4. 2. Calculated using the following formula: $PPV_{equip} = PPV_{ref} \times (25/D)^{1.5}$ where: PPV (equip) = the peak particle velocity in in/sec of the equipment adjusted for the distance PPV (ref) = the reference vibration level in in/sec from Table 12-2 of the FTA <i>Transit Noise and Vibration Impact Assessment Guidelines</i> D = the distance from the equipment to the receiver		

Ground-borne vibration decreases rapidly with distance. The proposed Project would not require pile driving. As indicated in the **Table 4.13-5**, based on the FTA data, vibration velocities from typical heavy construction equipment operations that would be used during Project construction range from 0.003 to 0.089 inch-per-second peak particle velocity (PPV) (which is noticeably below the FTA’s 0.20 PPV threshold) at 25 feet from the source of activity. Since the vibration levels at 25 feet are far below the FTA’s 0.20 PPV threshold, it is assumed that the nearest sensitive receptors (i.e., multi-family residences, senior housing development, and proposed daycare facility) situated 30 feet west and east of the Project site would not experience significant vibration impacts. Construction activities would occur throughout the Project site and would not be concentrated at the point closest to the nearest structure. Therefore, the Project’s vibration impacts would be less than significant and no mitigation is required.

4.13c *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 two miles of a public airport or public use airport, would the Project expose people residing or working in the Project area to excessive noise levels?*

No Impact. The Project site is approximately 2.3 miles northeast of the Fullerton Municipal Airport, and not within the Fullerton Municipal Airport Influence Areas. Project implementation would not result in exposure of people residing or working in the Project area to excessive or high noise impact levels. Therefore, no impact would occur and no mitigation is required.

Mitigation Program

Standard Conditions and Requirements

SC N-1 All construction and general maintenance activities that are anticipated to exceed the noise standards set forth in FMC Section 15.90 shall be limited to the hours of 7 a.m. to 8 p.m. Monday through Saturday, except in the case of an emergency. Noise associated with construction, repair, remodeling or grading of any real property must comply with the standards set forth in FMC Section 15.90 between 8 p.m. and 7 a.m. Monday through Saturday and at any time on Sunday or City-recognized holidays. All on-site construction equipment shall have properly operating mufflers and applicant should utilize the quietest equipment available.

SC N-2 The applicant shall ensure through contract specifications that construction best management practices (BMPs) be implemented by contractors to reduce construction noise levels. Contract specifications shall be included in construction documents, which shall be reviewed by the City prior to issuance of a grading or building permit (whichever is issued first). The construction BMPs shall include the following:

- Ensure that construction equipment is properly muffled according to industry standards and be in good working condition.
- Place noise-generating construction equipment and locate construction staging areas away from sensitive uses, where feasible.
- Use electric air compressors and similar power tools rather than diesel equipment, where feasible.
- Construction-related equipment, including heavy-duty equipment, motor vehicles, and portable equipment, shall be turned off when not in use for more than 5 minutes.

Construction hours, allowable workdays, and the phone number of the job superintendent shall be clearly posted at all construction entrances to allow for surrounding owners and residents to contact the job superintendent. If the City or the job superintendent receives a complaint, the superintendent shall investigate, take appropriate corrective action, and report the action taken to the reporting party.

Mitigation Measures

No mitigation measures are required.

4.14 Population and Housing

Environmental Issue	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)?			X	
b) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?				X

4.14.1 IMPACT ANALYSIS

4.14a 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. According to the California Department of Finance, the City’s current population is approximately 139,431 persons as of January 1, 2021.³⁶ The City’s current housing stock totals approximately 49,784 DUs with approximately 2.89 persons per household. The Project proposes a residential community with 115 attached multi-family townhomes and 49 detached single-family residences. Based on 164 DUs and 2.89 persons per household, the Project could add approximately 474 new residents to the City, which would incrementally increase the City’s existing population by 0.34 percent, to a total of 139,905 persons. The Project’s forecast population growth accounts for less than one percent of the City’s overall population and is within The Fullerton Plan’s population forecast, and therefore not considered substantial population growth.

The Project would comply with The Fullerton Plan’s Policy H-3.1 Housing, which aims to provide adequate sites through land use, zoning, and specific plan designations to allow for housing for all income levels. As of this Initial Study’s release date, the City is preparing its 6th Cycle Housing Element Update. The draft Housing Element Update for 2021-2029 and associated programs and policies are not public at this time.

The City’s Regional Housing Needs Assessment (RHNA) for the 2021-2029 planning period identifies the City’s future housing need is 13,209 units. The Project would contribute toward the City’s future housing need for the 2021-2029 planning period. SCAG has developed growth forecasts for individual cities and counties, which is included in the 2020-2045 *Connect SoCal 2020-2045 Regional Transportation Plan/Sustainable Communities Strategy*. The City’s population is forecast to increase to 158,300 persons and 52,900 households by 2045.³⁷ The proposed Project could introduce 474 new residents to the City

³⁶ State of California, Department of Finance, E-5 Population and Housing Estimates for Cities, Counties and the State — January 1, 2011-2021. Sacramento, California, June 2021.

³⁷ SCAG, Demographics and Growth Forecast, 2020-2045 Regional Transportation Plan/Sustainable Communities Strategies. Los Angeles, California, June 2021.

and provide 164 DUs to the City's housing inventory. The proposed Project would be consistent with the SCAG growth projections for the City. The housing and population growth resulting from Project implementation would not conflict with projected growth in the City based on SCAG's growth forecasts. Additionally, the Project does not include the extension of roads or other infrastructure to unserved areas, which could induce indirect growth. Therefore, the Project would not induce substantial unplanned population growth in the City. Less than significant impacts would occur and no mitigation is required.

4.14b *Would the project displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?*

No Impact. There are no residential uses on the Project site; therefore, the Project would not displace existing housing or require construction of replacement housing elsewhere. No impact would occur and no mitigation is required.

Mitigation Program

Standard Conditions and Mitigation Measures

No standard conditions or mitigation measures are required.

4.15 Public Services

<i>Environmental Issue</i>	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physical 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:				
a) Fire protection?			X	
b) Police protection?			X	
c) Schools?			X	
d) Parks?			X	
e) Other public facilities?			X	

4.15.1 IMPACT ANALYSIS

4.15a *Fire Protection?*

Less Than Significant Impact. The Fullerton Fire Department provides fire protection and emergency medical services to the City, inclusive of the Project site. The City is part of a mutual aid agreement with all Orange County fire agencies. The City has a shared fire command program with the City of Brea and shares command staff with Brea. The nearest fire stations are Station No. 4 located at 3251 North Harbor Boulevard, 1.4 miles northeast of Project site, and Station No. 6 located at 2961 Rosecrans Avenue, 1.5 miles west of the Project site. Station No. 4 apparatus includes an Engine 4 while Station No. 6 apparatus includes a truck and Reserve Engine 3.³⁸

The proposed Project would redevelop portions of the existing Sunrise Village Shopping Center into residential uses. Project implementation could increase the number of residents in the Project area by 474 people. The incremental increase of residents associated with the 164-unit residential development would require fire protection services, including response to fire service calls upon project occupancy.

The proposed Project would adhere to SC PS-1, which requires compliance with the Fullerton Fire Prevention Ordinance as per FMC Chapter 13, as well as the Fullerton Building Code as per FMC Chapter 14, the California Fire Code, and the CBC. The Fire Department has reviewed and conditionally approved the proposed Project site plans to ensure fire prevention and suppression measures, fire hydrants and sprinkler systems, emergency access, and other similar requirements are met.

New developments would also be required to pay the standard taxes that would go toward the City's General Fund, which is the Fire Department's main source of funding. The proposed Project is an infill development within the Fullerton Fire Department service area and would not substantially increase the demand for new fire facilities, particularly because the site is already developed. The proposed Project's population growth accounts for less than one percent of the City's overall population and is within The

³⁸ City of Fullerton, *Fire Station Locations & Apparatus*, available at: <https://www.cityoffullerton.com/government/departments/fire/about-us/fire-station-locations-apparatus>, accessed June 26, 2021.

Fullerton Plan's population forecast, and therefore not considered substantial population growth. Compliance with building and fire codes prior to approval of development plan would reduce impacts to fire services and no expansion of fire facilities would be required.

Therefore, Project impacts concerning fire protection services would be less than significant and no mitigation is required. Additionally, the Project does not propose, and would not create a need for, new/physically altered fire protection facilities. Impacts would be less than significant and no mitigation is required.

4.15b Police Protection?

Less Than Significant Impact. Police protection services would be provided by the City of Fullerton Police Department. The Police Department has approximately 125 sworn police officers and 55 civilian employees, police volunteers, and reserve police officers.³⁹ The Fullerton Police Station is at 237 W. Commonwealth Avenue, approximately 1.73 miles southeast of the Project site. The proposed Project would redevelop the existing Sunrise Village Shopping Center with residential uses. The Police Department currently provides police services to the Project site and would continue to do so during Project operations.

The Fullerton Police Department has reviewed and conditionally approved the Project site plans to ensure that adequate emergency access is provided in addition to other security measures such as controlled access to the pool area and lighting.

The proposed Project is an infill development within the Fullerton Police Department service area and would not substantially increase the demand for new police facilities, particularly because the site is already developed. The Project's forecast population growth accounts for less than one percent of the City's overall population and is within The Fullerton Plan's population forecast, and therefore not considered substantial population growth.

The Project would not result in the need for new or physically altered police protection facilities in the City. Therefore, Project impacts concerning police protection would be less than significant and no mitigation is required. Additionally, the Project does not propose, and would not create a need for, new/physically altered police protection facilities. Impacts would be less than significant and no mitigation is required.

4.15c Schools?

Less Than Significant Impact. The Project site is within the boundaries of the Fullerton School District (FSD) and the Fullerton Joint Union High School District (FJUHSD). The FSD provides educational services for students in kindergarten through 8th grade, while FJUHSD provides educational services for students in 9th to 12th grade. Enrollment capacity at FSD was 12,141 students during the 2020-2021 school year.⁴⁰ Enrollment capacity at FJUHSD was 13,473 students during the 2020-2021 school year.⁴¹

³⁹ City of Fullerton, *Fullerton Police About Us*, Available at: <https://www.cityoffullerton.com/government/departments/police/about-fpd>, Accessed June 11, 2021.

⁴⁰ California Department of Education. Data Quest for Fullerton Elementary. Available at: <https://dq.cde.ca.gov/dataquest/dqcensus/EnrEthGrd.aspx?cds=3066506&aggllevel=district&year=2020-21>, Accessed June 11, 2021.

⁴¹ California Department of Education. Data Quest for Fullerton Joint Union High School District. Available at: <https://dq.cde.ca.gov/dataquest/dqcensus/EnrEthGrd.aspx?cds=3066514&aggllevel=district&year=2020-21>, Accessed June 11, 2021.

The public schools listed below would serve the proposed Project:

- Laguna Road Elementary⁴²
- Parks Junior High⁴³
- Sunny Hills High School⁴⁴

Student generation rates for new development are provided in The Fullerton Plan EIR at the following rates:

- Elementary/Middle Schools: 0.3-0.5 students per DU
- High School:
 - 0.182 students per dwelling unit for multi-family residential
 - 0.205 students per dwelling unit for single-family residential

Based on 164 DUs and The Fullerton Plan EIR’s student generation factors, the proposed Project is forecast to generate approximately 82 elementary and middle school students and 31 high school students as shown in **Table 4.15-1: Proposed Project Student Generation**.

Table 4.15-1: Proposed Project Student Generation			
Grade level	Student Generation Factor¹	Dwelling Units	Total Students Generated
Elementary/Middle	0.3-0.5	164	82 ²
High School - Multi Family	0.182	115	21
High School - Single-family	0.205	49	10
Total			114
1. Based on student generation factors in The Fullerton Plan EIR, 0.3 to 0.5 student per dwelling unit for elementary/middle school and 0.182 student per multi-family dwelling unit for high school. 2. Assumes 0.5 factor for more conservative approach			

The Fullerton Plan EIR forecasted an increase of 6,991 students at General Plan buildout period. The student population growth associated with the Project represents approximately 1.6 percent of the total forecasted student growth and would incrementally increase the demand for school facilities and services. The Project would be subject to payment of school impact fees in accordance with SB 50. Pursuant to Government Code §65995(3)(h), “payment of statutory fees is deemed to be full and complete mitigation of the impacts of any legislative or adjudicative act, or both, involving, but not limited to, the planning, use or development of real property...”. The developer fees for both school districts was \$4.08/sf for residential construction projects for fiscal year 2020-2021.⁴⁵ Payment of school fees are prescribed under SC PS-2. The fees are split between the districts: 66.6 percent for the FSD and 33.3 percent for the FJUHSD. Therefore, Project impacts to schools would be less than significant and no mitigation is required.

⁴² Fullerton School District. Find My School. Available at: <https://locator.decisioninsite.com/?studyId=235119#>, Accessed June 11, 2021.

⁴³ Ibid.

⁴⁴ Fullerton High School Union District. Find My School. Available at: <https://locator.decisioninsite.com/?StudyID=205959>, Accessed June 11, 2021.

⁴⁵ Fullerton School District, *Financial Analyst*, Available at: https://www.fullertonsd.org/apps/pages/index.jsp?uREC_ID=1147932&type=d&pREC_ID=1147626, Accessed June 11, 2021.

4.15d Parks?

Less Than Significant Impact. Please refer to Section 4.16, Recreation.

4.15e Other public facilities?

Less Than Significant Impact. The Fullerton Public Library is located at 353 W. Commonwealth Avenue, approximately 1.7 miles southeast of the Project site. The proposed Project is a residential redevelopment and would introduce approximately 474 new residents to the City. The Project's forecast population growth would incrementally increase the demand for library services. The Fullerton Public library operates an online catalog and digital library. Residents and visitors can access library resources and books from the catalog. Given the Project's nature and scope and libraries online resources, impacts to library facilities/services would be less than significant and no mitigation is required. Additionally, the Project does not propose, and would not create a need for, new or physically altered library protection facilities.

Mitigation Program

Standard Conditions

SC PS-1 The Applicant shall comply with the Fullerton Fire Prevention Ordinance as per FMC Chapter 13, Fullerton Building Code as per FMC Chapter 14, the California Fire Code, and the CBC in regards to design of fire facilities.

SC PS-2 Prior to the issuance of building permits, the Applicant shall submit evidence to the City of Fullerton that legally required school impact fees have been paid per the mitigation established by the applicable school district.

Mitigation Measures

No mitigation measures are required.

4.16 Recreation

Environmental Issue	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project:				
a) Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?			X	
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?			X	

4.16.1 IMPACT ANALYSIS

4.16a 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?

4.16b 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. According to The Fullerton Plan EIR, there are 640.41 acres of public parks as well as multiple recreational facilities in the City. The closest City park facilities are Roger B. Chaffee Park located at 1550 West Rosecrans Avenue and the Virgil “Gus” Grissom Park located at 1601 West Rosecrans Avenue, both of which are approximately 0.25 mile west of the Project site.

The Fullerton Plan includes goals and policies related to parks and recreation. Specifically, The Fullerton Plan establishes a long-term goal to provide 4 acres of useable park area per 1,000 residents. Based on the current population of 139,431 residents, the current parkland demand is 558 acres.⁴⁶ Assuming the Project’s 474 residents are new to the City, the Project would create a demand for approximately 1.89 acres of parkland. As specified in FMC Chapter 21.12 – Fee for Parks on Construction of Dwelling Units, the City collects development impact fees, specifically park fees, to implement the goals and policies of The Fullerton Plan Community Element. Park fees are imposed to all dwelling units and used for the acquisition, development, improvements, and maintenance of public parks and recreation facilities in the city as proposed by the City’s Five Year Capital Improvement Program. The Project would be subject to compliance with FMC Chapter 21.12, as prescribed under SC REC-1.

In addition to the payment of park fees, the proposed Project would include on-site parks and recreational facilities for residents. The recreation area on Lot 1 would include a swimming pool, pool deck with lounge chairs, and fire-pit seating. Two pocket parks on Lot 2 would provide outdoor dining table seating, outdoor BBQ counters, bench seating, and turf areas. Future residents would likely use on-site amenities to satisfy their recreational needs, which would not result in new construction of public recreational facilities. Compliance with FMC Chapter 21.12 would result in a less than significant impact to recreational facilities

⁴⁶ 139,431 residents x 0.004 acres = 557.7 acres

and no mitigation is required. Additionally, the Project does not propose, and would not create a need for, new or physically altered recreational facilities. Therefore, impacts would be less than significant and no mitigation is required.

Mitigation Program

Standard Conditions

SC REC-1 In accordance with FMC Chapter 21.12, prior to the issuance of each building permit, the Applicant shall pay the most current park dwelling fee and/or negotiated park fees to the City. All money collected as fees imposed by FMC Chapter 21.12 shall be deposited in the park dwelling fund and used for the acquisition, development, and improvement of public parks and recreational facilities in the City, as proposed by the City's Five-Year Capital Improvement Program. The Community Development Department shall confirm compliance with this requirement prior to issuance of a building permit.

Mitigation Measures

No mitigation measures are required.

4.17 Transportation

This section is based on the *Pines at Sunrise Village Traffic Impact Analysis* (EPD Solutions, 2021) and the City’s Transportation Assessment Policies and Procedures (TAPP) Worksheet which are included in **Appendix I: Traffic Impact Analysis** and **Appendix J: TAPP Worksheet**, respectively.

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

Site Access

Regional access to the site is provided via SR-91 to the north, SR-57 to the east, and SR-39 (Beach Boulevard) to the west.

Rosecrans Avenue is a four-lane undivided roadway to the north of the Project site. In the Project area, Rosecrans Avenue is signalized at its intersection with Euclid Street intersection to the east and Parks Road to the west. No street parking is permitted. The speed limit is 45 miles per hour (mph). Rosecrans Avenue is classified as a Primary Arterial Highway in The Fullerton Plan, Mobility Element.

Euclid Street is a four-lane undivided roadway to the east of the Project site. In the Project area, Euclid Street is signalized at its intersection with Rosecrans Avenue to the north and Bastanchury Road to the south. No street parking is permitted. The speed limit is 40 mph. Euclid Street is classified as a Major Arterial Highway in The Fullerton Plan, Mobility Element.

Paseo Dorado is a two-lane undivided roadway to the south of the Project site. Paseo Dorado is unsignalized at its intersection with Euclid Street to the east. On street parking is permitted. The speed limit is 25 mph. Paseo Dorado is classified as a Residential Street in The Fullerton Plan, Mobility Element.

Transit Service

Public transit service in the Project vicinity is provided by the Orange County Transportation Authority (OCTA). Specifically, OCTA Route 37 serves the Project site. South-bound bus stops are located along the west side of Euclid Street at the Rosecrans Avenue and Paseo Dorado intersections. North-bound bus stops are located along the east side of Euclid Street, south of Rosecrans Avenue. OCTA Route 37 runs seven days a week between the Cities of La Habra and Fountain Valley. Line 37 operates on weekdays

from approximately 5:20 a.m. to 9:30 PM, with 20-minute to 1-hour headways (the time between bus arrivals); on Saturdays from approximately 5:00 a.m. to 8:40 p.m. and on Sundays and holidays from approximately 7:00 a.m. to 11:00 p.m. with approximately 1-hour headways.

Pedestrian and Bicycle Facilities

Pedestrian access within the Project site would be provided by sidewalks and crosswalks. Existing pedestrian sidewalks along Rosecrans Avenue and Euclid Street would remain. According to The Fullerton Plan Appendix G (Bicycle Master Plan), there are no bicycle facilities on Euclid Street or Rosecrans Avenue within the Project vicinity. Additionally, no bicycle facilities are proposed in the Project vicinity. The nearest proposed bicycle facility is a Class 1 Bike Path is proposed near Bastanchury Road on the Union Pacific Right-of-Way, 0.3 mile south of the Project site.

4.17.1 IMPACT ANALYSIS

4.17a 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.

Project Construction Trip Generation

Automobile and truck traffic volumes associated with project-related construction activities would vary throughout the construction phases, as different activities occur. However, project-related construction traffic would be temporary and cease upon Project completion.

Project Operations Trip Generation

Daily and peak hour trips were estimated for the proposed Project and displaced land use (i.e., school) based on the Institute of Transportation Engineers (ITE) *Trip Generation Manual* (10th Edition) trip rates for the following uses:

- Shopping Center,
- Single-Family Detached Housing, and
- Multifamily Housing (Low-Rise).

The proposed Project would demolish 108,300 SF of existing commercial structures and redevelop the site as a residential community with 49 single-family units and 115 multi-family townhome units. Existing uses have a vacancy rate of 45 percent. Consistent with recent case law (*North County Advocates v. City of Carlsbad* (2015)—Cal.App.4th—Case No. D066488), this trip generation analysis is based on 100 percent occupancy and includes these vacant use's historical operational information in establishing the baseline for the Project's transportation impact analysis. **Table 4.17-1: Project Trip Generation** indicates the Project site's existing and proposed trip generation estimate based upon Institute of Transportation Engineers (ITE) *Trip Generation Manual* (10th Edition, 2017) trip generation rates.

Table 4.17-1: Project Trip Generation									
Land Use	ITE Code	Unit	Trip Generation Rates						
			Daily	AM Peak Hour			PM Peak Hour		
				In	Out	Total	In	Out	Total
Shopping Center ¹	820	TSF	37.75						
Single-Family Detached Housing ²	210	DU	9.440	0.185	0.555	0.740	0.624	0.366	0.990
Multi-family Housing (Low-Rise) ³	220	DU	7.320	0.106	0.354	0.460	0.353	0.207	0.560
Land Use	Quantity	Unit	Trip Generation Estimates						
			Daily	AM Peak Hour			PM Peak Hour		
				In	Out	Total	In	Out	Total
Existing Trip Generation									
Shopping Center ⁴	122.82	TSF	4,637	54	45	99	136	111	247
Project Trip Generation									
Single-family Homes	52	DU	491	10	29	38	32	19	51
Townhomes	116	DU	849	12	41	53	41	24	65
Project Trip Generation			1,340	22	70	92	73	43	116
Total Net Trip Generation			-3,297	-32	25	-7	-63	-68	-131
TSF = thousand square feet; DU = dwelling unit 1. Daily Trip rate from the Institute of Transportation Engineers, <i>Trip Generation, 10th Edition, 2017</i> . Land Use Code 820 - Shopping Center, Peak hour trips from traffic counts, adjusted with a 25 percent COVID factor. 2. Trip rates from the Institute of Transportation Engineers, <i>Trip Generation, 10th Edition, 2017</i> . Land Use Code 210 - Single-Family Detached Housing. 3. Trip rates from the Institute of Transportation Engineers, <i>Trip Generation, 10th Edition, 2017</i> . Land Use Code 220 - Multifamily Housing (Low-Rise). 4. Peak hour volumes were derived from counts taken at the Project driveways.									
Source: EPD Solutions, Inc. (2021)									

As seen in **Table 4.17-1**, the existing commercial uses generate approximately 4,637 average daily trips, including 99 AM peak hour trips and 247 PM. peak hour trips. The proposed Project would generate approximately 1,340 average daily trips on a typical weekday, including 92 AM peak hour trips and 116 PM peak hour trips. Project implementation would result in a reduction of 3,297 net average daily trips, including a reduction of 7 AM peak hour trips and 131 PM peak hour trips.⁴⁷ Project implementation would change the character of uses on site from commercial to residential, resulting in a decrease of traffic volumes along roadways in the Project vicinity. Accordingly, the Project would not increase average daily trips along surrounding roadways and would be accommodated by the existing roadway infrastructure.

The Fullerton Plan Consistency – Mobility and Bicycle Elements

As discussed above, the Project’s transportation network includes roadways, bicycle and pedestrian facilities, and bus transit systems. The Fullerton Plan –Mobility Element discusses the City’s goals to provide a balanced, multi-modal transportation network.

⁴⁷ Total Net Project trip generation is Project trip generation minus the trips generated by the existing land uses on site.

The proposed Project would provide additional housing opportunities closer to existing neighborhood-serving commercial areas and to existing OCTA bus transit routes. Landscaped pedestrian walkways throughout the site's interior would provide pedestrian access from residential units to the adjacent commercial businesses and connections to the public sidewalks on Rosecrans Avenue, Euclid Street, and Paseo Dorado. Public sidewalk improvements would include replaced landscaping and tree grates would be installed in street tree wells to increase shade and walkability. Although there are no current or future planned bikeways within the Project's immediate vicinity, the proposed Project would also not interfere with any future plans. . Therefore, the proposed Project would not conflict with the City's Mobility or Bicycle Elements.

Public Transit

Project construction would be temporary in nature and would not result in any road closures. Public transit service would continue to operate during Project construction. Upon Project implementation, public transit bus service would continue to be provided by the OCTA, with bus routes along Euclid Street. As noted above, the nearest transit stops (northbound and southbound) are located at the Euclid Street and Rosecrans Avenue intersection. A third bus stop is located at the Euclid Street and Paseo Dorado intersection, at the site's southeastern corner. The proposed Project would not interfere with public transit operations and would further place residents close to public transit opportunities.

4.17b Would the project conflict or be inconsistent with CEQA Guidelines §15064.3, subdivision(b)?

Less Than Significant Impact. State CEQA Guidelines §15064.3 codifies the change from Level of Service to VMT as a metric for transportation impact analysis. Pursuant to SB 743, VMT analysis is the primary method for determining CEQA impacts. Jurisdictions were not required to adopt VMT as a significant impact determination until July 1, 2020. The City adopted Resolution No. 2020-468 which adopted a VMT baseline and thresholds of significance for purposes of analyzing transportation impacts under CEQA.

A land use project would result in a potentially significant project-generated VMT impact if either of the following thresholds are satisfied:

1. The project-generated average total daily VMT per service population in the baseline year exceeds the City of Fullerton General Plan Buildout average total daily VMT per service population calculated with Origin/Destination VMT.
2. The project-generated average total daily VMT per service population in the horizon year exceeds the City of Fullerton General Plan Buildout average total daily VMT per service population calculated with Origin / Destination VMT.

In anticipation of the change to VMT, Fullerton and six other north Orange County cities (La Habra, Brea, Buena Park, Orange, Placentia, and Yorba Linda) formed a collaborative and completed the North Orange County Cities (NOCC) SB 743 Implementation Study to assist with implementation, methodology, thresholds, and mitigation approaches for VMT impact analysis. As part of this study, the collaborative developed NOCC+, a spreadsheet tool to help evaluate project-generated VMT impacts to determine which projects require further analysis and which are screened out because they can be presumed to have a less than significant impact absent substantial evidence to the contrary. Although the tool was developed collaboratively, each City had the opportunity to determine and adopt the appropriate local CEQA thresholds of significance.

The proposed Project was reviewed with Fullerton’s NOCC+. While the Project would not qualify for any VMT screening criteria, the analysis showed the projected trip generation would result in a lower General Plan buildout level of VMT per service population. The Project VMT is shown in **Table 4.17-2: Project VMT**.

Table 4.17-2: Project Trip Generation	
Estimated Daily Trips	1,498
Average Trip Length	8.6
Service Population	478
VMT/Service Population	27
Target VMT per Service Population Threshold	29.6
Percentage above/below VMT Target	-8.78
Source: EPD Solutions, Inc. (2021)	

As shown in **Table 4.17-2**, the proposed Project’s VMT per Service Population falls below the Target VMT per service population by 29.6 percent. Residential projects located within a low VMT area are presumed to have a less than significant impact absent substantial evidence. The proposed Project replaces an underutilized shopping center located in a predominantly residential area of the City. Future residents would likely exhibit similar travel behaviors as the existing surrounding residential neighborhoods, which currently exhibit a lower General Plan buildout level of VMT per service population. Despite not taking VMT credit from the existing shopping center, the proposed Project would likely not result in significant VMT. Therefore, the Project would not conflict with State CEQA Guidelines §15064.3(b). A less than significant impact would occur and no mitigation is required.

4.17c *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. Primary vehicular access to the Project site would be provided by three driveways: one on Camino Loma, one on Rosecrans Avenue, and one on Euclid Street. The 51-foot driveway access on Euclid Street would be two-way stop controlled and provide access to Lot 1. The 45-foot driveway on Rosecrans Avenue would be two-way stop controlled and provide access to Lot 2. The 45-foot driveway on Camino Loma would be stop controlled and similarly provide access to Lot 2. Internal drive aisles would accommodate standard fire lane turning radiuses and hammerhead turnaround maneuvers design for emergency vehicles and fire services; see **Exhibit 2-10: Fire Master Plan**. The proposed Project driveway and internal circulation improvements would be constructed pursuant to City of Fullerton Fire Department standards. The Project proposes a residential development within a portion of the City that is predominantly residential. The Project does not include the use of any incompatible vehicles or equipment on the site, such as farm equipment. Furthermore, off-site street improvements prescribed in the Development Agreement would be limited to grind and overlay and complete removal and replacement of pavement. No Project component would increase hazards to the public due to incompatible use, as the residential uses proposed by the Project would be fully compatible with surrounding land uses. Therefore, such impacts are considered less than significant and no mitigation is required.

4.17d *Would the project result in inadequate emergency access?*

Less Than Significant Impact. Emergency access is determined by the number of private and public access points, the width of the access point and internal roadways serving a project site. The proposed Project would provide access from Rosecrans Avenue and Euclid Street. The 2019 CBC Section 503 details requirements for Fire Apparatus Access Roads. As prescribed under Section 503.2.1, fire apparatus access roads shall have an unobstructed width of not less than 20 feet, exclusive of shoulders, except for approved security gates in accordance with Section 503.6, and an unobstructed vertical clearance of not less than 13.5 feet.

The proposed Project driveway entrances and interior drive aisles would accommodate standard fire lane turning radiuses and hammerhead turnaround maneuvers. As shown in **Exhibit 2-10**, the primary internal travel roadways would be 20 feet wide to accommodate fire apparatus requirements for fire truck access and turning radius. The 20-foot-wide alleys between townhome buildings would be within the 150-foot range of required for fire hose reach. The Fullerton Fire Department has reviewed the Project and specified access requirements concerning minimum roadway width, fire apparatus access roads, fire lanes, signage, access devices and gates, and access walkways, among other requirements, which would enhance emergency access to the Project site. Project plans would be reviewed by Fullerton Fire Department for final approval prior to issuance of a building permit. Compliance with the Fullerton Fire Department's requirements would ensure impacts to emergency access would be less than significant. Additionally, the Project off-site street improvements prescribed in the Development Agreement would not require the complete closure of any public or private streets or roadways during construction. The Project would be subject to SC TRANS-1, which requires that temporary construction activities not impede use of the surrounding roadways for emergencies or access for emergency response vehicles. Therefore, such impacts are considered less than significant, and no mitigation is required.

Mitigation Program

Standard Conditions

SC TRANS-1 Prior to construction, future developers shall prepare a Traffic Control Plan for implementation during the construction phase, as deemed necessary by the City Traffic Engineer. The Plan may include the following provisions, among others:

- At least one unobstructed lane shall be maintained in both directions on surrounding roadways.
- At any time only a single lane is available, the developer shall provide a temporary traffic signal, signal carriers (i.e., flag persons), or other appropriate traffic controls to allow travel in both directions.
- If construction activities require the complete closure of a roadway segment, the developer shall provide appropriate signage indicating detours/alternative routes.

Mitigation Measures

No mitigation measures are required.

4.18 Tribal Cultural Resources

This Section is based on the *Assembly Bill 52 and Senate Bill 18 Consultation initiated by the City of Fullerton*. The documents for the initiation process are included in **Appendix K: Assembly Bill 52 and Senate Bill 18 Communications**.

Environmental Issue	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 §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 §5020.1(k)?			X	
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 §5024.1. In applying the criteria set forth in subdivision (c) of Public Resource Code §5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.			X	

4.18.1 IMPACT ANALYSIS

4.18ai 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 §5020.1(k)?

4.18aai 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 §5024.1. In applying the criteria set forth in subdivision (c) of Public Resource Code §5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe?

Less Than Significant with Mitigation Incorporated. Chapter 532 Statutes of 2014 (i.e., AB 52) requires that lead agencies evaluate a project’s potential impact on “tribal cultural resources,” which include “sites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native

American tribe that are eligible for inclusion in the California Register of Historical Resources or included in a local register of historical resources.” To help determine whether a project may have such an effect, the Public Resources Code requires a lead agency to consult with any California Native American tribe that requests consultation and is traditionally and culturally affiliated with the geographic area of a proposed project. That consultation must take place prior to the release of a negative declaration, mitigated negative declaration, or environmental impact report for a project. (PRC §21080.3.1.). AB 52 also gives lead agencies the discretion to determine, based on substantial evidence, whether a resource qualifies as a “tribal cultural resource.”

Chapter 905 Statutes of 2004 (i.e., SB 18) requires local governments to consult with California Native American tribes prior to making certain planning decisions and to provide notice to tribes at certain key points in the planning process. These consultation and notice requirements apply to adoption and amendment of general plans and specific plans.

The City provided formal notification to California Native American tribal representatives identified by the California Native American Heritage Commission (NAHC). Native American groups may have knowledge about cultural resources in the area and may have concerns about adverse effects from development on tribal cultural resources as defined in PRC §21074. The City has contacted the tribal representatives of the tribes noted below. Correspondence to and from tribal representatives is included as **Appendix K**. SB 18 Native American Groups contacted are the same as the tribal contacts for AB 52, per the NAHC response letter. As of this Initial Study’s release date, the City has not received a request for consultation pursuant to AB 52 or SB 18.

- Campo Band of Diegueno Mission Indians
- Ewiiapaayp Band of Kumeyaay Indians
- Gabrieleno Band of Mission Indians - Kizh Nation
- Gabrieleno/Tongva San Gabriel Band of Mission Indians
- Gabrielino /Tongva Nation
- Gabrielino Tongva Indians of California Tribal Council
- Gabrielino-Tongva Tribe
- Juaneno Band of Mission Indians Acjachemen Nation – Belardes
- La Posta Band of Diegueno Mission Indians
- Manzanita Band of Kumeyaay Nation
- Mesa Grande Band of Diegueno Mission Indians
- Santa Rosa Band of Cahuilla Indians
- Soboba Band of Luiseno Indians

A Sacred Lands File request was submitted to the NAHC. The results were negative. It is unlikely that Native American tribal cultural resources are present on the Project site, given construction of the shopping center required site disturbance and excavation, and no archaeological resources have been recorded on the Project site. Notwithstanding, the potential exists for the discovery of archaeological or tribal cultural resources during ground disturbing activities. To address potential impacts during ground-disturbing activities, the proposed Project would be required to comply with SC CR-1 and CR-2 (see also

Section 4.5: Cultural Resources), which details the appropriate steps should archaeological/tribal cultural resources be encountered during ground-disturbing activities. Following compliance with SC CR-1 and CR-2, the Project's potential impacts concerning archaeological resources would be less than significant.

Construction activities would include excavation and grading. Compliance with SC CR-1 and CR-2 would address potential impacts to tribal cultural resources. With implementation of SC CR-1 and CR-2, potential impacts to tribal cultural resources would be less than significant.

Mitigation Program

Standard Conditions and Requirements

SC CR-1 and SC CR-2 are applicable to the proposed Project.

Mitigation Measures

No mitigation measures are applicable to the proposed Project.

4.19 Utilities and Service Systems

This Section is based on the *Water and Sewer Assessment* (Huitt-Zoliars, 2021) prepared for the proposed Project. The documents are included in **Appendix L: Water and Sewer Assessment**.

Environmental Issue	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project:				
a) Require or result in the relocation or construction of new or expanded water, wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?			X	
b) Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?			X	
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?			X	
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?			X	
e) Comply with federal, state, and local management and reduction statutes and regulations related to solid waste?			X	

4.19.1 IMPACT ANALYSIS

4.19a Require or result in the relocation or construction of new or expanded water, wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?

The following discusses the Project's potential impacts on water, wastewater (conveyance and treatment), storm water drainage, electric power infrastructure, natural gas facilities, and telecommunications facilities and infrastructure.

Water

Less Than Significant Impact. The City of Fullerton Public Works Department Water Division oversees the City’s water system, including upgrades and repair to infrastructure, water conservation, and water quality. The 2020 Urban Water Management Plan (UWMP) is a comprehensive document that evaluates a water supplier’s reliability over a long-term (20-25 year) horizon. UWMP water demand forecasts are based on adopted general plans. As discussed in **Section 4.15, Population and Housing**, the proposed Project would introduce 479 new residents to the area. The Project’s forecast population growth would incrementally increase the City’s existing population by 0.34 percent, to a total of 139,905 persons. The Project’s water demand is shown in **Table 4.19-1: Project Water Demand**.

Table 4.19-1: Project Water Demand			
Condition	Water Demand (gpd)	Maximum Daily Demand (gpd)	Peak Hour Demand (gpm)
Existing Conditions	50,080	100,160	139.11
Proposed Project	81,150	162,300	225.42
Net Change	+ 31,070	+62,140	+86.31
Source: Woodard & Curran, Inc. (May 2021). The Pines Sewer Capacity Assessment.			

Although the proposed Project would increase water demand over existing conditions, the proposed onsite water system and infrastructure would be designed to accommodate for the increased demand. The 2020 UWMP forecasted its total water demand to be 23,799 AF in 2020.⁴⁸ The proposed Project would demand up to 31,070 gallons per day over existing conditions, or 34.8 AF. Project implementation would account for less than one percent of current water demand of 23,799 AF in 2020.

Further, the Project’s forecast population growth of 474 persons would incrementally increase the City’s existing population by 0.34 percent but would not exceed the population increase projected by The Fullerton Plan or SCAG’s SCS/RTP. Although the proposed Project would require a General Plan Amendment, the forecasted population growth of 0.34 percent falls within the projections outlined in the SCAG RTP and The Fullerton Plan, and therefore would be consistent with the 2020 UWMP. The 2020 UWMP indicates that the City would meet the water demands through 2045. Therefore, the proposed Project would not require the construction of new or expanded water supply or treatment facilities. Impacts would be less than significant and no mitigation is required.

Wastewater

Less than Significant Impact. The Project site is within the City’s Sewer Maintenance District 2 and served by an existing 8-inch sewer line in Rosecrans Avenue with an 8-inch sewer lateral at the existing Rosecrans Avenue access driveway. The existing 8-inch sewer line in Rosecrans Avenue connects to a 10-inch line in Euclid Street. There are public sewer lines in Euclid Street and Paseo Dorado. The City of Fullerton 2009 Sewer Master Plan (Master Plan) identified system deficiencies concerning capacity and structural condition, and developed a 20-year Capital Improvement Program (CIP), which addresses these deficiencies. As part of the preparation and data modeling for the Master Plan, the City relied on previous modeling studies, rainfall and flow data from major wet weather events from 2005, and obtained data on

⁴⁸ Arcadis. June 2021. 2015 Urban Water Management Plan Table 6-8 Retail: Water Supplies — Actual, Available at: <https://www.cityoffullerton.com/home/showpublisheddocument/5052/637598829614070000>, Accessed July 24, 2021.

land use, population, and water consumption from various sources. The Master Plan identified capacity deficiencies in the sewer lines downstream of the Project site under existing and modeled wet weather flow conditions; see Master Plan Figure 5-1. Specifically, the Master Plan identified the following three capital improvement projects to address the current and projected sewer line capacities:

- “Project 1B” would upsize the sewer line between manholes 71-69 and 12-41 from 15-inch to 18-inch
- “Project 1C” would upsize the sewer line between manholes 10-42 and 28-42 from 15-inch to 18-inch
- “Project 2” would upsize the sewer line between manholes 28-69 and 71-69 from 8-inch to 10-inch.

A portion of the Project 2 improvements has been completed (from manhole 28-69 to manhole 56-69). However, Project 1B and Project 1C and the remaining section of Project 2 from manhole 56-69 to 71-69 have not been implemented.

Wastewater generation rates were based on an Average Dry Weather Flow (ADWF) unit flow factor of 75 gallons per capita per day, and an assumed average of 2.93 persons per dwelling unit based on the citywide average occupancy rate. Projected ADWF are provided in **Table 4.19-2: Modeled Sewer Loads**. The Project would result in a net total ADWF increase of 22,280 gpd over existing conditions.

Table 4.19-2: Modeled Sewer Loads			
Use	Units	Unit Flow Factor	Average Dry Weather Flow (gpd)
Project			
Single-Family Residential	49 DU	220 gpd/DU	10,780
Townhome	115 DU	220 gpd/DU	25,300
Project Total			36,080
Existing Development			13,800
Net Project Increase			22,280
Note: As part of the 2009 Master Plan, sewer loads for the existing development on the Project site were estimated to be 13,800 gpd based on 2007/2008 water consumption data.			
Source: Woodard & Curran, Inc. (May 2021). The Pines Sewer Capacity Assessment.			

The Project would discharge wastewater flows into sewer mains in Euclid Street and Rosecrans Avenue using a gravity sewer system. The single-family residential units would discharge into an existing 10-inch sewer main in Euclid Street via a new lateral connection and sewer flows from the townhome units would connect and discharge into the existing 10-inch sewer main in Rosecrans Avenue; see **Appendix L** Figure 1.

The Project’s Sewer Capacity Assessment modeled existing and future 2035 conditions with the proposed Project flows to determine whether the Project would cause new capacity deficiencies, and to confirm that the Master Plan identified capacity improvement projects would alleviate the deficiencies inclusive of the proposed Project. As indicated in **Table 4.19-2**, the Project would result in a net total ADWF increase of 22,280 gpd over existing conditions, thus, would contribute to existing sewer capacity deficiencies. Therefore, The Project applicant would be required to contribute a fair-share cost to the City for the Master Plan improvement projects for sewer capacity. As noted in Appendix L, fair-share costs are

calculated as a percentage of the cost of the total project and are based on the percent increase of flow under dry weather flow conditions that the development would add to the sewer system. Although the proposed Project would result in a net increase in wastewater generation, it would not require construction of sewer infrastructure beyond that previously identified in the Master Plan. As noted above, the Master Plan previously identified deficiencies under existing and future wet weather conditions.

However, the Master Plan was overly conservative since the modeled flows relied on data from an extremely wet 2005 winter storm event. Further, the Master Plan did not factor other City modifications and improvements to the system outflows including fixing cracked pipes and future system repairs. The City would impose as a condition of approval for the Applicant to pay the fair share contribution to the sewer improvements that would be eligible to go into a Community Facilities District for completion within three years of bond issuance. Therefore, Project impacts concerning wastewater would be considered less than significant, and no mitigation measure is required.

Storm Water Drainage Facilities

Less Than Significant Impact. See Threshold 4.10c concerning drainage patterns and stormwater drainage systems. As discussed in Threshold 4.10c, the Project proposes on-site drainage improvements. No off-site drainage improvements are proposed or required. The environmental impacts associated with the proposed drainage improvements are analyzed as a part of the overall Project analysis in this Initial Study. As concluded in this Initial Study, following compliance with the established regulatory framework, the proposed drainage improvements' environmental effects would be less than significant and no mitigation is required.

Electric Power, Natural Gas, and Telecommunications Facilities

Less Than Significant Impact. Electrical power is provided by SCE and natural gas is provided by SoCalGas. Telecommunications are provided by various companies. SCE, SoCalGas, and local telecommunications companies operate and maintain transmission and distribution infrastructure in the Project area, which currently serve the Project site. See Thresholds 4.6a and 4.6b in Section 4.6 Energy for further discussions concerning electricity and natural gas usage. The Project's anticipated electricity demand would be approximately 918,543 kilowatt-hours per year (kWh/year) and anticipated natural gas demand would be approximately 3,293,690 KBTU/year. Telecommunications services are provided by Spectrum, Frontier, and AT&T. The Project site is served by existing telecommunication infrastructure. The various telecommunication providers would continue to provide service coverage to the proposed Project. The Project proposes to connect to existing electrical, natural gas, and telecommunications infrastructure, and no off-site improvements are proposed or required. The environmental effects associated with the necessary on-site electrical, natural gas, and telecommunications improvements are analyzed as a part of the overall Project analysis in this Initial Study. As concluded in this Initial Study, following compliance with the established regulatory framework, the proposed utility improvements' environmental effects would be less than significant and no mitigation is required.

4.19b *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. The City of Fullerton is a retail water supplier and supplies water to the Project site. The 2020 UWMP indicates that water supplies would meet the water demands for normal, single-dry, and multiple dry-year conditions through 2045. Population growth forecasts within adopted General Plans are factored into UWMP water demand forecasts

The City meets all of its water demand through a combination of imported water and local groundwater. The City works together with two primary agencies, the Metropolitan Water District of Southern California (MWD) and the Orange County Water District (OCWD), to ensure water supply reliability. Groundwater from the Orange County Groundwater Basin (Basin) accounts for approximately 79 percent of the City's overall supply, followed by imported water at 21 percent. It is projected that by 2045, the water supply portfolio will change to approximately 85 percent groundwater and 15 percent imported water. If the City exceeds their groundwater allocation, a purchase agreement is in place with MET that allows purchase of supplemental imported water. The City maintains seven imported water connections to MET and six emergency interconnections with other utilities.

The OC Basin is not adjudicated and as such, pumping from the OC Basin is managed through a process that uses financial incentives to encourage groundwater producers to pump a sustainable amount of water. The framework for the financial incentives is based on establishing the Basin Production Percentage (BPP), the percentage of each Producer's total water supply that comes from groundwater pumped from the OC Basin. The BPP is set based on groundwater conditions, availability of imported water supplies, and OC Basin management objectives. OCWD has a policy to manage the groundwater basin within a sustainable range to avoid adverse impacts to the basin.

The 2020 UWMP forecasted its total water demand to be 27,850 AF by 2045. Additionally, the population is expected to increase from 141,648 persons in 2020 to 189,687 persons by 2045. In the case of a water supply shortage, the City has prepared a Water Shortage Contingency Plan to ensure adequate service.

The Project proposes a General Plan Revision to change the land use designation from Commercial to Low/Medium Density Residential. The Project's forecast population growth is approximately 474 persons; see Threshold 4.14a. The Project's proposed land uses would differ from the allowable land uses and associated water demands under the existing land use designations, which are the basis for the UWMP. Therefore, the Project site's forecast population growth would differ from the assumptions of the UWMP. However, the proposed Project would result in a nominal increase in water demand, as compared to the site's existing land uses/designations, which were assumed in the UWMP. Additionally, the Project's forecast population growth would nominally increase (approximately 0.34 percent) the City's existing population of approximately 139,431 persons.⁴⁹ The City's population with the proposed Project would be 139,905 persons, which would represent 2.5 percent of SCAG's 2045 population forecast for the City of 158,300 persons. As such, following the City's approval of the requested General Plan Revision, the Project would not conflict with or exceed SCAG's regional growth forecasts for the City or conflict with the UWMP. As such, Project impacts concerning water demand would be less than significant and no mitigation is required.

The proposed Project is located within the City of Fullerton Zone 2 water system. There is an existing 24-inch water line in Rosecrans Avenue, a 12-inch water line in Euclid Street, and an 8-inch water line in Paseo Dorado. The Project would connect to the existing 24-inch lines in Rosecrans Avenue and 8-inch line in Euclid Street and loop a new public domestic water line within the internal streets to bring water service to the site. Proposed private domestic water lines would then connect to each residential unit from the public water loop line to provide water service. Additionally, a separate private fire line for fire hydrants and building sprinkler systems would be constructed. The proposed Project would have

⁴⁹ Ibid.

sufficient water supplies available during normal, dry and multiple dry years. Impacts are less than significant and no mitigation is required.

4.19c *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. Wastewater collection facilities that serve the City are owned, operated, and maintained by the City of Fullerton Public Works Engineering Division. The City's current wastewater system includes 330 miles of pipeline and 6,850 manholes. The City's wastewater system discharges to several of the Orange County Sanitation District's (OCSD) trunk lines. OCSD collects, treats, and disposes of and/or reclaims wastewater generated by residents in northwestern and central Orange County. OCSD has two operating facilities, Reclamation Plant No. 1 and Treatment Plant No. 2, located in the cities of Fountain Valley and Huntington Beach, respectively. Through these facilities, OCSD collects, conveys, treats, and/or reclaims approximately 230 million gallons of wastewater generated daily in its service area including approximately 80 percent of the wastewater comes from residential uses and 20 percent comes from commercial and industrial uses. Wastewater from the City is collected and treated at Treatment Plant No. 2. The estimated average daily effluent received at Plant No. 2 is 127 million gallons (mgd). This facility currently has a total primary treatment capacity of 168 mgd, with an average daily treatment of approximately 127 mgd. Therefore, there is approximately 41 mgd of excess primary treatment capacity at OCSD Plant No. 2. As discussed above, the proposed Project would result in a total increase in ADWF of 22,280 gpd. This represents a nominal increase in wastewater treatment demand at Treatment Plant No. 2. Further, prior to issuance of a sewer connection permit, the applicant would pay any required sewer connection and/or service fees to OCSD. Existing wastewater treatment capacity is sufficient to meet Project demand and Project implementation would not require or result in the construction of new wastewater treatment facilities or expansion of existing facilities. A less than significant impact would occur and no mitigation is required.

4.19d *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?*

4.19e *Would the project comply with federal, state, and local management and reduction statutes and regulations related to solid waste?*

Less Than Significant Impact. The City contracts with Republic Services to provide solid waste and recycling services. Solid waste generated in the City is disposed of at the Olinda Alpha Landfill located at 1942 Valencia Avenue in the City of Brea. The maximum permitted throughput for the landfill is 8,000 tons/day and the maximum permitted capacity is 148,800,000 CY. The remaining capacity is approximately 34,200,000 CY.⁵⁰

The Fullerton Plan EIR identifies a solid waste generation rate of 12.23 pounds per dwelling unit per day. The proposed Project would generate approximately 2,005 pounds of solid waste per day. In 2010, the City disposed of approximately 283 tons of waste per day at the Olinda Alpha Landfill. Accordingly, the Project would represent a nominal increase of 0.03 percent in solid waste disposal.

⁵⁰ CalRecycle. (2021). *Solid Waste Information System (SWIS) Facility Details – Olinda Alpha Landfill (30-AB-0035)*. Retrieved from <https://www2.calrecycle.ca.gov/SolidWaste/SiteActivity/Details/2757?siteID=2093>. Accessed on June 28, 2021.

Regulations specifically applicable to the proposed Project include the California Integrated Waste Management Act of 1989 (AB 939), and CalGreen Code §4.408, and AB 341, which requires multiple-family residential development and commercial uses to implement recycling programs. The Integrated Waste Management Act, which requires every city and county in the State to prepare a Source Reduction and Recycling Element (SRRE) to its Solid Waste Management Plan, identifies how each jurisdiction will meet the State's mandatory waste diversion goal of 50 percent by and after the year 2000. AB 341 increased the diversion goal to 75 percent by 2020.

The 2019 CalGreen Code §4.408 requires preparation of a Construction Waste Management Plan that outlines ways in which the contractor would recycle and/or salvage for reuse a minimum of 65 percent of the nonhazardous construction and demolition debris. During the construction phase, the Project would be required to comply with the CalGreen Code through the recycling and reuse of at least 65 percent of the nonhazardous construction and demolition debris from the Project site.

The proposed Project includes areas for separate solid waste and recycling bins within the garages for all of the 164 dwellings. A third bin space for green waste is provided for the 49 detached single-family residences.

Construction and operational activities would be required to comply with all applicable federal, State, and local statutes and regulations for solid waste, including those identified under the most recent CALGreen Code. There is sufficient landfill capacity to serve the proposed Project, and the proposed Project would not conflict with solid waste reduction goals. The Project would result in a less than significant impact concerning solid waste and no mitigation is required.

Mitigation Program

Standard Conditions and Mitigation Measures

No standard conditions or mitigation measures are required.

4.20 Wildfire

Environmental Issue	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?				X
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?				X
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?				X
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?				X

4.20.1 IMPACT ANALYSIS

4.20a *Would the project substantially impair an adopted emergency response plan or emergency evacuation plan?*

No Impact. The CalFire Fire Hazard Severity Zone Map for the City of Fullerton does not depict the Project site in a State Responsibility Area. The Project site is in a Non-Very High Fire Hazard Severity Zone (VHFHSZ) zone within a local responsibility area.⁵¹ Project design and site access would adhere to the Fullerton Fire Department design and standards. Further, Project construction would not result in the complete closure of any public or private roadways during construction as noted in Threshold 4.17d. The use of nearby roadways for emergencies or access for emergency response vehicles would not be impeded by temporary construction activities. Therefore, the Project would not result in inadequate emergency access. No impact would occur and no mitigation is required.

⁵¹ CalFire. (June, 2019). *FHSZ Viewer*. Available at: <https://egis.fire.ca.gov/FHSZ/>. Accessed June 2, 2021.

4.20b *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?*

No Impact. The Project is not within an area classified as a VHFHSZ. The Project site and its surrounding areas are relatively flat, except for a slight slope that runs northwest to southeast across the site towards Euclid Street. The Project site is 1,000 feet south of the West Coyote Hills area, which is designated as a VHFHSZ.⁵² Project implementation would not involve off-site improvements or construction near the West Coyote Hills area. Project design would be subject to fire prevention measures and building standards outlined in FMC Chapter 13.20, which adopts the 2019 California Fire Code, thereby minimizing potential fire risks to people or structures associated with the Project.⁵³ Therefore, no impact would occur and no mitigation is required.

4.20c *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?*

No Impact. As discussed above, the Project site is not within an area classified as a VHFHSZ. The Project site and surrounding areas are developed and urbanized. The Project would connect to existing utility infrastructure on Rosecrans Avenue and Euclid Street. Project implementation would not result in the new construction, installation, or maintenance of new infrastructure. Therefore, no impact would occur and no mitigation is required.

4.20d *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?*

No Impact. The Project is not within an area classified as a VHFHSZ. The Project site and surrounding vicinity are relatively flat. There are no known landslides near the site and the site is not in the path of any known or potential landslides. Therefore, no impact would occur and no mitigation is required.

Mitigation Program

Standard Conditions and Mitigation Measures

No standard conditions or mitigation measures are required.

⁵² CalFire. (June, 2019). *FHSZ Viewer*. Retrieved from <https://egis.fire.ca.gov/FHSZ/>.

⁵³ FMC 13.20.10- The City of Fullerton does hereby adopt, by reference, the 2019 Edition of the California Fire Code, incorporating by reference the 2018 International Fire Code with California Amendments, as codified within Part 9, Title 24 of the California Code of Regulations, also known as the California Building Standards Code, as amended by this Chapter, including Appendix Chapter 4, and Appendices B, BB, C, CC, D, E, F, G, I, K, M, N and O, but specifically excluding Appendices A, H, J and L, as amended, and the whole thereof, save and except such portions as are hereinafter deleted or amended by this chapter.

4.22 Mandatory Findings of Significance

Environmental Issue	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Does the Project:				
a) 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?			X	
b) 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 the past projects, the effects of other current projects, and the effects of probable future projects.)			X	
c) Have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?			X	

4.22.1 IMPACT ANALYSIS

4.21a *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 Impact. As discussed throughout this Initial Study, the proposed Project does not have the potential to significantly degrade the quality of the environment or result in significant impacts to the environment that cannot be reduced to less than significant following compliance with the established regulatory framework (i.e., local, state, and federal regulations) and the recommended mitigation measures.

As concluded in **Section 4.4**, the Project would not substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten or eliminate a plant or animal community, or substantially reduce the number or restrict the range of a rare or endangered plant or animal.

As concluded in **Section 4.5**, the Project would not eliminate important examples of the major periods of California history or prehistory. CHRIS records search and historic aerial imagery review did not indicate any historical buildings or resources within the Project site. The Project site's existing commercial retail buildings and structures does not meet the criteria of "architecturally significant" or a "historic resource" under CEQA. Therefore, the proposed Project would not cause a change in the significance of a historical resource.

4.21b *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 the past projects, the effects of other current projects, and the effects of probable future projects.)*

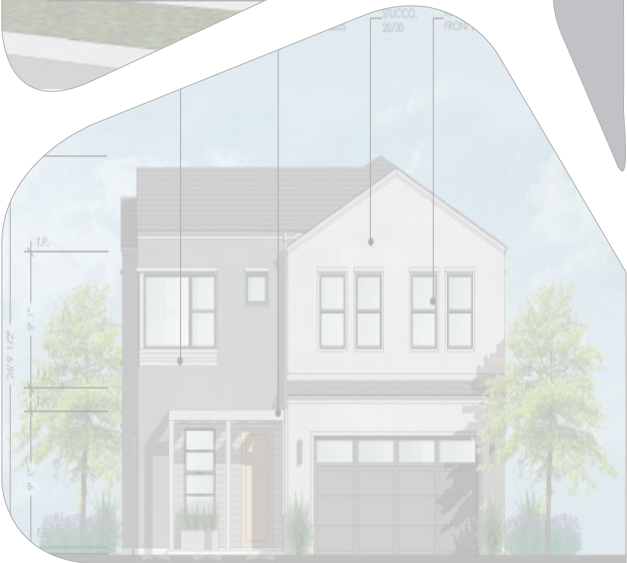
Less Than Significant Impact. The proposed Project would result in significant impacts unless mitigated for the following environmental issues: cultural resources, geology and soils, hazards and hazardous materials, and tribal cultural resources. Mitigation has been specified for each of these environmental issue areas to reduce impacts to less than significant. Other development projects within the City would be subject to compliance with the established regulatory framework, as applicable. All other Project impacts were determined either to have no impact or a less than significant impact following compliance with the established regulatory framework, without the need for mitigation. No cumulative impacts are anticipated in connection with this or other projects. Therefore, the proposed Project, in conjunction with other future projects, would not result in any cumulatively considerable impacts and no mitigation is required.

4.21c *Does the project have environmental effects which will cause substantial adverse effects on human beings, directly or indirectly?*

Less Than Significant Impact. As discussed in this Initial Study, there are no known substantial adverse effects on human beings that would be caused by the proposed Project. The environmental evaluation has concluded that no significant environmental impacts will result from the proposed Project. Therefore, impacts concerning adverse effects on human beings would be less than significant.

This page intentionally left blank.

References



5.0 REFERENCES

- Airport Land Use Commission for Orange County. (2019). AELUP *Notification Area for FMA*. Retrieved from https://files.ocair.com/media/2021-05/influence-area-fullerton_muni.pdf?VersionId=NXvJATIB6XT2qatYXABQ5oT4A4wuKthA.
- Arcadis. (June 2021). 2020 UWMP for City of Fullerton. Available at: <https://www.cityoffullerton.com/home/showpublisheddocument/5052/637598829614070000>, Accessed July 15, 2021
- CalFire. (June, 2019). *FHSZ Viewer*. Available at: <https://egis.fire.ca.gov/FHSZ/>. Accessed June 2, 2021.
- California Department of Transportation. (2018). *California Scenic Highway Mapping System*. Available at: <https://caltrans.maps.arcgis.com/apps/webappviewer/index.html?id=2e921695c43643b1aaf700dfcc19983>, Accessed June 1, 2021.
- California Department of Conservation. (2018). *California Statutes and Regulations for the California Geological Survey*. Sacramento, CA: California Geological Survey.
- California Department of Conservation. (2015). *CGS Information Warehouse: Regulatory Maps*. Retrieved from <http://maps.conservation.ca.gov/cgs/informationwarehouse/>.
- California Department of Conservation, California Important Farmland Finder, available at: <http://maps.conservation.ca.gov/ciff/ciff.html>, Accessed June 7, 2021.
- California Department of Conservation. (2016). *Williamson Act/Land Conservation Act*. <http://www.conservation.ca.gov/dlrp/lca>. Accessed June 7, 2021.
- California Department of Conservation. (2015). Earthquake Zones Required Investigation La Habra Quadrangle. Available at: <https://maps.conservation.ca.gov/cgs/informationwarehouse/regulatorymaps/>, Accessed June 15, 2021.
- California Department of Conservation. 2019. *Landslide Inventory Beta*. Available at: <https://maps.conservation.ca.gov/cgs/lis/app/>, Accessed June 16, 2021.
- California Department of Education. Data Quest for Fullerton Elementary. Available at: <https://dq.cde.ca.gov/dataquest/dqcensus/EnrEthGrd.aspx?cds=3066506&aggllevel=district&year=2020-21>, Accessed June 11, 2021.
- California Department of Education. Data Quest for Fullerton Joint Union High School District. Available at: <https://dq.cde.ca.gov/dataquest/dqcensus/EnrEthGrd.aspx?cds=3066514&aggllevel=district&year=2020-21>, Accessed June 11, 2021.
- California Department of Finance, E-5 Population and Housing Estimates for Cities, Counties and the State — January 1, 2011-2021. Sacramento, California, June 2021.
- California Energy Commission, 2022 Building Energy Efficiency Standards, Available at: <https://www.energy.ca.gov/programs-and-topics/programs/building-energy-efficiency-standards/2022-building-energy-efficiency>, Accessed May 28, 2021.
- California Energy Commission, California Energy Demand 2018-2030 Revised Forecast, Figure 49 Historical and Projected Baseline Consumption SCE Planning Area, January 2018.

- California Gas and Electric Utilities, 2020 California Gas Report, Southern California Gas Company Annual Gas Supply 2020-2035 Table 1-SCG, Available at:
https://www.socalgas.com/sites/default/files/2020-10/2020_California_Gas_Report_Joint_Utility_Biennial_Comprehensive_Filing.pdf, Accessed May 28, 2021.
- California Air Resources Board, Climate Change Scoping Plan, 2008.
- California Department of Transportation, Technical Noise Supplement to the Traffic Noise Analysis Protocol, 2013.
- Orange County Transportation Authority, Annual Traffic Volume Maps, <https://www.octa.net/pdf/2019-ADT.pdf>, accessed May 25, 2021.
- California Department of Toxic Substance Control. (2021). Envirostor Database. Retrieved from <https://www.envirostor.dtsc.ca.gov/public/>.
- CalRecycle. (2021). *Solid Waste Information System (SWIS) Facility Details – Olinda Alpha Landfill (30-AB-0035)*. Retrieved from <https://www2.calrecycle.ca.gov/SolidWaste/SiteActivity/Details/2757?siteID=2093>. Accessed on June 28, 2021.
- City of Fullerton General Plan Update, 2013-2021 Housing Element, Available at:
<https://www.cityoffullerton.com/civicax/filebank/blobdload.aspx?BlobID=8256>, Accessed May 28, 2021.
- City of Fullerton. (2021). *GoZone 2.1 GIS Webtool*. Available at: <https://gis.cityoffullerton.com/gozone/>
- City of Fullerton. (2012). *The Fullerton Plan, Page 124*
- City of Fullerton, *Fire Station Locations & Apparatus*, available at:
<https://www.cityoffullerton.com/government/departments/fire/about-us/fire-station-locations-apparatus>, accessed June 26, 2021.
- City of Fullerton, *Fullerton Police About Us*, Available at:
<https://www.cityoffullerton.com/government/departments/police/about-fpd>, Accessed June 11, 2021.
- City of Fullerton. (2012). *Bicycle Master Plan*. Available at:
<https://www.cityoffullerton.com/home/showpublisheddocument/1071/637436165499630000>. Accessed July 8, 2021.
- Federal Highway Administration, Highway Traffic Noise Analysis and Abatement Policy and Guidance, Noise Fundamentals,
https://www.fhwa.dot.gov/Environment/noise/regulations_and_guidance/polguide/polguide02.cfm, accessed May 28, 2021.
- Fullerton School District. Find My School. Available at:
<https://locator.decisioninsite.com/?studyId=235119#>, Accessed June 11, 2021.
- Fullerton High School Union District. Find My School. Available at:
<https://locator.decisioninsite.com/?StudyID=205959>, Accessed June 11, 2021.

Fullerton School District, *Financial Analyst*, Available at:

https://www.fullertonsd.org/apps/pages/index.jsp?uREC_ID=1147932&type=d&pREC_ID=1147626, Accessed June 11, 2021.

SCAG, Demographics and Growth Forecast, 2020-2045 Regional Transportation Plan/Sustainable Communities Strategies. Los Angeles, California, June 2021.

State Water Resources Control Board. (2021). GeoTracker. Retrieved from

<https://geotracker.waterboards.ca.gov/>

United States, Federal Emergency Management Agency. FEMA. Flood Insurance Rate Map 0659C0039J. Available at

<https://msc.fema.gov/portal/search?AddressQuery=euclid%20and%20rosecrans%2C%20fullerton#searchresultsanchor> . Accessed June 28, 2021.

United States, Fish and Wildlife Service, National Wetlands Inventory.

www.fws.gov/wetlands/Data/Mapper.html, accessed January 29, 2021.

This page intentionally left blank.