Melia 178th Street Townhomes Project

Public Review Draft Initial Study/Mitigated Negative Declaration

August 2019

Prepared by

Kimley»Horn

Expect More. Experience Better.

Melia 178th Street Townhomes Project

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August 2019

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1.0 INTRODUCTION

1.1 Statutory Authority and Requirements

This Initial Study has been conducted 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 conducted to determine if the proposed Melia 178th Street Townhomes Project ("Project") would have a significant effect on the environment. The approximately 5.63 gross-acre Project site is located at 1515 West 178th Street, Gardena, CA. The Project would remove all existing on-site structures and develop a residential community consisting of 114 three-story attached townhomes, at a density of 20.36 dwelling units per gross acre (DU/GAC). The requested entitlements also include a Tentative Tract Map, General Plan Amendment, Zone Change, and Site Plan Review.

State CEQA Guidelines §15063(b) states that if the Lead Agency determines that there is substantial evidence that any aspect of the 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:

1) Provide the Lead Agency with information to use as the basis for deciding whether to prepare an EIR or a ND;
2) 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;
3) Assist in the preparation of an EIR, if one is required;
4) Facilitate environmental assessment early in the design of a project;
5) Provide documentation of the factual basis for the finding in a ND that a project will not have a significant effect on the environment;
6) Eliminate unnecessary EIRs; and
7) 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 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 the recommendations of those agencies as to whether an EIR, Mitigated Negative Declaration (MND), or a ND should be prepared.

1.2 Summary of Findings

Pursuant to State CEQA Guidelines §15367, the City of Gardena ("City"), as the Lead Agency, 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.

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:

- Biological Resources,
- Hazards and Hazardous Materials,
- Cultural Resources, and
- 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 Mitigated Negative Declaration has been provided to the Clerk of the County of Los Angeles and mailed to responsible agencies and trustee agencies 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. During the public review period, the IS/MND, including the technical appendices, was made available for review at the following locations:

- City of Gardena Community Development Department, 1700 West 162nd Street, Gardena
- City of Gardena Website: http://www.cityofgardena.org/
- Gardena Mayme Dear Library, 1731 West Gardena Boulevard, Gardena

In reviewing the IS/MND, affected public agencies and interested members of the 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:

John Signo
Senior Planner
City of Gardena, Community Development Department
1700 West 162nd Street
Gardena, CA 90247-3732
Email: jsigno@cityofgardena.org

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.

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 ND's text.

The references outlined below were utilized during preparation of this Initial Study. Copies of these documents are available for review at the City of Gardena Community Development Department (1700 West 162nd Street, Gardena, CA) and on the City's website (http://www.cityofgardena.org/) unless otherwise noted.

Gardena General Plan 2006. The City adopted the comprehensive Gardena General Plan 2006 (GGP) in 2006 and the Community Development Element's Land Use Plan was updated in June 2012 and March 2013. Additionally, the City's 2014-2021 Housing Element was adopted in November 2013 and found to be in compliance by the Department of Housing and Community Development in December 2013. The GGP constitutes the City's overall plans, goals, and objectives for land use within the City's jurisdiction. The GGP is based upon the following core visions for the City: City of Opportunity; Safe and attractive place to live, work and play; Community that values ethnic and cultural diversity; Strong and diverse economic base. It evaluates the existing conditions and provides long-term goals and policies necessary to guide growth and development in the direction that the community desires. Through its Goals, Objectives, Policies, and Programs, the GGP serves as a decision-making tool to guide future growth and development decisions.

The GGP consists of the following elements and the issues interrelated in each other and are summarized below:

- Community Development Element
    - Land Use Plan
    - Economic Development Plan
    - Community Design Plan
    - Circulation Plan
- Community Resources Element
    - Open Space Plan
    - Conservation Plan
- Community Safety Element
    - Public Safety Plan
    - Noise Plan
- Implementation
    - Implementation Program
- Housing Element

The GGP was used throughout this IS/MND as a source of baseline data.

City of Gardena General Plan 2006 Final Environmental Impact Report (GRC Associates, Inc., April 2006) (SCH #2005021125). The GGP Final Environmental Impact Report (GGP FEIR) analyzed the potential environmental impacts that would result from GGP implementation. At the time of the GGP FEIR's writing, the City was 98.5 percent developed. Approximately 45 acres of vacant land existed at the GGP FEIR's writing. GGP FEIR Tables 2 and 3 present the forecast capacity at the City's buildout as 22,329 DU, a population of 63,799 persons, and approximately 18.9 million square feet (SF) of nonresidential land uses. Buildout was estimated to occur over 20 years. The GGP FEIR concluded significant and unavoidable impacts concerning Transportation and Traffic (GGP FEIR page 138). This document is available for review only at City Hall.

Since GGP FEIR preparation, the SCAG RHNA Allocation Plan fifth cycle, which was adopted in 2012, indicates that between 2014 and 2021, the City will need to accommodate development of 397 DU. The 2014-2021 Housing Element concluded adequate development capacity remained for the City to meet the RHNA allocation for the 2014-2021 planning period. On November 12, 2013, the City Council adopted Resolution No. 6106 approving the 2014-2021 Housing Element and the supporting IS/ND.

Gardena Municipal Code. The Gardena Municipal Code (GMC) regulates municipal affairs within the City's jurisdiction including, without limitation, zoning regulations (codified in GMC Title 18). GMC Title 18 is the primary tool for implementing the GGP's Goals, Objectives, and Policies.

The GMC is referenced throughout this IS/MND 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 provides a Project introduction and overview, cites the CEQA Statute and Guidelines provisions to which the proposed Project is subject, and summarizes the IS' conclusions.

Section 2.0: Project Description details the Project's location, environmental setting, background and history, characteristics, discretionary actions, construction program, phasing, agreements, and required permits and approvals. This Section also identifies the IS' 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 potential impacts that may or may not result from Project implementation.

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

Section 5.0: References identifies resources used to prepare the IS.

2.0 PROJECT DESCRIPTION

2.1 Location

The Melia 178th Street Townhomes (Project) site is in the County of Los Angeles (County), in the City of Gardena (City), approximately 12.5 miles south of downtown Los Angeles; see **Exhibit 2-1: Regional Vicinity Map**. The Project site is at the City's southern extent, near the City's jurisdictional limits with the City of Los Angeles to the east and the City of Torrance to the west. The Project site involves approximately 5.63 gross acres comprised of two parcels (APN 6106-013-040 and 6106-013-041) located at 1515 West 178th Street; see **Exhibit 2-2: Site Vicinity Map**.

Regional access to the Project site is provided via the Artesia Freeway (State Route 91 [SR-91]), the San Diego Freeway (Interstate 405 (I-405)) and the Harbor Freeway (State Route 110 [SR-110]) located to the northeast, south, and east, respectively. Local access to the Project site is provided via West 178th Street to the south, which is accessed from Normandie Avenue to the east, and South Western Avenue to the west. Two access driveways are located at 178th Street, at the site's eastern and western portions.

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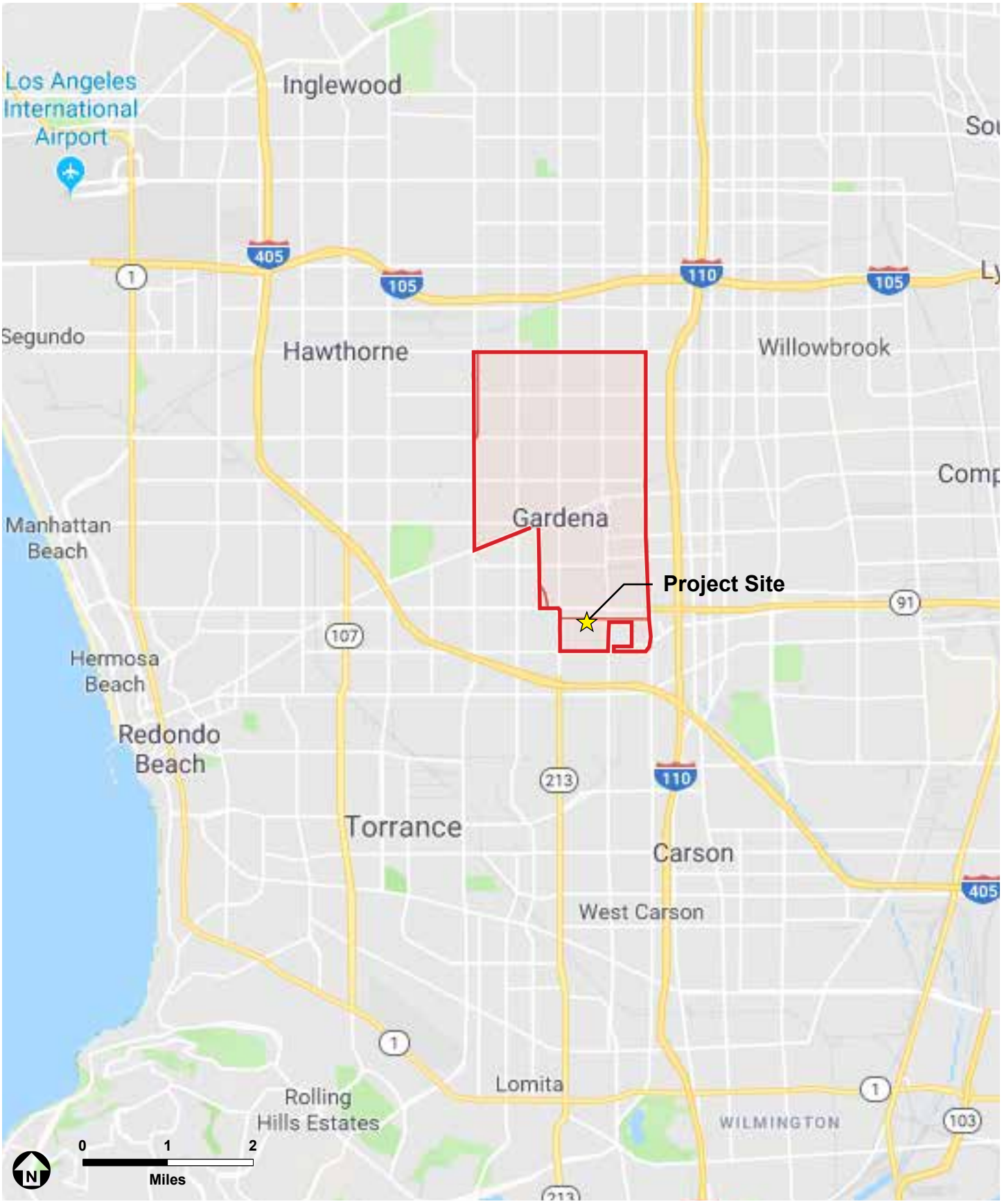

Source: Google Maps

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Source: Near Maps

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Welcome To GARDENA

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Exhibit 2-2
Site Vicinity Map

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2.2 Environmental Setting

The City of Gardena encompasses approximately 6.0 square miles in Los Angeles County's South Bay region. Gardena is a fully urbanized city with of a mix of residential densities, although low-density residential uses predominate. The City also contains a mix of retail commercial, office, and industrial uses.

The Project site is at the City's southern extent, in a predominantly industrial area, although residential uses exist to the west and southwest. The site is bounded by a vacant lot and an equestrian use (i.e., horse stables) to the north, West 178th Street to the south, office commercial and industrial uses to the east, and a mobile home park to the west. Normandie Avenue forms an eastern City boundary with the City of Los Angeles approximately 0.24 mile to the east of the site, and South Western Avenue forms a western City boundary with the City of Torrance approximately 0.28 mile to the west.

2.2.1 ON-SITE LAND USES

The generally rectangular-shaped property is relatively flat and at an elevation of approximately 35 feet above mean sea level (amsl).[1] As depicted on **Exhibit 2-2**, the site is fully developed with an industrial building totaling approximately 105,036 SF[2] used as a trucking warehouse with associated surface parking lot and outdoor trailer storage. The warehouse, drive aisle, and parking lot are located on the site's eastern portion and an outdoor trailer storage area is located on the western portion. The warehouse is used for maintenance and storage of trucks and trailers.

2.2.2 GENERAL PLAN AND ZONING

GGP Figure LU-2, *Land Use Policy Map*, depicts the City's land use designations and indicates the Project site is designated Industrial with a Mixed-Use Overlay.[3] The Industrial designation provides for a wide variety of clean and environmentally friendly industries, technology-related uses and supporting facilities, and business parks.[4] The Mixed-Use Overlay permits residential development on selected areas designated for commercial and industrial land uses.[5] The Mixed-Use Overlay (MUO) designation's purpose is to allow greater flexibility of development alternatives, especially attractive higher density residential development in appropriate areas that are experiencing both physical and economic blight. The maximum allowed intensity and density (stepped density) within the MUO designation are a floor-area ratio (FAR) of 0.5 and 30 DU/AC for lots greater than 1.0 AC.

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1 Melia Homes. (2018). Preliminary Grading Plan, 1515 West 178th Street, Gardena, California. Lake Forest, CA: C&V Consulting, Inc.

2 Melia Homes. (2019). AQ/GHG Project Data Needs Construction Information Request Form, February 4, 2019.

3 City of Gardena. (2006, Updated February 2013). *Gardena General Plan 2006*. Figure LU-2: 2013 General Plan Land Use Policy Map. Gardena, CA: City of Gardena.

4 City of Gardena. (2006, Updated February 2013). Gardena General Plan 2006. Page LU-12. Gardena, CA: City of Gardena.

5 Ibid., page 13.

The City of Gardena Zoning Map depicts the City's zones and indicates the Project site is zoned General Industrial (M-2) Zone with a Mixed-Use Overlay (MU) Zone.[6] Regulations governing the M-2 Zone are identical to those governing the Industrial (M-1) Zone; see GMC Chapters 18.36 and 18.38. Commercial, manufacturing, and industrial uses are permitted in the M-1/M-2 Zones, provided all activities are conducted within an enclosed building. The MU Zone is intended to allow greater flexibility of development alternatives, especially attractive higher density residential development and live-work buildings, in appropriate areas of the city; see GMC Chapter 18.19.

2.2.3 SURROUNDING LAND USES

Land uses surrounding the Project site are as follows (see **Exhibit 2-2**):

- *North:* Land uses north of the Project site include an equestrian use (i.e., horse stables) and a vacant lot within a power line easement. The Los Angeles County Flood Control District's (LACFCD) Dominguez Channel is further north, beyond the stables. Areas to the north are zoned General Commercial (C-3) Zone and Artesia Corridor Specific Plan (ACSP).
- *South:* Land uses immediately south of the Project site beyond West 178th Street between Denker Avenue and Evelyn Avenue include industrial uses. Directly south of those uses are primarily single-family homes with some low-density multiple-family homes. South of 178th Street to the east of the Project site, generally between Normandie Avenue and Evelyn Avenue, are industrial uses and south of those, multiple-family housing. South of 178th Street to the west of the Project site between Denker Avenue and Western Avenue is more industrial and single-family residential. Areas to the south are zoned M-1 Zone, Home Business (H-B) Zone, Low-Density Multiple Family Residential (R-2), and Medium Density Multiple-Family Residential (R-3) Zone.
- *East:* Land uses east of the Project site are predominantly industrial. Areas to the east are zoned M-2 Zone.
- *West:* Garden West Estates, a mobile home park, is located immediately west of the Project site. Areas to the west are zoned R-3 Zone and MU Zone.

2.3 Background and History

As previously noted, the site is occupied by a trucking warehouse.

On December 5, 2018, the Project Applicant (Melia Homes) submitted their development applications to the City for the proposed Project.

[6] City of Gardena. (January 2018). *Zoning Map*. Gardena, CA: City of Gardena Planning Division.

2.4 Project Characteristics

2.4.1 Project Overview

The Project Applicant seeks approval of the proposed Melia 178th Street Townhomes Project. The Project proposes a residential community consisting of 114 three-story attached townhomes, at a density of 20.36 DU/GAC; see **Exhibit 2-3: Conceptual Site Plan**. The Project proposes to remove all existing on-site improvements, including the warehouse, associated surface parking lot, and storage (approximately 105,036 SF) and construct 114 attached townhomes in 22 buildings (approximately 191,348 SF), with between four and six DU per building. The proposed buildings would be wood-frame construction, with all major building elements providing at least a 1-hour fire-resistance rating. The maximum proposed building height would be 40 feet (to roof ridge).

As depicted in **Exhibit 2-3**, the proposed site plan involves five building clusters, including three in the central portion and one each along the eastern and western site boundaries. Eight private streets are proposed throughout to provide access to each of the buildings. Additionally, the Project proposes both private and common open space areas. Approximately 48,727 SF of common open space is proposed, including a central recreational area with a swimming pool, paseos, a pocket park, and trail). Approximately 21,279 SF of private open space is proposed, including approximately 14,059 SF within private patios and approximately 7,220 SF within private balconies. A total of 287 parking spaces are proposed, including 228 within two-car garages with direct access to each DU, and 59 guest parking spaces throughout.

2.4.2 Recreational/Other Amenities

The Project proposes a central community recreation club with swimming pool, shade structure, built-in BBQ entertainment counter, and various site furnishings, and the following additional recreational/other amenities:

- A community pocket park with benches and lawn area for smaller group gatherings, passive play, etc.
- A natural area with decomposed granite (DG) trail along the northern property boundary for pedestrian use.
- Visitor bicycle rack (for two bicycle parking stalls).
- Bench seating, style to complement architecture.
- Dog-bag station (black color).
- 3.0-, 4.0-, and 6.0-foot wide walkways throughout.

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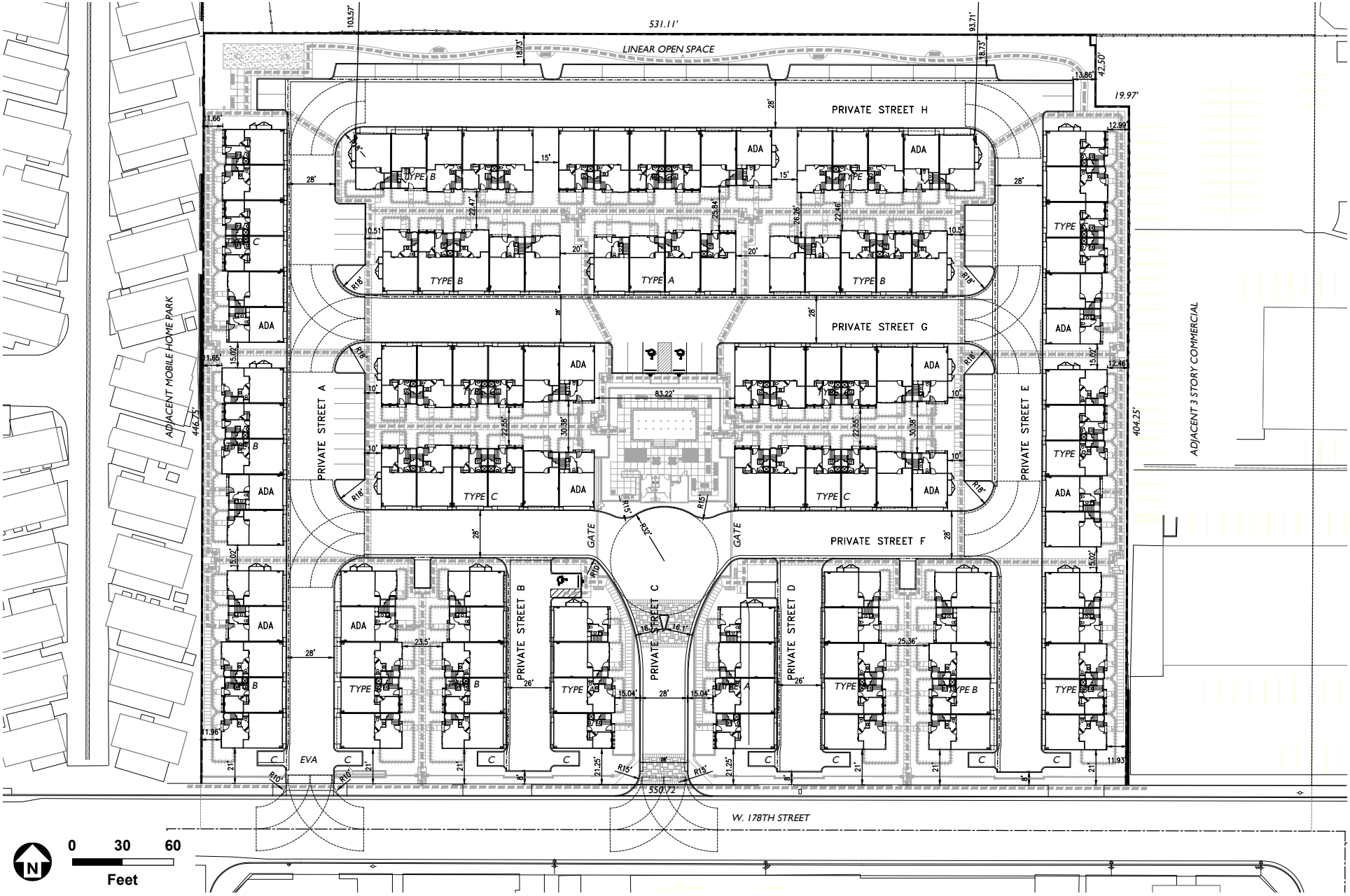

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Exhibit 2-3
Conceptual Site Plan

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2.4.3 Landscaping

The proposed Conceptual Landscape Plan[7] would provide a total approximately 48,727 SF of landscaping along the site perimeters and dispersed throughout. The proposed plantings would include various types trees of including Date/Queen Palm trees, Field Grove Olive trees, Gem Magnolia trees, and California Sycamores, among others.

2.4.4 Parking and Access

GMC §18.40.040: *Number of Parking Spaces Required*, specifies multiple-family DU require two spaces in a garage or enclosed parking facility per DU, resulting in a total resident parking demand of 228 spaces. The Project proposes two garage spaces per DU, or a total of 228 resident parking spaces, thus, meeting the City's resident parking standard. GMC §18.40.070: *Additional Standards for Residential Parking Areas*, requires that guest parking be provided for residential developments of more than one unit at 0.5 spaces per DU, resulting in a total guest parking demand of 57 spaces. The Project proposes a total of 59 guest parking spaces, thus, exceeding the City's guest parking standard.

Primary vehicular access to the Project site is proposed via a two-way driveway at the southern boundary at West 178th Street. Vehicular metal sliding gates designed to meet Fire Department standards and a visitor kiosk/pilaster (with telephone keypad) are proposed at the main entry. A secondary/emergency vehicle access equipped with a Fire Department Knox Box is proposed at the Project site's southwestern corner at 178th Street. Pedestrian access is proposed via the primary entrance on West 178th Street.

2.4.5 Utilities and Infrastructure

Golden State Water Company (GSWC) would purvey water to the proposed Project, with one connection proposed (at the site's primary entrance) to an existing 12-inch water main within West 178th Street.

The Project site is within the jurisdictional boundaries of Sanitation Districts of Los Angeles County Sanitation District No. 5 (LACSD). The Project's wastewater would discharge to the local sewer line for conveyance to a LACSD's trunk sewer. Access to the City's sanitary sewer system would be provided with connection to an existing 8-inch line within West 178th Street, at the site's southwest corner.

Proposed drainage improvements include five stormwater catch basins and five biofiltration vaults located throughout the site. In the proposed condition, the site's stormwater would be conveyed from the five catch basins through a storm drain to a proposed 24-inch storm drain located in West 178th Street.[8] The Project's proposed hydrology and drainage is further discussed in Response 4.10 below.

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[7] Available for review at the City of Gardena Community Development Department, 1700 West 162nd Street, Gardena.

[8] C&V Consulting, Inc. (December 2018). Preliminary Utility Plan. Lake Forest, CA: C&V Consulting, Inc.

2.4.6 Requested Entitlements

The Project requests approval of the following entitlements:

- General Plan Amendment (GPA) #2-18 to change the site's GGP land use designation from Industrial with a Mixed-Use Overlay to High-Density Residential;
- Zone Change (ZC) #3-18 to change the site's zoning from General Industrial (M-2) with a Mixed-Use Overlay Zone (MU) to High-Density Multiple-Family Residential Zone (R-4);
- Tentative Tract Map (TTM) #82390[9] to create a single-lot subdivision for Condominium Purposes; and
- Site Plan Review (SPR) #11-18 to approve the proposed Site Plan.

2.5 Project Construction Activities and Phasing

Project construction would occur beginning Spring 2020 and ending Fall 2022, in the following sequence:

- Demolition,
- Site preparation,
- Grading,
- Building construction, and
- Paving, architectural coating, and landscaping.

[9] Available for review at the City's Community Development Department, at 1700 West 162nd Street, Gardena.

Grading for the proposed improvements would require cut and fill to create building pads. Grading is estimated to require approximately 7,600 cubic yards (CY) of soil import. The City would review and approve the final grading plans prior to Grading Permit issuance. All infrastructure (i.e., storm drain, water, wastewater, dry utilities, and street improvements) would be installed during grading.

Home construction would occur over approximately five to seven phases, the timing of which would be dependent upon market conditions. For purposes of this environmental analysis, opening year is assumed to be 2021.[10]

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 Gardena are expected to use this IS/MND in their decision-making process.

To implement this Project, at a minimum, the following discretionary permits/approvals must be granted by the City and others:

- Environmental Assessment EA #20-18,
- General Plan Amendment GPA #2-18,
- Zone Change ZC #3-18,
- Tentative Tract Map #82390,
- Site Plan Review SPR #11-18, and
- Los Angeles Regional Water Quality Control Board (National Pollutant Discharge Elimination System (NPDES) Compliance/Low Impact Development (LID)) approvals.

[10] Studies and modeling were based on dates initially provided, which were beginning Fall 2019 and ending January 2021. The change in dates does not impact the analyses because modeling based on earlier construction dates is more conservative.

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3.0 ENVIRONMENTAL CHECKLIST FORM

3.1 Background

1.	**Project Title:** Melia 178th Street Townhomes Project
2.	**Lead Agency Name and Address:** City of Gardena Community Development Department 1700 West 162nd Street Gardena, California 90247
3.	**Contact Person and Phone Number:** John Signo Senior Planner City of Gardena, Community Development Department 1700 West 162nd Street Gardena, CA 90247-3732 Email: jsigno@cityofgardena.org
4.	**Project Location:** County of Los Angeles, City of Gardena, 1515 West 178th Street
5.	**Project Sponsor's Name and Address:** Mr. Chad Brown, Vice President of Planning and Development Melia Homes 8951 Research Drive Irvine, California 92618
6.	**General Plan Designation:** Industrial & Mixed-Use Overlay
7.	**Zoning:** General Industrial (M-2) Zone & Mixed-Use (MU) Overlay Zone
8.	**Description of Project:** See Section 2.4: Project Characteristics.
9.	**Surrounding Land Uses and Setting:** See **Section 2.2: Environmental Setting** and **Section 2.2.3: Surrounding Land Uses**
10.	**Other public agencies whose approval is required (e.g., permits).** Los Angeles County Sanitation Department Los Angeles Regional Water Quality Control Board Los Angeles County Fire Department
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, has consultation begun?** One California Native American tribe (i.e., Gabrieleno Band of Mission Indians-Kizh Nation) has requested consultation, which began on May 22, 2019; see Response 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" or "Less Than Significant With Mitigation Incorporated," as indicated by the checklist on the following pages.

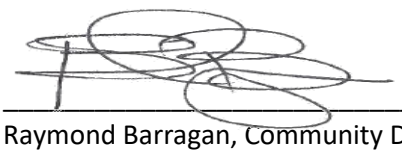
	Aesthetics		Agriculture & Forestry		Air Quality
X	Biological Resources	**X**	Cultural Resources		Energy
	Geology & Soils		Greenhouse Gas Emissions	**X**	Hazards & Hazardous Materials
	Hydrology & Water Quality		Land Use & Planning		Mineral Resources
	Noise		Population & Housing		Public Services
	Recreation		Transportation	**X**	Tribal Cultural Resources
	Utilities & 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 GARDENA



Raymond Barragan, Community Development Manager

August 14, 2019
Date

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-site, Project- and cumulative-level, 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.

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	

Impact Analysis

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

No Impact. Under CEQA, a scenic vista is defined as a viewpoint that provides expansive views of a highly-valued landscape for the public's benefit. No such conditions exist on or near the Project site. Additionally, the GGP does not specifically address scenic vistas. Therefore, the Project would not have an adverse effect on a scenic vista, 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. The area surrounding the Project site is predominately developed with no natural landforms or scenic features present. There are no State- or County-designated scenic highways

in the Project site vicinity.[11] Therefore, the Project would not damage scenic resources within a state scenic highway, and no mitigation is required.

4.1c If in a non-urbanized area, would the project substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage point). If in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?

No Impact. The Project site is in an urbanized area. The Project site is fully improved and developed as an industrial use including a trucking warehouse with associated surface parking lot and outdoor trailer storage. The Project site and its surroundings to the east and south (beyond West 178th Street generally between Normandie and Denker Avenues) are characterized by industrial uses, which predominate in the area. The Project proposes to remove all existing on-site improvements, and construct 114 attached townhomes in 22 buildings, with between four and six DU per building. The maximum proposed building height would be 40 feet (to roof ridge).

The on-site and surrounding zoning and the GMC regulations pertaining to each zone are as follows:

- Project Site (Existing): M-2 Zone (GMC Chapters 18.36 and 18.38) with a MU Overlay (GMC Chapter 18.19).
- Project Site (Proposed): The Project proposes a Zone Change to R-4 (GMC Chapter 18.18).
- North: C-3 Zone (GMC Chapter 18.32) and Artesia Corridor Specific Plan (ACSP) (GMC Chapter 18.39).
- South: M-1 Zone (GMC Chapter 18.38), H-B Zone (GMC Chapter 18.28), and R-3 Zone (GMC Chapter 18.16).
- East: M-2 Zone (GMC Chapters 18.36 and 18.38).
- West: R-3 Zone (GMC Chapter 18.16) and MU Zone (GMC Chapter 18.19).

The regulations specified above do not include standards governing scenic quality. Additionally, the GMC does not include other regulations governing scenic quality. Therefore, the Project would not conflict with applicable zoning or other regulations governing scenic quality. No impact would occur concerning scenic quality, and no mitigation is required.

[11] California Department of Transportation. (2011). *California Scenic Highway Mapping System.* Retrieved from http://www.dot.ca.gov/hq/LandArch/16_livability/scenic_highways/index.htm.

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 and near the Project site is associated with industrial, residential, and street lighting along West 178th Street typical of urbanized areas. 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, parking lot lighting, building illumination, security lighting, and landscape lighting). The Project's outdoor lighting would be subject to compliance with GMC §18.42.150: Security and Lighting Plan, which the City requires to ensure that safety and security issues are addressed in the development's design, and that an average of 2.0-foot candle with no single point less than 1.0-foot candle for all public/common areas. A Photometric Plan would be required prior to Building Permit issuance to verify compliance with GMC §18.42.150.

As part of the Project's Site Plan Review process concerning the Project's potential to adversely affect the surrounding area, the City's Community Development Department would review the Photometric Plan concerning the proposed light standards' placement, height, and direction of illumination; see GMC §18.44.030: Factors for Approval. Further, the City would also review new lighting for conformance with the 2016 California Green Building Standards Code (CALGreen) (CCR Title 24 Part 11) such that only the minimum amount of lighting is used, and no light spillage occurs.[12] Consistent with City requirements, required landscaping may also help buffer and minimize light effects on adjacent land uses. Buildings with large facades constructed of reflective surfaces (e.g., brightly colored building façades, metal surfaces, and reflective glass) could increase existing levels of daytime glare. The Project's proposed design does not include such surfaces or components. Therefore, the Project would result in a less than significant impact concerning a new source of light or glare, and no mitigation is required.

[12] California Building Standards Commission. (2016). 2016 California Green Building Standards Code: California Code of Regulations Title 24, Part 11. International Code Council.

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

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?

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

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?

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. No Prime Farmland, Unique Farmland, or Farmland of Statewide or Local Importance is mapped in the City.[13] Further, the Project site is not the subject of a Williamson Act Contract.[14] The Project site is zoned M-2 with a MU Overlay and proposed to change to R-4. No agricultural, forest land, or timberland zoning exists in the City. Therefore, the Project would result in no impact concerning mapped farmlands, Williamson Act contracts, or agricultural, forest, or timber land zoning, and no mitigation is required.

The Project site is fully improved with industrial uses and located within an urbanized area, along 178th Street. No farmland, forest land, or timberland exist in the City. Therefore, the Project would not result in the conversion or loss of Farmland, forest land or timberland, and no mitigation is required.

[13] California Department of Conservation. (2016). *California Important Farmland Finder.* Retrieved from https://maps.conservation.ca.gov/dlrp/ciff/.

[14] California Department of Conservation. (2016). *Williamson Act/Land Conservation Act.* http://www.conservation.ca.gov/dlrp/lca.

4.3 Air Quality

This Section is based on the *Air Quality Assessment* (Kimley-Horn, May 2019), which is included in its entirety in **Appendix A: Air Quality Assessment**.

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	

South Coast Air Quality Management District (SCAQMD) Thresholds

Mass Emissions Thresholds

The SCAQMD significance criteria may be relied upon to make the above determinations. According to the SCAQMD, an air quality impact is considered significant if a proposed project would violate any ambient air quality standard, contribute substantially to an existing or projected air quality violation, or expose sensitive receptors to substantial pollutant concentrations. The SCAQMD has established thresholds of significance for air quality during project construction and operations, as shown in **Table 4.3-1: South Coast Air Quality Management District Emissions Thresholds.**

TABLE 4.3-1: SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT EMISSIONS THRESHOLDS		
Criteria Air Pollutants and Precursors (Regional)	**Construction-Related**	**Operational-Related**
	Average Daily Emissions (pounds/day)	**Average Daily Emission (pounds/day)**
Reactive Organic Gases (ROG)	75	55
Carbon Monoxide (CO)	550	550
Nitrogen Oxides (NO_X)	100	55
Sulfur Oxides (SO_X)	150	150
Coarse Particulates (PM_{10})	150	150
Fine Particulates ($PM_{2.5}$)	55	55
Source: South Coast Air Quality Management District, *CEQA Air Quality Handbook,* 1993 ($PM_{2.5}$ threshold adopted June 1, 2007).		

Localized Carbon Monoxide

In addition to the daily thresholds listed above, the proposed Project would be subject to the ambient air quality standards. These are addressed through an analysis of localized CO impacts. The California 1-hour and 8-hour CO standards are:

- 1-hour = 20 ppm
- 8-hour = 9 ppm

The significance of localized impacts depends on whether ambient CO levels near the Project site exceed state and federal CO standards. The South Coast Air Basin (SCAB) has been designated as attainment under the 1-hour and 8-hour standards.

Localized Significance Thresholds

In addition to the CO hotspot analysis, the SCAQMD developed Local Significance Thresholds ("LSTs") for emissions of NO_2, CO, PM_{10}, and $PM_{2.5}$ generated at new development sites (off-site mobile source emissions are not included in the LST analysis). LSTs represent the maximum emissions that can be generated at a project site without expecting to cause or substantially contribute to an exceedance of the most stringent national or state ambient air quality standards. LSTs are based on the ambient concentrations of that pollutant within the project source receptor area (SRA), as demarcated by the SCAQMD, and the distance to the nearest sensitive receptor. LST analysis for construction is applicable for all projects that disturb 5.0 acres or less on a single day. The City of Gardena is located within SCAQMD SRA 3 (Southwest Coastal LA County). **Table 4.3-2: Local Significance Thresholds (Construction/Operations)** shows the LSTs for a 1.0-acre, 2.0-acre, and 5.0-acre project site in SRA 3 with sensitive receptors located within 25 meters of the Project site.

TABLE 4.3-2: LOCAL SIGNIFICANCE THRESHOLDS (CONSTRUCTION/OPERATIONS)				
Project Size	**Nitrogen Oxide (NO_x) – lbs/day**	**Carbon Monoxide (CO) – lbs/day**	**Coarse Particulates (PM_{10}) – lbs/day**	**Fine Particulates ($PM_{2.5}$) – lbs/day**
1.0 Acre	91/91	674/674	5/1	3/1
2.0 Acres	131/131	982/982	8/2	5/1
5.0 Acres	197/197	1,823/1,823	15/4	8/2
Source: South Coast Air Quality Management District. (July 2008). *Localized Significance Threshold Methodology*.				

Impact Analysis

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

Less Than Significant Impact. As part of its enforcement responsibilities, the United States Environmental Protection Agency (USEPA) requires that each state with nonattainment areas prepare and submit a State Implementation Plan (SIP) that demonstrates the means to attain the federal standards. The SIP must integrate federal, state, and local plan components and regulations to identify specific measures to reduce pollution in nonattainment areas, using a combination of performance standards and market-based programs. Similarly, under state law, the California Clean Air Act (CCAA) requires an air quality attainment plan to be prepared for areas designated as nonattainment regarding the federal and state ambient air quality standards. Air quality attainment plans outline emissions limits and control measures to achieve and maintain these standards by the earliest practical date.

The Project site is located within SCAB, which is under SCAQMD's jurisdiction. The SCAQMD is required, pursuant to the Federal Clean Air Act (FCAA), to reduce emissions of criteria pollutants for which SCAB is in non-attainment. To reduce such emissions, the SCAQMD drafted the 2016 Air Quality Management Plan (AQMP). The 2016 AQMP establishes a program of rules and regulations directed at reducing air pollutant emissions and achieving state (California) and national air quality standards. The 2016 AQMP is a regional and multi-agency effort including the SCAQMD, the California Air Resources Board (CARB), the SCAG, and the USEPA. The AQMP's pollutant control strategies are based on the latest scientific and technical information and planning assumptions, including SCAG's 2016 RTP/SCS, updated emission inventory methodologies for various source categories, and SCAG's latest growth forecasts. SCAG's latest growth forecasts were defined in consultation with local governments and with reference to local general plans. The Project is subject to the SCAQMD's AQMP.

Criteria for determining consistency with the AQMP are defined by the following indicators:

- **Consistency Criterion No. 1**: A proposed project would not result in an increase in the frequency or severity of existing air quality violations, or cause or contribute to new violations, or delay the timely attainment of the AQMP's air quality standards or the interim emissions reductions.

- **Consistency Criterion No. 2**: A proposed project would not exceed the AQMP's assumptions or increments based on the years of the project build-out phase.

Consistency Criterion No. 1 refers to the California Ambient Air Quality Standards (CAAQS) and National Ambient Air Quality Standards (NAAQS). As shown in **Table 4.3-3: Construction-Related Emissions** and **Table 4.3-4: Operational Emissions**, the Project construction and operational emissions would be below SCAQMD's thresholds. As the Project would not generate localized construction or regional construction or operational emissions that would exceed SCAQMD thresholds of significance, the Project would not violate any air quality standards. Thus, no impact is expected, and the Project would be consistent with the first criterion.

Consistency Criterion No. 2 refers to SCAG's growth forecasts and associated assumptions included in the AQMP. The future air quality levels projected in the AQMP are based on SCAG's growth projections, which are based, in part, on the general plans of cities located within the SCAG region. Therefore, projects that are consistent with the applicable assumptions used in the development of the AQMP would not jeopardize attainment of the air quality levels identified in the AQMP, even if they exceed the SCAQMD's recommended daily emissions thresholds.

Concerning Consistency Criterion No. 2, the AQMP contains air pollutant reduction strategies based on SCAG's latest growth forecasts, and SCAG's growth forecasts were defined in consultation with local governments and with reference to local general plans. Therefore, it is reasonable to conclude that if a project is consistent with the applicable general plan land use designation, and if the general plan was adopted prior to the applicable AQMP, then the increase in vehicle miles traveled (VMT) and/or population generated by said project would be consistent with the AQMP's assumed VMT and population growth.

The 5.63-acre Project site is designated Industrial with a Mixed-Use Overlay. This existing designation was considered in SCAG's latest growth forecasts. The Mixed-Use Overlay permits residential development on selected areas designated for commercial and industrial land uses. For lots greater than 1.0 AC, the maximum allowed intensity and density (stepped density) within the Mixed-Use Overlay designation are a floor-area ratio (FAR) of 0.5 and 30 DU/AC. The minimum permitted residential density would be 20 DU/AC. Thus, based on the current Mixed-Use Overlay designation, a 5.63-acre site, 30 DU/AC, and 0.5 FAR, the Project site's maximum residential development capacity is 170 DU and maximum non-residential capacity is approximately 122,621 SF. The Project proposes 114 DU at a density of 20.36 DU/GAC, which would not exceed the site's maximum allowable density of 30 DU/AC and maximum residential development capacity of 170 DU under the current Industrial with Mixed-Use Overlay designation. Thus, the Project would not increase growth beyond the AQMP's projections.

It is also noted, the Project proposes a General Plan Amendment to change the site's land use designation to High-Density Residential, which allows 30 DU/AC for lots greater than 1.0 acre. The Project proposes 114 DU at a density of 20.36 DU/GAC, which would not exceed the site's maximum allowable density of 30 DU/AC and maximum residential development capacity of

170 DU under the proposed High-Density Residential designation. Therefore, the Project would be consistent with this criterion and impacts would be less than significant.

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?

Less Than Significant Impact.

Construction Emissions

Project 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., ROG and NO_x) and PM_{10} and $PM_{2.5}$. Construction-generated emissions are short term and temporary, lasting only while construction activities occur, but would be considered a significant air quality impact if the volume of pollutants generated exceeds the SCAQMD's thresholds of significance.

Construction results in the temporary generation of emissions resulting from site grading, road paving, motor vehicle exhaust associated with construction equipment and worker trips, and the movement of construction equipment, especially on unpaved surfaces. Emissions of airborne particulate matter are largely dependent on the amount of ground disturbance associated with site preparation activities, as well as weather conditions and the appropriate application of water.

For purposes of this analysis, the duration of the proposed Project's construction activities was estimated to last approximately 16 months. The Project's construction-related emissions were calculated using the CARB-approved CalEEMod computer program, which is designed to model emissions for land use development projects, based on typical construction requirements. Project demolition, site preparation, and grading were anticipated to begin in the Fall of 2019. Building construction was estimated to begin the end of 2019 and last almost a full year to the end of 2020. The fall 2019 construction start data used in the modeling results in a conservative analysis because CalEEMod uses cleaner emissions factors in future years due to improved emissions controls and fleet turnover. Paving and Architectural Coating were modeled to be completed by January 2021. The exact construction timeline is unknown, however to be conservative, earlier dates were utilized in the modeling. This approach is conservative given that emissions factors decrease in future years due to regulatory and technological improvements and fleet turnover. See **Appendix A** for additional information regarding the construction assumptions used in this analysis.

The Project's predicted maximum daily construction-related emissions are summarized in **Table 4.3-3: Construction-Related Emissions (Maximum Pounds Per Day)**. As shown in **Table 4.3-3**, all criteria pollutant emissions would remain below their respective thresholds. While impacts would be considered less than significant, the proposed Project would be subject to compliance with SCAQMD Rules 402, 403, and 1113, described in the *Regulatory Setting* –

Regional Section above, to further reduce specific construction-related emissions. The proposed Project emissions would not worsen ambient air quality, create additional violations of federal and state standards, or delay SCAB's goal for meeting attainment standards.

TABLE 4.3-3: CONSTRUCTION-RELATED EMISSIONS (MAXIMUM POUNDS PER DAY)

Construction Year	Reactive Organic Gases (ROG)	Nitrogen Oxide (NOx)	Carbon Monoxide (CO)	Sulfur Dioxide (SO2)	Coarse Particulate Matter (PM10)	Fine Particulate Matter (PM2.5)
2019	4.43	45.65	24.39	0.06	10.46	4.66
2020	5.09	34.09	24.79	0.05	11.43	4.35
2021	4.79	21.72	24.00	0.05	2.64	1.43
SCAQMD Threshold	75	100	550	150	55	150
Exceed SCAQMD Threshold?	No	No	No	No	No	No

Notes: SCAQMD Rule 403 Fugitive Dust applied. The Rule 403 reduction/credits include 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 SCAQMD CEQA Handbook (Tables XI-A through XI-E) were applied. No mitigation was applied to construction equipment; see **Appendix A** for model outputs. Additionally, the 2019 construction timing results in a conservative analysis because CalEEMod uses cleaner emissions factors in future years due to improved emissions controls and fleet turnover. Therefore, if the opening year is delayed, emissions would be lower than what is analyzed.

Source: CalEEMod version 2016.3.2; see **Appendix A** for model outputs.

Operational Emissions

The Project's operational emissions would be associated with motor vehicle use and area sources. Area sources include natural gas for space and water heating, gasoline-powered landscaping and maintenance equipment, consumer products (such as household cleaners). Mobile sources emissions are generated from vehicle operations associated with Project operations. Typically, area sources are small sources that contribute very little emissions individually, but when combined may generate substantial amounts of pollutants. Area specific defaults in CalEEMod were used to calculate area source emissions.

CalEEMod was also used to calculate pollutants emissions from vehicular trips generated from the proposed Project. CalEEMod default inputs, vehicle mix, and trip distances, were unaltered for this analysis. CalEEMod estimated emissions from Project operations are summarized in **Table 4.3-4: Operational Emissions (Maximum Pounds Per Day)**. Note that emissions rates differ from summer to winter because weather factors are dependent on the season and these factors affect pollutant mixing, dispersion, ozone formation, and other factors.

As shown in **Table 4.3-4**, emission calculations generated from CalEEMod demonstrate that Project operations would not exceed the SCAQMD thresholds for any criteria air pollutants. Therefore, Project operational impacts would be less than significant. Additionally, the Project is a higher density residential infill development with various features that create a walkable space with 48,727 SF of common open space and 21,279 SF of private open space (patios and balconies).

TABLE 4.3-4: OPERATIONAL EMISSIONS (MAXIMUM POUNDS PER DAY)						
Source	**Reactive Organic Gases (ROG)**	**Nitrogen Oxide (NO_x)**	**Carbon Monoxide (CO)**	**Sulfur Dioxide (SO_2)**	**Coarse Particulate Matter (PM_{10})**	**Fine Particulate Matter ($PM_{2.5}$)**
Summer Emissions						
Area Source Emissions	2.75	0.11	9.43	0.001	0.05	0.05
Energy Emissions	0.03	0.28	0.12	0.002	0.02	0.02
Mobile Emissions	1.24	5.80	16.80	0.06	0.05	1.27
Total Emissions	4.02	6.19	26.35	0.06	0.12	1.34
SCAQMD Threshold	55	55	550	150	150	55
Exceeds Threshold?	No	No	No	No	No	No
Winter Emissions						
Area Source Emissions	2.75	0.11	9.43	0.001	0.05	0.05
Energy Emissions	0.03	0.28	0.12	0.002	0.02	0.02
Mobile Emissions	1.20	5.95	15.96	0.06	4.61	1.27
Total Emissions	3.99	6.34	25.51	0.06	4.69	1.34
SCAQMD Threshold	55	55	550	150	150	55
Exceeds Threshold?	No	No	No	No	No	No
Source: CalEEMod version 2016.3.2; see **Appendix A** for model outputs.						

Area Source Emissions

Area source emissions would be generated due to consumer products, architectural coating, hearths, and landscaping that were previously not present on the site. As shown in **Table 4.3-4**, the Project's unmitigated area source emissions would not exceed SCAQMD thresholds for either the winter or summer seasons. Therefore, mitigation measures are not required, and a less than significant impact is anticipated.

Energy Source Emissions

Energy source emissions would be generated due to the Project's electricity and natural gas usage. The Project's primary uses of electricity and natural gas would be for space heating and cooling, water heating, ventilation, lighting, appliances, and electronics. As shown in **Table 4.3-4**, the Project's unmitigated energy source emissions would not exceed SCAQMD thresholds for criteria pollutants. As such, the Project would not violate any air quality standards or contribute substantially to an existing or projected air quality violation. Therefore, the Project's operational air quality impacts would be less than significant.

Mobile Source

Mobile sources are emissions from motor vehicles, including tailpipe and evaporative emissions. Depending upon the pollutant being discussed, the potential air quality impact may be of either regional or local concern. For example, ROG, NO_X, PM_{10}, and $PM_{2.5}$ are all pollutants of regional concern. NO_X and ROG react with sunlight to form O_3, known as photochemical smog.

Additionally, wind currents readily transport PM_{10} and $PM_{2.5}$. However, CO tends to be a localized pollutant, dispersing rapidly at the source.

Project-generated vehicle emissions have been estimated using CalEEMod, as recommended by the SCAQMD. The Project's trip generation estimates were based on the standard Institute of Transportation Engineers (ITE) trip generation rates. Based on the ITE trip generation rates, the proposed Project would generate 620 average daily trips (ADT).[15] This trip generation estimate is conservative given trip credits for the existing land uses that would be displaced have not been applied. When trip credits for the existing trucking warehouse are applied to the Project's trip generation estimates, the Project's net new trips would be offset, with proportionate offsets in mobile source emissions. Notwithstanding, for a conservative approach, this analysis assumes a traffic increase of 620 ADT, excluding trip credits. As shown in **Table 4.3-4,** mobile source emissions would not exceed SCAQMD thresholds for criteria pollutants. Therefore, the Project's air quality impacts associated with mobile source emissions would be less than significant.

Cumulative Short-Term Emissions

SCAB is designated nonattainment for O_3, PM_{10}, and $PM_{2.5}$ for State standards and nonattainment for O_3 and $PM_{2.5}$ for Federal standards. As discussed above, the Project's construction-related emissions by themselves would not exceed the SCAQMD significance thresholds for criteria pollutants.

Since these thresholds indicate whether individual Project emissions have the potential to affect cumulative regional air quality, it can be expected that the Project-related construction emissions would not be cumulatively considerable. The SCAQMD has developed strategies to reduce criteria pollutant emissions outlined in the AQMP pursuant to the federal Clean Air Act mandates. The analysis assumed fugitive dust controls would be utilized during construction, including frequent water applications. SCAQMD rules, mandates, and compliance with adopted AQMP emissions control measures would also be imposed on construction projects throughout SCAB, which would include related cumulative projects. As concluded above, the Project's construction-related impacts would be less than significant. Compliance with SCAQMD rules and regulations would further minimize the proposed Project's construction-related emissions. Therefore, Project-related construction emissions, in combination with those from other projects in the area, would not substantially deteriorate the local air quality. The Project's construction-related emissions would not result in a cumulatively considerable contribution to significant cumulative air quality impacts.

Cumulative Long-Term Impacts

The SCAQMD has not established separate significance thresholds for cumulative operational emissions. The nature of air emissions is largely a cumulative impact. As a result, no single project is sufficient in size to, by itself, result in nonattainment of ambient air quality standards. Instead,

[15] **Appendix H: Trip Generation Analysis**

individual project emissions contribute to existing cumulatively significant adverse air quality impacts. The SCAQMD developed the operational thresholds of significance based on the level above which individual project emissions would result in a cumulatively considerable contribution to SCAB's existing air quality conditions. Therefore, a project that exceeds the SCAQMD operational thresholds would also be a cumulatively considerable contribution to a significant cumulative impact.

As shown in **Table 4.3-4**, the Project's operational emissions would not exceed SCAQMD thresholds. As a result, the Project's operational emissions would not result in a cumulatively considerable contribution to significant cumulative air quality impacts. Additionally, adherence to SCAQMD rules and regulations would alleviate potential impacts related to cumulative conditions on a project-by-project basis. Project operations would not contribute a cumulatively considerable net increase of any nonattainment criteria pollutant.

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

Less Than Significant Impact.

Localized Construction Significance Analysis

The nearest sensitive receptors to the Project site are the mobile home residences adjacent to the Project property line, located approximately 10 feet (3 meters) to the west. To identify impacts to sensitive receptors, the SCAQMD recommends addressing LSTs for construction. LSTs were developed in response to SCAQMD Governing Boards' Environmental Justice Enhancement Initiative (I-4). The SCAQMD provided the *Final Localized Significance Threshold Methodology* (dated June 2003 [revised 2008]) for guidance. The LST methodology assists lead agencies in analyzing localized impacts associated with Project-specific emissions.

Since CalEEMod calculates construction emissions based on the number of equipment hours and the maximum daily soil disturbance activity possible for each piece of equipment, **Table 4.3-5: Equipment-Specific Grading Rates**, is used to determine the maximum daily disturbed acreage for comparison to LSTs. The appropriate SRA for the LSTs is the Southwest Coastal LA County area (SRA 3), since this area includes the Project site. LSTs apply to CO, NO_2, PM_{10}, and $PM_{2.5}$. The SCAQMD produced look-up tables for projects that disturb areas less than or equal to 5.0 acres. Project construction is anticipated to disturb a maximum of 3.5 acres in a single day.

TABLE 4.3-5: EQUIPMENT-SPECIFIC GRADING RATES

Construction Phase	Equipment Type	Equipment Quantity	Acres Graded per 8-Hour Day	Operating Hours per Day	Acres Graded per Day
Site Preparation	Rubber Tired Dozers	3	0.5	8	1.5
	Tractors/Loaders/Backhoes	4	0.5	8	2.0
Total Acres Graded per Day					3.5
Source: CalEEMod version 2016.3.2; see **Appendix A** for model outputs.					

The SCAQMD's methodology states that "off-site mobile emissions from the project should not be included in the emissions compared to LSTs." Therefore, for purposes of the construction LST analysis, only emissions included in the CalEEMod "on-site" emissions outputs were considered. The nearest sensitive receptors to the Project site are the mobile home residences located approximately 10 feet (3 meters) to the west. LST thresholds are provided for distances to sensitive receptors of 25, 50, 100, 200, and 500 meters. Therefore, as recommended by the SCAQMD, LSTs for receptors located at 25 meters were utilized in this analysis for receptors closer than 25 meters. **Table 4.3-6: Localized Significance of Construction Emissions (Maximum Pounds per Day)**, presents the results of localized emissions during Project construction.

TABLE 4.3-6: LOCALIZED SIGNIFICANCE OF CONSTRUCTION EMISSIONS (MAXIMUM POUNDS PER DAY)

Construction Activity	Nitrogen Oxide (NO_x)	Carbon Monoxide (CO)	Coarse Particulate Matter (PM_{10})	Fine Particulate Matter ($PM_{2.5}$)
Demolition (2019)	35.78	22.06	4.0	2.0
Site Preparation (2019)	45.57	22.06	6.19	4.61
Grading (2019)	28.35	16.29	9.87	3.93
Grading (2020)	26.39	16.05	9.74	3.82
Building Construction (2020)	19.19	16.85	1.12	1.05
Building Construction (2021)	17.43	16.58	0.96	0.90
Paving (2020)	11.80	12.28	0.65	0.60
Architectural Coating (2020)	1.68	1.83	0.11	0.11
SCAQMD Localized Screening Threshold (adjusted for 3.5 acre at 25 meters)	130	984.7	10.4	5
Exceed SCAQMD Threshold?	No	No	No	No

Source: CalEEMod version 2016.3.2; see **Appendix A** for model outputs.

Table 4.3-6 shows that the emissions of these pollutants on the peak day of Project construction would not result in significant concentrations of pollutants at nearby sensitive receptors. Further, the Project would implement a SWPPP and monitoring plan, which would include BMPs (i.e., watering, screening, covering, etc.) that would control fugitive dust. Therefore, the Project would result in a less than significant impact concerning LSTs during construction activities.

Localized Operational Significance Analysis

LSTs for receptors located at 25 meters for SRA 3 were utilized in this analysis. The Project site is 5.63-acres, the 5-acre threshold was conservatively used for the Project. The on-site operational emissions are compared to the LST thresholds in **Table 4.3-7: Localized Significance of Operational Emissions**. **Table 4.3-7** shows that the maximum daily emissions of these pollutants during Project operations would not result in significant concentrations of pollutants at nearby sensitive receptors. Therefore, the Project would result in a less than significant impact concerning LSTs during operational activities.

TABLE 4.3-7: LOCALIZED SIGNIFICANCE OF OPERATIONAL EMISSIONS (MAXIMUM POUNDS PER DAY)				
Activity	**Nitrogen Oxide (NO_x)**	**Carbon Monoxide (CO)**	**Coarse Particulate Matter (PM_{10})**	**Fine Particulate Matter ($PM_{2.5}$)**
On-Site Emissions (Area Sources)	0.11	9.43	0.05	0.05
SCAQMD Localized Screening Threshold (5 acres at 25 meters)	197	1,823	4	2
Exceed SCAQMD Threshold?	No	No	No	No
Source: CalEEMod version 2016.3.2; see **Appendix A** for model outputs.				

The proposed Project would not involve the use, storage, or processing of carcinogenic or non-carcinogenic toxic air contaminants, and no significant toxic airborne emissions would result from operation of the proposed Project. Construction activities are subject to the regulations and laws relating to toxic air pollutants at the regional, state, and federal level that would protect sensitive receptors from substantial concentrations of these emissions. Therefore, impacts associated with the release of toxic air contaminants would be less than significant.

Criteria Pollutant Health Impacts

On December 24, 2018, the California Supreme Court issued an opinion identifying the need to provide sufficient information connecting a project's air emissions to health impacts or explain why such information could not be ascertained (Sierra Club v. County of Fresno [Friant Ranch, L.P.] [2018] 6 Cal.5th 502). The SCAQMD has set its CEQA significance thresholds based on the FCAA, which defines a major stationary source (in extreme ozone nonattainment areas such as the South Coast Air Basin) as emitting 10 tons per year. The thresholds correlate with the trigger levels for the federal New Source Review (NSR) Program and SCAQMD Rule 1303 for new or modified sources. The NSR Program was created by the FCAA to ensure that stationary sources of air pollution are constructed or modified in a manner that is consistent with attainment of health-based federal ambient air quality standards. The federal ambient air quality standards establish the levels of air quality necessary, with an adequate margin of safety, to protect the public health. Therefore, projects that do not exceed the SCAQMD's mass emissions thresholds would not violate any air quality standards or contribute substantially to an existing or projected air quality violation and no criteria pollutant health impacts would occur.

NO_X and ROG are precursor emissions that form ozone in the atmosphere in the presence of sunlight where the pollutants undergo complex chemical reactions. It takes time and the influence of meteorological conditions for these reactions to occur, so ozone may be formed at a distance downwind from the sources. Breathing ground-level ozone can result in health effects that include: reduced lung function, inflammation of airways, throat irritation, pain, burning, or discomfort in the chest when taking a deep breath, chest tightness, wheezing, or shortness of breath. In addition to these effects, evidence from observational studies strongly indicates that higher daily ozone concentrations are associated with increased asthma attacks, increased hospital admissions, increased daily mortality, and other markers of morbidity. The consistency

and coherence of the evidence for effects upon asthmatics suggests that ozone can make asthma symptoms worse and can increase sensitivity to asthma triggers.

According to the SCAQMD's 2016 AQMP, ozone, NO_X, and ROG have been decreasing in the Basin since 1975 and are projected to continue to decrease in the future. Although VMT in the Basin continue to increase, NO_X and ROG levels are decreasing because of the mandated controls on motor vehicles and the replacement of older polluting vehicles with lower-emitting vehicles. NO_X emissions from electric utilities have also decreased due to the use of cleaner fuels and renewable energy. The 2016 AQMP demonstrates how the SCAQMD's control strategy to meet the 8-hour ozone standard in 2023 would lead to sufficient NO_X emission reductions to attain the 1-hour ozone standard by 2022. In addition, since NO_X emissions also lead to the formation of $PM_{2.5}$, the NO_X reductions needed to meet the ozone standards will likewise lead to improvement of $PM_{2.5}$ levels and attainment of $PM_{2.5}$ standards.

The SCAQMD's air quality modeling demonstrates that NO_X reductions prove to be much more effective in reducing ozone levels and will also lead to a significant decrease in $PM_{2.5}$ concentrations. NO_X-emitting stationary sources regulated by the SCAQMD include Regional Clean Air Incentives Market (RECLAIM) facilities (e.g., refineries, power plants, etc.), natural gas combustion equipment (e.g., boilers, heaters, engines, burners, flares) and other combustion sources that burn wood or propane. The 2016 AQMP identifies robust NO_X reductions from new regulations on RECLAIM facilities, non-refinery flares, commercial cooking, and residential and commercial appliances. Such combustion sources are already heavily regulated with the lowest NO_X emissions levels achievable but there are opportunities to require and accelerate replacement with cleaner zero-emission alternatives, such as residential and commercial furnaces, pool heaters, and backup power equipment. The AQMD plans to achieve such replacements through a combination of regulations and incentives. Technology-forcing regulations can drive development and commercialization of clean technologies, with future year requirements for new or existing equipment. Incentives can then accelerate deployment and enhance public acceptability of new technologies.

The 2016 AQMD also emphasized that beginning in 2012, continued implementation of previously adopted regulations will lead to NO_X emission reductions of 68 percent by 2023 and 80 percent by 2031. With the addition of 2016 AQMP proposed regulatory measures, a 30 percent reduction of NO_X from stationary sources is expected in the 15-year period between 2008 and 2023. This is in addition to significant NO_X reductions from stationary sources achieved in the decades prior to 2008.

As previously discussed, Project emissions would be less than significant and would not exceed SCAQMD thresholds; see **Table 4.3-3** and **Table 4.3-4**. Localized effects of on-site Project emissions on nearby receptors were also found to be less than significant; see **Table 4.3-6** and **Table 4.3-7**. The LSTs represent the maximum emissions from a project that are not expected to cause or contribute to an exceedance of the most stringent applicable NAAQS or CAAQS. The LSTs were developed by the SCAQMD based on the ambient concentrations of that pollutant for

each SRA and distance to the nearest sensitive receptor. The ambient air quality standards establish the levels of air quality necessary, with an adequate margin of safety, to protect public health, including protecting the health of sensitive populations such as asthmatics, children, and the elderly. As shown above, Project-related emissions would not exceed the regional thresholds or the LSTs, and therefore would not exceed the ambient air quality standards or cause an increase in the frequency or severity of existing violations of air quality standards. Therefore, sensitive receptors would not be exposed to criteria pollutant levels more than the health-based ambient air quality standards.

Carbon Monoxide Hotspots

An analysis of CO "hot spots" is needed to determine whether the change in the level of service of an intersection resulting from the proposed 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.

Accordingly, with the steadily decreasing CO emissions from vehicles, even very busy intersections do not result in exceedances of the CO standard. The 2016 AQMP is the most recent version that addresses CO concentrations. As part of the SCAQMD *CO Hotspot Analysis*, the Wilshire Boulevard/Veteran Avenue intersection, one of the most congested intersections in Southern California with approximately 100,000 ADT, was modeled for CO concentrations. This modeling effort identified a CO concentration high of 4.6 ppm, which is well below the 35-ppm Federal standard. The proposed Project would not produce the volume of traffic required to generate a CO hot spot in the context of SCAQMD's *CO Hotspot Analysis*. As the CO hotspots were not experienced at the Wilshire Boulevard/Veteran Avenue intersection even as it accommodates 100,000 ADT, it can be reasonably inferred that CO hotspots would not be experienced at any Project area intersections from the 620 ADT attributable to the Project. Therefore, impacts would be less than significant.

Construction-Related Diesel Particulate Matter

Project construction would generate DPM emissions from the use of off-road diesel equipment required. 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 contaminants (TAC) 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 would dissipate 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. The closest sensitive receptors to the Project site are located approximately 10 feet from the property boundary, and further from the major Project construction areas.

California Office of Environmental Health Hazard Assessment has not identified short-term health effects from diesel particulate matter (DPM). Construction is temporary and would be transient throughout the site (i.e., move from location to location) and would not generate emissions in a fixed location for extended periods of time. Construction activities would be subject to and would comply with California regulations limiting the idling of heavy-duty construction equipment to no more than five minutes to further reduce nearby sensitive receptors' exposure to temporary and variable DPM emissions. Additionally, it is noted that the proposed Project would replace an existing trucking warehouse, which uses diesel vehicles (TAC sources) that idle on- and off-site. With Project implementation TAC emissions from the existing trucking warehouse would no longer occur. For these reasons, DPM generated by Project construction activities, in and of itself, would not expose sensitive receptors to substantial amounts of air toxins and the Project would result in a less than significant impact.

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.

Construction

Odors that could be generated by construction activities are required to follow SCAQMD Rule 402 to prevent odor nuisances on sensitive land uses. SCAQMD Rule 402, Nuisance, states:

> *A person shall not discharge from any source whatsoever such quantities of air contaminants or other material which cause injury, detriment, nuisance, or annoyance to any considerable number of persons or to the public, or which endanger the comfort, repose, health or safety of any such persons or the public, or which cause, or have a natural tendency to cause, injury or damage to business or property.*

During construction, emissions from construction equipment, such as diesel exhaust, and volatile organic compounds from architectural coatings and paving activities may generate odors. However, these odors would be temporary, are not expected to affect a substantial number of people and would disperse rapidly. Therefore, impacts related to odors associated with the Project's construction-related activities would be less than significant.

Operational

The SCAQMD *CEQA Air Quality Handbook* identifies certain land uses as sources of odors. These land uses include agriculture (farming and livestock), wastewater treatment plants, food processing plants, chemical plants, composting facilities, refineries, landfills, dairies, and fiberglass molding. The Project proposes development of residential uses, which would not involve the types of uses that would emit objectionable odors affecting substantial numbers of people. The proposed Project would not include any of the land uses that have been identified by the SCAQMD as odor sources. Therefore, the proposed Project would not create objectionable odors.

CUMULATIVE ANALYSIS

Cumulative Setting

The cumulative setting for air quality includes the City of Gardena and SCAB. SCAB is designated as a nonattainment area for state standards of ozone, PM_{10}, and $PM_{2.5}$. SCAB is designated as a nonattainment area for federal standards of ozone and $PM_{2.5,}$ attainment and serious maintenance for federal PM_{10} standards, and is designated as unclassified or attainment for all other pollutants. Cumulative growth in population and vehicle use could inhibit efforts to improve regional air quality and attain the ambient air quality standards.

Cumulative Impacts and Mitigation Measures

The SCAQMD's approach to assessing cumulative impacts is based on the AQMP forecasts of attainment of ambient air quality standards in accordance with requirements of the FCAA and CCAA. As discussed above, the proposed Project would be consistent with the AQMP, which is intended to bring SCAB into attainment for all criteria pollutants. Since the Project's estimated construction and operational emissions would not exceed the applicable SCAQMD daily significance thresholds that are designed to assist the region in attaining both NAAQS and CAAQS, cumulative impacts would be less than significant.

4.4 Biological Resources

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 Game 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 Game 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

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 Game or U.S. Fish and Wildlife Service?

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 Game or U.S. Fish and Wildlife Service?

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?

No Impact. The Project site is fully improved and comprised of a trucking warehouse with associated surface parking lot and outdoor trailer storage. No natural habitat types are present on the property. The site is bounded by a vacant lot, an equestrian use (i.e., horse stables), and the Dominguez Channel to the north, West 178th Street to the south, office commercial and industrial uses to the east, and a mobile home park to the west. No natural habitat types are present on these surrounding areas, and only landscaping including ornamental vegetation is present. Based on review of the existing and surrounding site conditions, no candidate, sensitive, or special-status plant or wildlife species, riparian habitat or other sensitive natural community, or wetlands are present on or adjacent to the Project site. Therefore, the Project would not have an adverse effect on any candidate, sensitive, or special-status plant or wildlife species, riparian habitat or other sensitive natural community, or wetlands, and no mitigation is required.

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 With Mitigation Incorporated. The Project site and surrounding areas are fully improved/ disturbed. Further, the Project site is not a recognized wildlife corridor, thus, site development would not impede fish or wildlife movement. Notwithstanding, the Project would result in removal of ornamental vegetation (i.e., 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 (CFGC).

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 CFGC extends protection to non-migratory birds identified as resident game birds (CFGC §3500) and any birds in the orders Falconiformes or Strigiformes (birds-of-prey) (CFGC §3503). The on-site trees and vegetation could provide suitable nesting habitat for birds. To address potential impacts to migratory birds, the Project would be subject to compliance with Mitigation Measure (MM) BIO-1, which addresses construction activities within the nesting season. Following compliance with

MM BIO-1, the Project's potential impacts to nesting migratory birds would be less than significant.

MM 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 sage, nest location, its sensitivity to disturbance, and intensity and duration of the disturbance activity.

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

No Impact. GMC §13.60.080 requires a Trimming Permit, Tree Removal Permit, and/or a Tree Planting Permit for cutting, trimming, pruning, planting, removing, injuring or interfering with any tree, shrub or plant upon any Street or Public Place of the City. As discussed above, the Project would involve removal of trees, however, this would occur entirely within the Project site. Therefore, the Project would not conflict with GMC §13.60.080, 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.

4.5 Cultural Resources

This Section is based on the *Cultural Resources Report* (BCR Consulting LLC, April 2019), which is included in its entirety in **Appendix B1: Cultural Resources Assessment** and *Assembly Bill 52 and Senate Bill 18 Communications,* which is included in its entirety in **Appendix B2: 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 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	

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. On March 27, 2019, a records search was conducted at the South-Central Coastal Information Center at California State University, Fullerton. This archival research reviewed the status of all recorded historic and prehistoric cultural resources, and survey and excavation reports completed within 1.0 mile of the Project site. Additional resources reviewed included the National Register, the California Register, and documents and inventories published by the California Office of Historic Preservation. Additional research was performed through records of the General Land Office Maintained by the Bureau of Land Management, the Los Angeles County Assessor, the Los Angeles County Archives, and various Internet resources. The records search revealed that 39 previous cultural resources studies have taken place, and seven cultural resources have been recorded within 1.0 mile of the Project site. None of the previous studies has assessed the Project site, and no cultural resources have been previously recorded within its boundaries.

An intensive-level cultural resources field survey of the Project site was conducted on March 19, 2019. Cultural resources were recorded on Department of Parks and Recreation (DPR) 523 forms; see **Appendix B1**. Digital photographs were taken at various points within the Project site. During the field survey, one historic-period industrial building was identified within the Project site boundaries. Properties eligible for listing in the California Register and subject to

review under CEQA are those meeting the criteria for listing in the California Register, or designation under a local ordinance. The on-site historic-period building is not recommended eligible for the California Register of Historical Resources (California Register), as it does not meet the criteria for listing. As such this building is not recommended a "historical resource" under CEQA. It does not warrant further consideration. Therefore, the 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 With Mitigation Incorporated. No cultural resources were identified within the Project site from the records search, Sacred Lands File (SLF) search, and pedestrian survey. Seven cultural resources have been recorded within one-mile of the Project site, but none have been previously recorded within its boundaries. The Project site has been previously disturbed by past development and no archaeological resources have been recorded in the site vicinity. Thus, the Project site is considered to have low archaeological sensitivity. Notwithstanding, the potential exists for accidental discovery of archaeological resources during ground-disturbing activities. As discussed in Section 4.18: Tribal Cultural Resources, the City received a request for consultation pursuant to AB52 from the Gabrieleno Band of Mission Indians-Kizh Nation. In response to this request, the City engaged with the Gabrieleno Band of Mission Indians-Kizh Nation in consultation on the Project. As a result of the consultation, mitigation measures have been imposed to mitigate potential impacts to tribal cultural resources. Thus, to address potential impacts to archaeological resources that may be discovered during ground-disturbing activities, MMs TCR-1 and TCR-2 are recommended (see Section 4.18), which detail the appropriate steps in the event of accidental discovery of cultural resources during ground-disturbing activities. Following implementation of MMs TCR-1 and TCR-2, 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 dedicated 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 is not proximate to identified archaeological resources. 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. Notwithstanding, 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. HSC §§7050.5-7055 describe the general provisions for treatment of human remains. Specifically, HSC §7050.5 prescribes the requirements for the treatment of any human remains that are accidentally discovered during excavation of a site. HSC §7050.5 also

requires that all activities cease immediately, and a qualified archaeologist and Native American monitor be contacted immediately. As required by State law, 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. If human remains are found during excavation, excavation would be halted near the find and any area that is reasonably suspected to overlay adjacent remains shall remain undisturbed until the County Coroner has investigated, and appropriate recommendations have been made for treatment and disposition of the remains. Following compliance with the established regulatory framework (i.e., HSC §§7050.5-7055 and PRC §5097.98 and §5097.99), the Project's potential impacts concerning human remains would be less than significant, and no mitigation is required.

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

Impact Analysis

Background: Building Energy Conservation Standards

Energy conservation standards for new residential and nonresidential buildings were adopted by the California Energy Resources Conservation and Development Commission (now the California Energy Commission (CEC)) in June 1977 and are updated every three years (California Code of Regulations Title 24, Part 6). Title 24 requires the design of building shells and building components to conserve energy. The standards are updated periodically to allow for consideration and possible incorporation of new energy efficiency technologies and methods. On June 10, 2015, the CEC adopted the 2016 Building Energy Efficiency Standards, which went into effect on January 1, 2017.

The 2016 Standards improved upon the previous 2013 Standards for new construction of and additions and alterations to residential and nonresidential buildings. Under the 2016 Standards, residential buildings are 28 percent more energy-efficient and nonresidential buildings are 5 percent more energy efficient than under the 2013 Standards. Under the 2013 Standards, residential buildings are 25 percent more energy-efficient and nonresidential buildings are 30 percent more energy efficient than under the 2008, because of better windows, insulation, lighting, ventilation systems, and other features.

The California Green Building Standards Code (California Code of Regulations, Title 24, Part 11), commonly referred to as the CALGreen Code, is a statewide mandatory construction code that was developed and adopted by the California Building Standards Commission and the California Department of Housing and Community Development. CALGreen standards require new residential and commercial buildings to comply with mandatory measures under five topical areas: planning and design; energy efficiency; water efficiency and conservation; material conservation and resource efficiency; and environmental quality. CALGreen also provides voluntary measures (CALGreen Tier 1 and Tier 2) that local governments may adopt which encourage or require additional measures in the five topical areas.

Renewable Portfolio Standard

In 2002, California established its Renewable Portfolio Standard program[16] with the goal of increasing the annual percentage of renewable energy in the state's electricity mix by the equivalent of at least 1 percent of sales, with an aggregate total of 20 percent by 2017. The California Public Utilities Commission subsequently accelerated that goal to 2010 for retail sellers of electricity (*Public Utilities Code* §399.15(b)(1)). Then-Governor Schwarzenegger signed Executive Order S-14-08 in 2008, increasing the target to 33 percent renewable energy by 2020. In September 2009, then-Governor Schwarzenegger continued California's commitment to the Renewable Portfolio Standard by signing Executive Order S-21-09, which directs the CARB under its AB 32 authority to enact regulations to help the State meet its Renewable Portfolio Standard goal of 33 percent renewable energy by 2020. In September 2010, the CARB adopted its Renewable Electricity Standard regulations, which require all the state's load-serving entities to meet this target. In October 2015, then-Governor Brown signed into legislation Senate Bill 350, which requires retail sellers and publicly owned utilities to procure 50 percent of their electricity from eligible renewable energy resources by 2030. Signed in 2018, SB 100 revised the program's goal to achieve the 50 percent renewable resources target by December 31, 2026 and a 60 percent renewable resources target by December 31, 2030. SB 100 also established a further goal to have an electric grid that is entirely powered by clean energy by 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.

Impact Analysis

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

Less Than Significant Impact.

Electricity

Southern California Edison (SCE) provides electricity to the Project area. Electricity is currently used by the existing trucking warehouse on the Project site. The Project's electricity demand is expected to be served by existing SCE electrical facilities. Total electricity demand in SCE's service area is forecast to increase by approximately 12,000 GWh—or 12 billion kWh—between 2015 and 2026.[17] The Project's anticipated electricity demand (approximately 491,045 kWh per year) would represent an insignificant percent increase compared to the SCE service area's overall demand. It is noted that the Project's energy consumption is conservative given credit for the

[16] The Renewable Portfolio Standard is a flexible, market-driven policy to ensure that the public benefits of wind, solar, biomass, and geothermal energy continue to be realized as electricity markets become more competitive. The policy ensures that a minimum amount of renewable energy is included in the portfolio of electricity resources serving a state or country.

[17] California Energy Commission, *California Energy Demand 2018-2030 Revised Forecast, Figure 49 Historical and Projected Baseline Consumption SCE Planning Area*, April 2018.

existing land use that would be displaced has not been applied. Therefore, the projected electrical demand would not significantly impact SCE's level of service.

It is also noted that the Project design and materials would be subject to compliance with the 2016 Building Energy Efficiency Standards, which took effect on January 1, 2017. Prior to Building Permit issuance, the City of Gardena Building Division would review and verify that the Project plans demonstrate compliance with the current Building Energy Efficiency Standards. The Project would also be required to comply with CALGreen, which establishes planning and design standards for sustainable site development, energy efficiency (more than California Energy Code requirements), water conservation, material conservation, and internal air contaminants.

Natural Gas

Southern California Gas Company (SoCalGas) provides natural gas service to the Project area. Natural gas is currently used by the existing trucking warehouse on the Project site. The Project's natural gas demand is expected to be adequately served by existing SoCalGas facilities. From 2018 to 2035, residential demand in the SoCalGas Service Area is expected to decline from 236 billion cubic feet (bcf) to 186 Bcf, while supplies remain constant at 3.775 billion cubic feet per day[18] (bcfd) from 2015 through 2035.[19] The Project's anticipated natural gas demand (approximately 1,078,980 cubic feet per year) would represent a nominal percentage of overall demand in SoCalGas' service area. It is noted that the Project's natural gas consumption is conservative given credit for the existing land use that would be displaced has not been applied. 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 would depend on the type and number of trips, VMT, 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/gasoline. The use of energy resources by these vehicles would fluctuate according to the construction phase and would be temporary. Most construction equipment during demolition and grading would be gas- 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. Therefore, impacts would not be significant.

During operations, energy consumption would be associated with resident and visitor vehicle trips, delivery truck trips, and maintenance and repair crew trips. The Project is an infill residential development project near existing services, adjacent to existing residential development, near

[18] 1 bcfd is equivalent to about 1.03 billion kBTU.

[19] California Gas and Electric Utilities, *2018 California Gas Report, Southern California Gas Company Annual Gas Supply 2018-2035 page 66*, 2018.

public transportation access, and near the I-405, I-110, and SR-91, reducing the need to travel long distances to a major highway and services. 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 of existing facilities.

The gasoline and diesel fuel associated with on-road vehicular trips is calculated based on total VMT calculated for the analyses within Sections 4.3 and 4.8. The total gasoline and diesel fuel associated with on-road trips would be approximately 82,023 gallons per year and 14,840 gallons per year, respectively. Los Angeles County annual gasoline fuel use in 2018 was 3,868,517,088 gallons and diesel fuel use was 519,517,409 gallons.[20] Expected Project operational use of gasoline and diesel would represent 0.002 percent of current gasoline use and 0.003 percent of current diesel use in the County. None of the projected energy uses exceed one percent of their corresponding County use. It is noted that the Project's fuel consumption is conservative given credit for the existing land use that would be displaced has not been applied. Project operations would not substantially affect existing energy or fuel supplies or resources. The Project would comply with applicable energy standards and new capacity would not be required. Fuel consumption associated with vehicle trips generated by the proposed Project would not be considered inefficient, wasteful, or unnecessary. Impacts would be 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?

Less Than Significant Impact. Project design and operations would be subject to compliance with State Building Energy Efficiency Standards, appliance efficiency regulations, and green building standards. Project development would not cause inefficient, wasteful and unnecessary energy consumption, and no adverse impact would occur. The City of Gardena adopted an Energy Efficiency Climate Action Plan in 2015 to help reduce energy consumption and GHG emissions to become a more sustainable community and meet AB 32 goals. The Energy Efficiency Climate Action Plan outlines various municipal measures to achieve the City's long-term vision. The Project would not conflict with or obstruct implementation of the City's Energy Efficiency Climate Action Plan. Project impacts would be less than significant, and no mitigation is required.

SCAG's 2016–2040 *Regional Transportation Plan/Sustainable Communities Strategy* (RTP/SCS) establishes 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 AB 32 target date and EOs 5-03-05 and B-30-15 post-2020 GHG reduction goals. The Project is consistent with regional strategies to reduce passenger VMT (and thereby reduce transportation energy consumption). The proposed Project is within a major employment center and is proximate to several major employers. Transit stops along Artesia Boulevard connect the Project site to the remainder of the City and neighboring cities. Increasing residential land uses near major employment centers is a key strategy to reducing regional VMT. Therefore, in addition to being an efficient infill

[20] California Air Resources Board, EMFAC2017.

development, the Project would be consistent with regional goals to reduce trips and VMT by locating the Project adjacent to other uses, which reduces vehicle trip lengths. The Project would not conflict with RTP/SCS state goals. Therefore, the Project would not interfere with SCAG's ability to achieve the region's post-2020 mobile source GHG reduction targets outlined in the 2016 RTP/SCS. Project impacts would be less than significant, and no mitigation is required.

4.7 Geology and Soils

This Section is based on the *Updated Geotechnical and Infiltration Evaluation* (GeoTek, September 2018) (Geotechnical Evaluation), which is included in its entirety in **Appendix C1: Geotechnical and Infiltration Evaluation**. The Geotechnical Evaluation was reviewed the City of Gardena Building Official and deemed adequate; see **Appendix C2: Gardena Building Division Preliminary Review of Stormwater and Hydrology** (March 11, 2019).

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 waste water disposal systems where sewers are not available for the disposal of waste water?				X

Environmental Issue	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
f) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?			X	

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. The Act's main purpose is to prevent 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 (AP) 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 proposed Project site is not located within an Alquist-Priolo Earthquake Fault Zone.[21] Additionally, no evidence exists of a known fault. Therefore, the Project would not expose people or structures to adverse effects involving rupture of a known earthquake fault, and no mitigation is required.

4.7aii 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. The City is located between several active fault zones including the Compton Thrust Fault, Newport-Inglewood-Rose Canyon Fault Zone, Charnock Fault, and Los Alamitos Fault.[22] The closest zoned faults are the Newport-Inglewood Fault zone, located approximately 3.0 miles northeast of the Project site. Thus, the Project site is in an area of high regional seismicity. Ground shaking originating from earthquakes along active faults in the region is expected to induce lower horizontal accelerations due to smaller anticipated earthquakes and/ or greater distances to other faults. The region has experienced shaking from several earthquakes recorded back to 1812. The nearest large historic earthquake is the Long Beach Earthquake that

[21] California Department of Conservation. (2015). Earthquake Zones Required Investigation Torrance Quadrangle. Retrieved from http://gmw.consrv.ca.gov/SHP/EZRIM/Maps/TORRANCE_EZRIM.pdf

[22] California Department of Conservation. (2015). CGS Information Warehouse: Regulatory Maps. Retrieved from http://maps.conservation.ca.gov/cgs/informationwarehouse/index.html?map=regulatorymaps.

occurred in 1933, the epicenter of which is approximately 9.61 miles southeast of the Project site. Historic earthquakes with magnitudes of greater than or equal to 6.0 and have been epicentered within approximately 50 miles of the Project site.

The faults described above could cause moderate to intense ground shaking during the lifetime of the proposed Project. Additionally, the Project site has experienced earthquake-induced ground shaking in the past and can be expected to experience further shaking in the future. Therefore, Project implementation could expose people or structures to potential adverse effects involving strong seismic ground shaking. The intensity of ground shaking on the Project site would depend upon the earthquake's magnitude, distance to the epicenter, and geology of the area between the Project site and epicenter. Regulatory controls to address potential seismic hazards would be imposed on the Project through the permitting process. Pursuant to GMC Chapter 15.04, the City has adopted the 2016 California Building Standards Code (CBSC), subject to certain amendments and changes, including those that address seismic resistance. CBSC design standards correspond to the level of seismic risk in a given location and are intended primarily to protect public safety and secondly to minimize property damage. The Project would be subject to compliance with all applicable regulations in the most recently published CBSC (as amended by GMC Chapter 15.04), which specifies design requirements to mitigate the effects of potential earthquake hazards. Moreover, the Geotechnical Evaluation evaluated various geologic and seismic hazards (i.e., liquefaction, seismically-induced settlement, landslides, slope instabilities, seiche, and tsunami) based on site-specific parameters. Geotechnical Evaluation (**Appendix C1**) Chapter 6.00 makes preliminary recommendations concerning seismic design parameters, foundations, slabs, and general earthwork and grading, among other factors. The Geotechnical Investigation concludes that the Project appears feasible from a geotechnical standpoint. The Gardena Building Services Division would review construction plans for compliance with the GMC/CBSC and the Geotechnical Evaluation's recommendations. Following compliance with standard engineering practices and design criteria, and the established regulatory framework (i.e., GMC and CBSC), which would be verified through the City's construction plan review process, the Project's potential impacts concerning exposure of people or structures to potential adverse effects involving strong seismic ground shaking and secondary seismic hazards would be less than significant, and no mitigation is required.

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. Liquefaction is a phenomenon where 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. For liquefaction to occur, three criteria must be met: underlying loose, coarse-grained (sandy) soils, a groundwater depth of less than approximately 50 feet, and a potential for seismic shaking from nearby large-magnitude earthquakes.

According to the California Geological Survey's Earthquake Zones of Required Investigation Torrance Quadrangle Map, liquefaction has the potential to occur north of the Project site, near Dominguez Channel, but is not shown to occur on the Project site.[23] This is further substantiated by GGP Safety Element Figure PS-2, *Public Safety Plan*. Additionally, depth to groundwater in the Project site area is approximately 30 feet. The logs of the deep borings indicate that mostly clayey soils, which are typically non-liquefiable, are presented below 30 feet. The cited logs also showed lesser layers with sandy soils at the referenced depths. High blow counts were recorded in these granular units;[24] thus, they are considered to not be prone to liquefaction. Based on these conditions, the liquefaction hazard potential at the Project site is negligible. Therefore, the Project's potential impacts concerning exposure of people or structures to potential adverse effects involving liquefaction would be less than significant, and no mitigation is required.

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. According to the California Geological Survey's Earthquake Zones of Required Investigation Torrance Quadrangle Map, the site does not lie in a landslide hazard zone.[25] Since the site is relatively flat and not within a landslide hazard zone, earthquake-induced landsliding would not be a hazard to the proposed development. Therefore, the Project would not directly or indirectly cause potential adverse effects involving landslides, 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 Project site is relatively flat, and its geology is composed of artificial fills with thicknesses ranging between 2.0 and 4.0 feet. Given the site's topography, geology, and historic uses, the loss of topsoil is low. Grading and earthwork activities during 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 Response 4.9a. GMC §8.70.110.B.1 specifies that no Grading Permit shall be issued to construction projects that disturb 1.0 or more acres of soil without obtaining a *General Construction Activity Stormwater Permit* (GCASWP) from the State Water Resources Control Board. Further, although the site's effective imperviousness would slightly decrease from 90 to 86 percent, an infiltration system is proposed to collect stormwater runoff and conduct it into

[23] California Department of Conservation. (2015). Earthquake Zones Required Investigation Torrance Quadrangle. Retrieved from http://gmw.consrv.ca.gov/SHP/EZRIM/Maps/TORRANCE_EZRIM.pdf.ic

[24] Soil consistency is determined by a "blow count" reading, which measures soil density as generally measured by a standard penetrometer test (SPT).

[25] Ibid.

permeable soils beneath the site, thus, minimizing soil erosion and loss of topsoil. Following compliance with the established regulatory framework (NPDES and GMC), the Project's potential impacts concerning soil erosion and loss of topsoil would be 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 Response 4.7aiii) or landslides (see Response 4.7aiv). The Geotechnical Evaluation did not identify a potential for lateral spreading or collapse. The Geotechnical Evaluation concluded that subsidence of up to 0.1-foot could occur. The Geotechnical Evaluation also concluded the near surface site soils tested were found to have a "low" expansion potential when tested and classified in accordance with ASTM D 4829. In addition, the surficial site soils tested were found to have a "medium" potential for expansion. The Gardena Building Services Division would review construction plans for compliance with the GMC/CBSC and the Geotechnical Evaluation's recommendations, including those concerning subsidence and expansive soils. Therefore, the potential impacts concerning subsidence and expansive soils would be less than significant, and no mitigation is required.

4.7e Would the project have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water?

No Impact. Sewers would be available for disposal of Project generated wastewater; see Responses 4.19aii and 4.19aiii. The proposed Project would not utilize septic tanks or alternative wastewater disposal systems. Therefore, no impact would occur in this regard, 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 Impact. Paleontological resources are the fossilized remains of organisms from prehistoric environments found in geologic strata. These resources are valued for the information they yield about the earth's history and its past ecological settings. The potential for fossil occurrence depends on the rock type exposed at the surface in a given area. Previous construction-related excavation on the Project site has disturbed sediments beyond depths at which buried prehistoric cultural resources are likely. However, to address potential impacts to paleontological resources that may be discovered during ground-disturbing activities, the City imposes Condition of Approval (COA) GEO-1, which details the appropriate steps should

paleontological resources be encountered during ground-disturbing activities. Following compliance with COA GEO-1, the Project's potential impacts to a unique paleontological resource/site or geologic feature would be reduced to less than significant.

COA GEO-1 **Paleontological Resources.** For ground disturbances greater than 3.0 feet where sediments are known to produce significant fossil discoveries, prior to ground-disturbing activities, field personnel shall be alerted to the possibility of buried paleontological resources. If fossils or fossil bearing deposits are encountered during ground-disturbing activities, work within a 100-foot radius of the find shall halt and a professional vertebrate paleontologist shall be contacted immediately to evaluate the find. The paleontologist shall have the authority to stop or divert construction, as necessary. Documentation and treatment of the discovery shall occur in accordance with Society of Vertebrate Paleontology standards. The significance of the find shall be evaluated pursuant to the State CEQA Guidelines. If the discovery proves to be significant, before construction activities resume at the location of the find, additional work such as data recovery excavation may be warranted, as deemed necessary by the paleontologist.

4.8 Greenhouse Gas Emissions

This Section is based on the Greenhouse Gas Emissions Assessment (Kimley-Horn, May 2019), which is included in its entirety in **Appendix D: Greenhouse Gas Emissions Assessment**.

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	

City of Gardena Energy Efficiency Climate Action Plan

The City and the South Bay Cities Council of Governments has also prepared a Climate Action Plan (CAP) (2017) to Guide the City of Gardena toward a more sustainable future. The goal of the CAP is to reduce GHG emissions within the City. The City's CAP serves as a guide for action by setting GHG emission reduction goals and establishing strategies and policy to achieve desired outcomes over the next 20 years. The CAP outlines various municipal measures that encourage reductions in the following categories: land use and transportation, energy efficiency, solid waste, urban greening, and energy generation and storage. The CAP maintains the reduction targets established in the Energy Efficiency Climate Action Plan (EECAP). **Table 4.8-1: Description of Greenhouse Gases** provides a description of terms used in the analysis.

TABLE 4.8-1: DESCRIPTION OF GREENHOUSE GASES

Greenhouse Gas	Description
Carbon Dioxide (CO_2)	CO_2 is a colorless, odorless gas that is emitted naturally and through human activities. Natural sources include decomposition of dead organic matter; respiration of bacteria, plants, animals, and fungus; evaporation from oceans; and volcanic outgassing. Anthropogenic sources are from burning coal, oil, natural gas, and wood. The largest source of CO_2 emissions globally is the combustion of fossil fuels such as coal, oil, and gas in power plants, automobiles, and industrial facilities. The atmospheric lifetime of CO_2 is variable because it is readily exchanged in the atmosphere. CO_2 is the most widely emitted GHG and is the reference gas (Global Warming Potential of 1) for determining Global Warming Potentials for other GHGs.
Nitrous Oxide (N_2O)	N_2O is largely attributable to agricultural practices and soil management. Primary human-related sources of N_2O include agricultural soil management, sewage treatment, combustion of fossil fuels, and adipic and nitric acid production. N_2O is produced from biological sources in soil and water,

TABLE 4.8-1: DESCRIPTION OF GREENHOUSE GASES	
Greenhouse Gas	**Description**
	particularly microbial action in wet tropical forests. The atmospheric lifetime of N_2O is approximately 120 years. The Global Warming Potential of N_2O is 298.
Methane (CH_4)	CH_4, a highly potent GHG, primarily results from off-gassing (the release of chemicals from nonmetallic substances under ambient or greater pressure conditions) and is largely associated with agricultural practices and landfills. Methane is the major component of natural gas, approximately 87 percent by volume. Human-related sources include fossil fuel production, animal husbandry, rice cultivation, biomass burning, and waste management. Natural sources of CH_4 include wetlands, gas hydrates, termites, oceans, freshwater bodies, non-wetland soils, and wildfires. The atmospheric lifetime of CH_4 is approximately 12 years and the Global Warming Potential is 25.
Hydrofluorocarbons (HFCs)	HFCs are typically used as refrigerants for both stationary refrigeration and mobile air conditioning. The use of HFCs for cooling and foam blowing is increasing, as the continued phase out of CFCs and HCFCs gains momentum. The 100-year Global Warming Potential of HFCs range from 124 for HFC-152 to 14,800 for HFC-23.
Perfluorocarbons (PFCs)	PFCs have stable molecular structures and only break down by ultraviolet rays approximately 60 kilometers above Earth's surface. Because of this, they have long lifetimes, between 10,000 and 50,000 years. Two main sources of PFCs are primary aluminum production and semiconductor manufacturing. Global Warming Potentials range from 6,500 to 9,200.
Chlorofluorocarbons (CFCs)	CFCs are gases formed synthetically by replacing all hydrogen atoms in methane or ethane with chlorine and/or fluorine atoms. They are nontoxic, nonflammable, insoluble, and chemically unreactive in the troposphere (the level of air at the earth's surface). CFCs were synthesized in 1928 for use as refrigerants, aerosol propellants, and cleaning solvents. The Montreal Protocol on Substances that Deplete the Ozone Layer prohibited their production in 1987. Global Warming Potentials for CFCs range from 3,800 to 14,400.
Sulfur Hexafluoride (SF_6)	SF_6 is an inorganic, odorless, colorless, and nontoxic, nonflammable gas. It has a lifetime of 3,200 years. This gas is manmade and used for insulation in electric power transmission equipment, in the magnesium industry, in semiconductor manufacturing, and as a tracer gas. The Global Warming Potential of SF_6 is 23,900.
Hydrochlorofluorocarbons (HCFCs)	HCFCs are solvents, similar in use and chemical composition to CFCs. The main uses of HCFCs are for refrigerant products and air conditioning systems. As part of the Montreal Protocol, HCFCs are subject to a consumption cap and gradual phase out. The United States is scheduled to achieve a 100 percent reduction to the cap by 2030. The 100-year Global Warming Potentials of HCFCs range from 90 for HCFC-123 to 1,800 for HCFC-142b.
Nitrogen Trifluoride (NF_3)	NF_3 was added to Health and Safety Code §38505(g)(7) as a GHG of concern. This gas is used in electronics manufacture for semiconductors and liquid crystal displays. It has a high global warming potential of 17,200.

Source: Compiled from: USEPA, *Overview of Greenhouse Gases*, April 11, 2018 (https://www.epa.gov/ghgemissions/overview-greenhouse-gases); USEPA, *Inventory of U.S. Greenhouse Gas Emissions and Sinks: 1990-2016*, 2018; Intergovernmental Panel on Climate Change, *Climate Change 2007: The Physical Science Basis*, 2007; National Research Council, Advancing the Science of Climate Change, 2010; USEPA, *Methane and Nitrous Oxide Emission from Natural Sources*, April 2010.

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.

Short-Term Construction Greenhouse Gas Emissions

The proposed Project would result in direct GHG emissions from construction-related activities. The approximate daily GHG emissions generated by construction equipment utilized to build the proposed Project are included in **Table 4.8-2: Construction-Related Greenhouse Gas Emissions**.

TABLE 4.8-2: CONSTRUCTION-RELATED GREENHOUSE GAS EMISSIONS	
Category	**$MTCO_2e$**
Total Construction Emissions	889
30-Year Amortized Construction	30
Source: CalEEMod version 2016.3.2; see **Appendix A** for model outputs.	

As shown in **Table 4.8-2**, Project construction-related activities would generate approximately 889 $MTCO_2e$[26] of GHG emissions over the course of construction. Construction GHG emissions are typically summed and amortized over the Project's lifetime (assumed to be 30 years), then added to the operational emissions.[27] The amortized Project emissions would be 30 $MTCO_2e$ per year. Once construction is complete, the generation of construction-related GHG emissions would cease.

Long-Term Operational Greenhouse Gas Emissions

Operational or long-term emissions would occur over the proposed Project's life. The Project's operational GHG emissions would result from direct emissions such as Project-generated vehicular traffic, on-site combustion of natural gas, and operation of any landscaping equipment. Operational GHG emissions would also result from indirect sources, such as off-site generation of electrical power, the energy required to convey water to the Project site and wastewater from the Project site, the emissions associated with solid waste generated from the Project site, and any fugitive refrigerants from air conditioning or refrigerators. The Project's total operational GHG emissions are summarized in **Table 4.8-3: Project Greenhouse Gas Emissions**. As shown in **Table 4.8-3**, Project operational GHG emissions would total approximately 1,122 $MTCO_2e$ annually, and combined with construction-related GHG emissions, would total approximately 1,152 $MTCO_2e$ annually.

[26] Metric tons of carbon dioxide equivalent or MTCO2e is the unit of measurement used. The unit "CO2e" represents an amount of a GHG whose atmospheric impact has been standardized to that of one-unit mass of carbon dioxide (CO2), based on the gas' global warming potential (GWP). Tool formulas convert standard metrics for electricity, green energy, fuel use, chemical use, water use, and materials management into MTCO2e.

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

Table 4.8-3 indicates that most of the Project's emissions (approximately 91 percent) would be from energy and mobile sources. As noted above, energy and mobile sources are targeted by statewide measures such as continued implementation of the Renewable Portfolio Standard (the target is now set at 60 percent renewables by 2030) and extension of the Cap and Trade program (requires reductions from industrial sources, energy generation, and fossil fuels). The Cap and Trade program covers approximately 85 percent of California's GHG emissions as of January 2015. The statewide cap for GHG emissions from the capped sectors (i.e., electricity generation, industrial sources, petroleum refining, and cement production) began in 2013 and will decline approximately three percent each year, achieving GHG emission reductions throughout the program's duration. The passage of AB 398 in July 2017 extended the Cap and Trade program's duration from 2020 to 2030.

Table 4.8-3 shows that the proposed Project would not exceed the SCAQMD's proposed GHG threshold of 3,000 $MTCO_2e$ per year.[28] In addition, with continued implementation of various statewide measures, the Project's operational energy and mobile source emissions (approximately 91 percent of total Project emission) would continue to decline in the future. Project-related GHG emissions would be less than significant, and no mitigation is required.

TABLE 4.8-3: PROJECT GREENHOUSE GAS EMISSIONS

Emissions Source	$MTCO_2e$ per Year
Construction Amortized Over 30 Years	30
Area Source	2
Energy	214
Mobile	839
Waste	13
Water and Wastewater	54
Total	1,152
SCAQMD Project Threshold	3,000
Exceeds Threshold?	No

Source: CalEEMod version 2016.3.2; see **Appendix A** for model outputs.

[28] On September 28, 2010, air quality experts serving on the SCAQMD GHG CEQA Significance Threshold Stakeholder Working Group recommended an interim screening level numeric bright-line threshold of 3,000 metric tons of CO2e annually. The Working Group was formed to assist the SCAQMD's efforts to develop a GHG significance threshold and is composed of a wide variety of stakeholders including the State Office of Planning and Research (OPR), CARB, the Attorney General's Office, a variety of city and county planning departments. The numeric bright line and efficiency-based thresholds were developed to be consistent with CEQA requirements for developing significance thresholds, are supported by substantial evidence, and provide guidance to CEQA practitioners and lead agencies for determining whether GHG emissions from a proposed project are significant.

4.8b Would the project conflict with applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases?

Less Than Significant Impact. See **Appendix D** for a detailed discussion concerning GHG-related plans, policies, and regulations.

In 2015, the City of Gardena adopted the EECAP to improve energy efficiency and reduce GHG emissions. The City also adopted a CAP in 2017. To develop this EECAP, a GHG emissions inventory was conducted to determine baseline GHG emissions from the community and from municipal operations for calendar year 2005 and 2012. A forecast was made of business-as-usual emissions in the absence of any emissions reduction actions. This forecast was then adjusted to account for the emissions reduction expected from statewide policies. The 2017 CAP uses the same inventories and reduction targets. To meet the City's GHG reductions target, the City would implement the additional local energy efficiency and GHG reduction measures described in the EECAP and CAP. Reaching the emissions reduction goals requires that residents, businesses, and City government work together.

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 California Building Standards Code Title 24 – Energy Efficiency Standards. Because Title 24 standards require energy conservation features in new construction (e.g., high- efficiency lighting, high-efficiency heating, ventilating, and air-conditioning (HVAC) systems, thermal insulation, double-glazed windows, water-conserving plumbing fixtures), they indirectly regulate and reduce GHG emissions. California's Building Energy Efficiency Standards are updated on an approximately three-year cycle. The 2016 standards improved upon the 2013 standards for new construction of, and additions and alterations to, residential, commercial, and industrial buildings. The 2016 standards went into effect on January 1, 2017.

The Project proposes to incorporate energy efficient design features in compliance with Title 24 and CALGreen standards that are consistent with the EECAP's efficiency measures. Additionally, the Project is an infill development within an urbanized/developed area and would generate GHG emissions (1,152 $MTCO_2e$ per year) well below SCAQMD thresholds.

As noted above, approximately 91 percent of the Project's emissions are from energy and mobile sources, although, these emissions estimates are conservative based on the factors outlined below. It is noted that the City has no control over vehicle emissions (approximately 73 percent of the Project's total emissions).

- The Project would result in 620 average daily vehicle trips (ADT),[29] which is a conservative trip generation estimate given trip credits for the existing land uses that would be displaced have not been applied. When trip credits for the existing trucking warehouse are applied to the Project's trip generation estimates, the Project's net new trips would

[29] **Appendix H: Trip Generation Analysis**

be offset, with proportionate offsets in mobile source emissions. Notwithstanding, for a conservative approach, this analysis assumes a traffic increase of 620 ADT.

- Project emissions would be further reduced by implementation of the 2017 Scoping Plan measures. These emissions would decline in the future due to statewide measures including the reduction in fuels' carbon content, CARB's advanced clean car program, CARB's mobile source strategy, fuel efficiency standards, cleaner technology, and fleet turnover. SCAG's 2016 RTP/SCS is also expected to help California reach its GHG reduction goals, with reductions in per capita transportation emissions of 9 percent by 2020 and 16 percent by 2035.[30] The Project is an infill development project near large employment areas, thereby potentially reducing the need to travel long distances for some residents and reducing associated GHG emissions.[31]

Concerning Executive Order S-3-05's 2050 goals, it is presently not possible to quantify the emissions savings from future regulatory measures, as they have not yet been developed. Nevertheless, it can be anticipated that Project operations would be subject to compliance with all applicable measures that State lawmakers have enacted and that would lead to an 80 percent reduction below 1990 levels by 2050.

The proposed Project demonstrates consistency with EECAP/CAP goals, measures, and emission reduction targets and would not conflict with any applicable plan, policy, or regulation of an agency adopted to reduce GHG emissions, including Title 24, AB 32, and SB 32. Therefore, Project impacts would be less than significant.

Cumulative Setting

Climate change is a global problem. GHGs are global pollutants, unlike criteria air pollutants and toxic air contaminants, which are pollutants of regional and local concern. Whereas pollutants with localized air quality effects have relatively short atmospheric lifetimes (approximately one day), GHGs have much longer atmospheric lifetimes of one year to several thousand years that allow them to be dispersed around the globe.

Cumulative Impacts and Mitigation Measures

It is generally the case that an individual project of the proposed Project's size and nature is of insufficient magnitude by itself to influence climate change or result in a substantial contribution to the global GHG inventory. GHG impacts are recognized as exclusively cumulative impacts; there are no non-cumulative GHG emission impacts from a climate change perspective. The additive effect of Project-related GHG emissions would not result in a reasonably foreseeable cumulatively considerable contribution to global climate change. In addition, the proposed

[30] Southern California Association of Governments, *Final 2016–2040 RTP/SCS*, April 2016, p. 153.

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

Project as well as other cumulative related projects, would be subject to all applicable regulatory requirements, which would further reduce GHG emissions. As shown in **Table 4.8-3**, the proposed Project's GHG emissions would be less than significant. Additionally, as discussed above, the Project would be consistent with the City's EECAP and CAP. As a result, the Project would not conflict with any GHG reduction plan. Therefore, the Project's cumulative contribution of GHG emissions would be less than significant and the Project's cumulative GHG impacts would also be less than cumulatively considerable.

4.9 Hazards and Hazardous Materials

This Section is based on the following documentation:

- Phase I Environmental Site Assessment Report (Phase I ESA) (Stantec Consulting Services, Inc., April 2016),
- Phase II Environmental Site Assessment (Phase II ESA) (Stantec Consulting Services, Inc., July 2016),
- Remedial Action Plan (RAP) (Stantec Consulting Services, Inc., June 27, 2019)[32]; and
- County of Los Angeles Fire Department July 26, 2019 Letter (LACFD ROADEX, 1515 West 178th Street, Gardena, California 90248 (SMU FILE #18-1126/RO0001744)).

These documents are included in their entirety in **Appendix E1: Phase I Environmental Site Assessment**, **Appendix E2: Phase II Environmental Site Assessment**, **Appendix E3: Remedial Action Plan**; and **Appendix E4: County of Los Angeles Fire Department Letter**.

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			X	

[32] While **Appendix E3** is labeled "Draft," it was approved by the Los Angeles County Fire Department ; see July 26, 2019 letter (**Appendix E4)**.

Environmental Issue	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?				
f) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?			X	
g) Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?				X

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. During demolition and construction, small quantities of potentially hazardous substances such as gasoline, diesel fuel, lubricants for machines, and other-petroleum-based products would be used on-site. Once operational, limited quantities of hazardous materials such as solvents, fertilizers, pesticides, and other materials used for regular household maintenance of buildings and landscaping would be utilized by homeowners within the Project. However, quantities of these materials would not be significant enough to pose a significant hazard to the public or the environment. Compliance with the established regulatory framework (including, among others, Department of Transportation provisions regulating the transport of hazardous materials) would minimize risks to the maximum extent practicable. Therefore, impacts concerning the Project's potential to create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials 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 Phase I ESA and Phase II ESA conclusions are included in the *Previous Subsurface Investigations and Remediation* Section below, as summarized in the RAP; see **Appendix E3**. As noted above, the Phase I ESA, Phase II ESA, and RAP are included in their entirety in **Appendix E1**, **Appendix E2**, and **Appendix E3**, respectively.

A property background, summary of previous subsurface investigations, and summary of the RAP are presented below. The RAP was prepared to address identified soil, soil vapor, and

groundwater impacts at the Project site. The RAP also includes a Soil Management Plan (SMP) that discusses the required procedures if soil contamination or underground structures of environmental significance are encountered during Project construction.

The County of Los Angeles Fire Department (LACFD) Site Mitigation Unit (SMU) requested the RAP based on assessment data provided to the LACFD for review. The RAP discusses a proposed plan of excavation and offsite disposal of petroleum-impacted soils above residential screening levels and presents a plan for confirmation soil sampling to verify the removal of the impacted soils to levels below the approved site cleanup goals. Additionally, the RAP presents a plan for implementation of soil vapor barriers beneath the proposed residential buildings to mitigate against soil vapor intrusion into these residential buildings.

Property Background

According to historical records, the Project site was used for agricultural purposes from at least 1928 through the late-1950s/early-1960s. Globe Illuminations Company (Globe), a manufacturer of light fixtures, reportedly developed and occupied the Project site from 1961 until it ceased operations in 1987. Specific commercial/industrial activities associated with Globe are unknown except that, according to environmental database records, they allegedly operated an oil/water separator and generated petroleum waste and cooling system wastewater. From 1987 through 2007, the Project site was occupied by multiple commercial/light industrial businesses including the following: Malco Company (1990); Ortho Mattress (1995); Cintek System, Inc (2001); and 99-Cent Store merchandise warehouse (2006). RoadEx has occupied the Project site since 2011.

Previous Subsurface Investigations and Remediation

Several rounds of investigation and remedial efforts have been performed at the Project site from 1990 through 2019. These remedial and assessment activities are discussed below for soils, soil vapor, and groundwater.

Past Soil Assessments

The past Phase I and II ESAs prepared by SECOR International, Inc. (SECOR) (currently Stantec) in 2004 reported that impacts to soil from various chlorinated solvents, including tetrachloroethylene (PCE), were detected in 1990 in an unpaved strip of land between the northern Property boundary and the existing building awning/canopy. As a result, Pomona Valley Environmental (PVE) performed a remedial excavation in this area in 1991. The excavation was reportedly performed and subsequently summarized in a PVE Closure Report. The PVE Closure Report indicated that 397.4 tons of soil was hauled offsite and reused offsite in paving materials. Six confirmation samples collected from within the resulting excavation reported mostly non-detect levels of total petroleum hydrocarbons (TPH) and volatile organic compounds (VOCs), except for the sample collected from the south wall below a trench that led into the unpaved area (near recent boring location HA-2). That sample reported PCE and trichloroethylene (TCE) in soil at 0.130 and 0.065 milligrams per kilograms (mg/kg), respectively. The results suggested that the soil impacts may have extended below the concrete slab of the rear truck maintenance area

that remains at the Project site today. PVE's Closure report recommended no further assessment or remedial action in this area.

As part of SECOR's 2004 Phase II ESA, additional assessment was performed in and around the excavation area due to the limited detection capabilities of laboratories in 1991 and because it was SECOR's position that the cleanup levels used by PVE were too high given the currently proposed use of the Project site as residential. SECOR's Phase II ESA included soil borings in various areas, and an evaluation of pesticides in soil related to former agricultural uses that occurred at the Project site prior to the existing development. The results of SECOR's Phase II ESA reported PCE, TCE, and xylenes in soil at the backfilled excavation area and near the flammables storage closet, but at concentrations well below USEPA Preliminary Remediation Goals (PRGs) – the agency thresholds at the time of the assessment. Pesticides were detected in only one sample at the Project site's northern portion, but at concentrations well below both past and present-day screening levels.

Based on an online review of the Project site on the ENVIROSTOR website, the Department of Toxic Substances Control (DTSC) opened a case file for the Project site in 2005 and subsequently referred it to the LACFD Site Mitigation Unit (SMU). In 2007, an additional Phase II ESA was performed by Terracon with oversight from the LACFD. The assessment included Project site-wide sampling on a 100-foot grid for VOCs in soil vapor and shallow soil sampling for California Code of Regulations (CCR), Title 22 metals and organochlorine pesticides. The assessment's soil vapor results are discussed in the *Past Soil Vapor Assessments* Section below. Organochlorine pesticide and metals concentrations from this assessment were reported below residential use criteria.

As part of a separate property assessment for redevelopment as residential use, Stantec performed additional assessments in April and May 2016. Soil samples were collected at boring locations SV-11 through SV-17. No VOCs were detected in any soil samples collected during this investigation (i.e. results were "non-detect").

In October 2018, Stantec advanced four direct-push soil borings (SV-18 through SV-21/HP-4) and two shallow hand auger locations (HA-1 and HA-2) within the Project site, and three offsite soil borings HP-5, SV-22/HP-6, and SV-23/HP-7 at the easterly-adjacent property (i.e., 1487 West 178th Street). Soil borings HA-1 and HA-2 were advanced in the Project site's northern portion near the outfall of the two trenches observed by Stantec during the assessment. Soil borings SV-18 through SV-20 were located within the Project site building, and soil boring SV-21/HP-4 was located at the Project site's northern portion near the paper storage area. Select soil samples collected from onsite borings were analyzed for TPH, VOCs, and metals. Various VOCs were detected at locations from HA-2 at 5.0 feet below ground surface (bgs), while TPHd and TPHo were detected at 18,000 and 23,000 mg/kg, respectively. The 1.0-foot bgs soil sample collected from HA-1 reported no VOCs, and TPHd and TPHo at 420 and 1,200 mg/kg, respectively. All metals concentrations reported from these locations were within typical background levels, and not above typical residential screening levels.

A Vapor Intrusion Human Health Risk Assessment (VIHHRA) was prepared for the Project site in November 2018. The VIHHRA analyzed soil vapor data collected at the Project site from April 2016 through October 2018. That soil vapor data was used to evaluate a reasonable maximum exposure (RME) scenario on a point-by-point basis under the proposed future Project site use as residential. The soil vapor dataset is provided in **Appendix E3** Table 3. Six VOCs were detected at least once above the residential screening levels derived by dividing DTSC and California Regional Water Quality Control Board, San Francisco Bay Region (RWQCB SFBR) residential air screening levels by the currently proposed default soil vapor to indoor air attenuation factor of 0.03.

Assuming slab-on-grade construction and using model central tendency values for Qsoil and Qbuilding, the cumulative cancer risk (CR) estimates for samples collected at 5.0 feet bgs ranged from 2.3E-07 at SV-4 to 6.5E-05 at SV-13. Additionally, the cumulative CR estimates for samples collected at 15.0 feet bgs ranged from 1.3E-07 at SV-19 to 1.1E-05 at SV-12. None of the samples collected at 5.0 feet bgs or 15 feet bgs were estimated to be at or above the upper bound of the risk range (1E-04). Note that PCE was the primary contributor to the CR estimates. Although COPC concentrations are generally much higher at the 15-foot bgs interval, the differences result from model predicted (and confirmed through empirical measurement) attenuation of COPCs from a greater depth. The highest estimated potential cancer risks are associated with soil vapor samples collected at and near the existing warehouse building's northeast corner, extending to the eastern property line.

In March 2019, Stantec advanced nine soil borings (SB-1 through SB-9) at the Project site's northern portion. Shallow soil samples from SB-1 through SB-9 were analyzed for TPH and VOCs to characterize the lateral and vertical extent of possible petroleum impacts at the Project site's northern portion. Low concentrations of TPHg were detected in the 1.0-foot bgs and 3.0-foot bgs soil samples collected from boring SB-2, located at the outfall of a concrete-lined drain. The peak concentration of TPHg was reported at 8.4 mg/kg in the 1.0-foot bgs sample. No other TPHg detections were reported from any other soil samples collected during this investigation. Elevated TPHd and TPHo levels were reported in shallow soils collected from SB-1, SB-2, and SB-3. Peak TPHd and TPHo concentrations were reported at 2,800 mg/kg from the 5.0-foot bgs soil sample collected from boring SB-2, with cumulative TPHd and TPHo values in this sample reported at 5,600 mg/kg. All soil samples collected during this investigation with TPHd and TPHo detections have cumulative reported values exceeding LACFD's 1,000 mg/kg cleanup goal.

Trace concentrations of certain fuel related VOCs were detected in the 1.0-foot bgs and 5.0-foot bgs samples collected from SB-2. However, all of the detected VOC compounds were well below the USEPA Regional Screening Levels (RSLs) for residential use. (It is noted, a groundwater grab sample was collected at SB-2; see the Past Groundwater Assessment Section). No PCE or breakdown products were detected above laboratory reporting limits in any of the samples. PCBs were not detected in the shallow soil sample collected at SB-2, which was selected for analysis since any PCB impacts would be expected from a surficial release where the highest TPH was historically detected. However, no PCBs were detected above laboratory reporting limits. Shallow soil samples collected from 1.0-foot bgs from SB-1 and SB-3, in the unpaved strip of land north

of the automotive repair area, reported metals concentration to be within California's typical naturally occurring background levels.

Past Soil Vapor Assessments

Based on the ENVIROSTOR website, the DTSC opened a case file for the Project site in 2005 and subsequently referred it to the LACFD SMU. In 2007, Terracon performed an additional Phase II ESA with oversight from the LACFD. The assessment included Project site-wide sampling on a 100-foot grid for VOCs in soil vapor and shallow soil sampling for California Code of Regulations (CCR), Title 22 metals and organochlorine pesticides. Terracon's assessment identified limited chlorinated volatile organic compounds (CVOCs) impacts to soil vapor on the Project site and no organochlorine pesticide or metals impacts to soil above typical agency thresholds or screening levels. The detected CVOCs, namely PCE and TCE, were reported at concentrations below commercial soil screening levels and human health risk screening criteria concerning potential vapor intrusion from the subsurface to indoor air. The detected concentrations, however, were slightly above residential use human health risk screening criteria at several locations. As a result, the LACFD issued a closure letter for the Project site on May 17, 2007 under the condition that the Project site remained as commercial use.

As part of a separate Property assessment for redevelopment as residential use, Stantec performed additional assessments in April and May of 2016. These assessments included 17 soil vapor probes – some at 5.0 feet bgs, and some at 5.0 feet bgs and 15 feet bgs. Except for two sample locations, all of the 5.0-foot bgs soil vapor samples reported PCE above the DTSC Human and Ecological Risk Office (HERO), Note 3 residential soil screening levels and reached a maximum concentration of 68,000 micrograms per cubic meter (µg/m3) in sample SV-13. This data suggests that there is a Property source in the vicinity of SV-13, however, the assessment did not identify the actual source.

In October 2018, Stantec advanced four direct-push soil borings (SV-18 through SV-21/HP-4) and two shallow hand auger locations (HA-1 and HA-2) within the Project site, and three soil borings HP-5, SV-22/HP-6, and SV-23/HP-7 offsite at the easterly-adjacent property at 1487 West 178th Street. Soil vapor samples were collected from all locations advanced during this assessment with the exception of HA-1, HA-2, and HP-5. Various VOCs were detected in soil vapor samples collected on- and offsite. Namely, PCE, benzene, bromodichloromethane, and chloroform was reported in offsite soil vapor samples above commercial screening levels. These compounds, and additionally TCE, were also detected in select onsite soil vapor samples at concentrations exceeding commercial screening levels. It is understood that chloroform is a known lab contaminant, and also present in tap water as a disinfectant, and has been identified as likely source for the chloroform detections in soil vapor during this assessment.

Past Groundwater Assessments

As part of ongoing due diligence investigations, Stantec collected three grab groundwater samples from beneath the Project site in June of 2016. Impacts of PCE in groundwater were

detected at peak concentrations of 70 micrograms per liter (µg/L) in boring HP-1, in the area of the peak soil vapor concentrations at the Project site's northeast corner. At the Project site's south end directly across the street and down gradient from Bee Chemical, PCE was detected at 6.8 µg/L and 1,1-dichloroethene (1,1- DCE) was detected at 100 µg/L.

In December of 2017, Stantec installed and sampled three groundwater monitoring wells to further evaluate groundwater quality beneath the Project site and investigate whether the VOC concentrations detected in the groundwater grab sample from the southeast corner of the Project site was a result of migration from the Bee Chemical groundwater plume known to be offsite to the south of 178th Street. The groundwater sampling results indicated PCE concentrations in groundwater from well W-1, located at the Project site's northeast corner near former grab groundwater sample location HP-1. Similar to the 2016 groundwater sampling, the data collected from W-3, located at the Project site's southeast corner, hydraulically down/cross-gradient from the former Bee Chemical plant, reported additional chemicals TCE and DCE, indicating a distinctly different chemical make up between wells W-1 and W-3. Groundwater samples collected from well W-2, installed at the Project site's eastern portion between these two wells, was non-detect for all VOCs. Therefore, the data collected from this event indicated two separate and distinct groundwater plumes – one coming from the offsite property (former Bee Chemical) to the south of 178th Street and one sourced from a release at the Project site's northeast corner. Based on this interpretation, Stantec recommended to the LACFD that these two plumes be addressed separately. It was requested that the LACFD request further definition of the plume migrating from the offsite Bee Chemical property to be completed by that company.

To further assess the Project site, Stantec advanced four direct-push soil borings (SV-18 through SV-21/HP-4) and two shallow hand auger locations (HA-1 and HA-2) within the Project site, and three offsite soil borings HP-5, SV-22/HP-6, and SV-23/HP-7 at the easterly-adjacent property at 1487 West 178th Street, in October of 2018. The soil and soil vapor results of this investigation are discussed above in the Past Soil Assessments and Past Soil Vapor Assessments Sections, respectively. Grab groundwater samples were collected from onsite borings SV- 21/HP-4, and offsite borings SV-22/HP-6, SV-23/HP-7, and HP-5. Groundwater samples collected from on- and offsite reported TPHg, TPHd, and TPHo at concentrations below California maximum contaminant levels (MCLs). The VOCs PCE, TCE, and c-1,2-DCE were detected in offsite groundwater samples at concentrations exceeding MCLs. The VOCs PCE, TCE, and other degradation products were detected in onsite groundwater samples at concentrations exceeding MCLs.

Through correspondence with LACFD, Stantec determined that installation of an additional onsite well was required to evaluate Project site-specific groundwater flow direction. Therefore, a fourth well, W-4, was installed on the Project site in March 2019. Additionally, three offsite grab groundwater samples (HP-8, HP-9, and HP-10) were collected on the easterly-adjacent property, and a single grab groundwater sample (SB-5-GW) was collected at the Project site during this investigation. Onsite and offsite sampling events conducted to-date indicate that groundwater flow direction beneath the Project site is to the east. Analytical results of offsite groundwater

sampling show that the plume, with VOC concentrations above MCLs for drinking water, extends less than 300 feet east of the Project site boundary.

Based on Stantec's May 8, 2019 meeting with LACFD, it was concluded that the extent of groundwater impacts have been reasonably defined onsite and offsite down-gradient of the source at the site's northeast corner. It was also concluded that additional steps could presently be taken toward the proposed Project site redevelopment through submittal of a RAP to address TPH soil impacts onsite and mitigate soil vapor concentrations using vapor barriers with passive venting systems. Additionally, prior to RAP submittal, LACFD requested that a final groundwater monitoring event be performed.

Second quarter 2019 groundwater monitoring was performed at the Project site on May 14, 2019. Groundwater flow direction during this sampling event was calculated to be east-southeast at a gradient of 0.0025 feet per foot (ft/ft). PCE and TCE were reported at 8.7 and 1.9 µg/L, respectively, in well W-1, located at the Project site's northeast portion. The PCE concentration exceeds the California Maximum Contaminant Level (MCL) for this compound of 5.0 µg/L. Well W-2 reported levels of PCE and TCE at 4.7 and 1.7 µg/L, respectively. Well W-3 reported PCE at 9.4 ug/L and detected various other compounds at trace concentrations. PCE was reported in well W-4 at 0.89 µg/L. No other VOCS were reported above laboratory reporting limits in well W-4 (see **Appendix E3** Table 4).

Remedial Action Plan

Based on the data presented in the preceding sections concerning petroleum-impacted soil and VOC-impacted soil vapor, the Project could 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. The RAP, as detailed in **Appendix E3** Section 3.0 and as approved by the LACFD (see **Appendix E4**), presents the proposed remedial strategies to mitigate petroleum-impacted soil prior to Grading Permit issuance via excavation and offsite disposal, and to mitigate VOC-impacted soil vapor intrusion via the placement of vapor barriers beneath all future residential buildings.

Soil Impacts - Proposed Excavation and Cleanup Goals

The proposed petroleum and VOC cleanup objectives are based on future use of the Project site for residential purposes and for groundwater protection. The analytical results will be compared to LACFD's cleanup thresholds for comparison purposes during the assessment work performed at the Project site. The relevant thresholds are presented in **Appendix E3** Section 3.1.

Preliminary Activities

The RAP's proposed preliminary activities include updating the Project site-specific Health and Safety Plan (HASP) and the Underground Service Alert (USA). The HASP will describe the controls and procedures that will be implemented to minimize incidents, injury, and health risks associated with the excavation and exposure to chemicals of potential concern (COPCs). The

HASP will be prepared in accordance with Occupational Safety and Health Administration (OSHA) Hazardous Waste Operations Standards (29 CFR 1910.120 and CCR Title 8). The LACFD requires that the HASP be provided for SMU review prior to grading activities. Additionally, Stantec will update the existing USA ticket prior to the start of the planned excavation activities. The proposed preliminary activities are detailed in **Appendix E3** Section 3.1.1.

Remedial Excavation

Remedial excavation activities include performing air monitoring in accordance AQMD Rule 1166 Monitoring removing petroleum-impacted soil from the Project site via excavation where TPH has been documented to exceed the proposed site cleanup goals. The proposed remedial excavation is detailed in **Appendix E3** Section 3.1.2.

Confirmation Soil Sampling

After removal of petroleum-impacted soils to the proposed excavation depths and lateral limits, confirmation soil sampling will occur. All remedial excavations will be subject to confirmation soil sampling and analysis to confirm removal of impacted soils exceeds the proposed site cleanup goals outlined above in **Appendix E3** Section 3.1.

Dust Control and Waste Disposal

In addition to the preliminary, remedial excavation, and confirmation soil sampling activities described above, the RAP specifies the required dust control and waste disposal measures that must be implemented during grading.

Site Restoration and Backfill

The RAP requires that the excavation area remain open until the laboratory results of the confirmation sampling indicate that remedial objectives have been accomplished prior to approval to backfill. Backfilling of the excavations with clean soil derived from onsite or offsite sources will occur when the laboratory results confirm that all contaminants of concern are below the proposed Project site cleanup levels, and with approval by LACFD.

General Soil Management Approach

The Project would involve earth-moving activities of 50 cubic yards or more of contaminated soil, thus, would be subject to compliance with AQMD's Rule 1466: Control of Particulate Emissions from Soils with Toxic Air Contaminants. The purpose of Rule 1466 is to minimize off-site fugitive dust emissions from earth-moving activities at sites containing specific toxic air contaminants. Dust control measures must be established at designated clean-up sites or sites near sensitive receptors. In areas that contain applicable toxic air contaminants, the following activities are subject to Rule 1466: excavating, grading, handling, treating, stockpiling, transferring, and removing soil. In addition to notifying the SCAQMD, signage, continuous air monitoring, dust control measures, and recordkeeping are required.

Appendix E3 Section 5.0 details the RAP's proposed onsite soil management and excavation procedures (i.e., SMP), as well as the contingency procedures to be followed upon discovery of features that would be a potential source of contamination or contaminated soil.

While handling TPH-impacted soils during excavation, stockpiling, and loading operations, a monitoring program would be required to control impacted soil migration offsite via aerial suspension, stormwater run-off, or attachment to equipment leaving the Project site. **Appendix E3** Section 5.1 details the controls proposed to minimize the spread of impacted soil offsite and ensure community safety and compliance with City ordinances.

The LACFD requires that a stand-alone SMP be provided for SMU review prior to any grading activities.

Soil Vapor Impacts

In 2018, a Vapor Intrusion Human Health Risk Assessment (VIHHRA) was prepared for the Project site in The VIHHRA analyzed soil vapor data collected at the Project site from April 2016 through October 2018. That soil vapor data was used to evaluate a reasonable maximum exposure (RME) scenario on a point-by-point bases under the proposed future Project site use as residential. The soil vapor dataset is provided in **Appendix E3** Table 3. Six VOCs were detected at least once above the residential screening levels derived by dividing DTSC and USEPA RSLs for residential use by a conservative soil vapor to indoor air attenuation factor of 0.03. This conservative value was used to assist in making a risk management decision concerning mitigation of soil vapor at the Project site.

The cumulative cancer risk (CR) estimates for samples collected at 5.0 feet bgs ranged from 2.3E-07 at SV-4 to 6.5E-05 at SV-13. Additionally, the cumulative CR estimates for samples collected at 15 feet bgs ranged from 1.3E-07 at SV-19 to 1.1E-05 at SV-12. None of the samples collected at 5.0 feet bgs or 15 feet bgs were estimated to be at or above the upper bound of the risk range (1E-04). Note that PCE was the primary contributor to the CR estimates. Although concentrations of COPCs are generally much higher at a depth of fifteen-foot depth interval, the differences result from model predicted (and confirmed through empirical measurement) attenuation of COPCs from a greater depth. The highest estimated potential cancer risks are associated with soil vapor samples collected at and near the northeast corner of the existing warehouse building, extending to the eastern property line.

The estimates of potential vapor intrusion risk resulting from exposure to chemicals at 5.0 bgs and 15 feet bgs fall within a risk management range where further site characterization, mitigation, and/or remediation are typically recommended. The proposed risk management decision is to mitigate the Project site's soil vapor concentrations through engineering controls. The proposed vapor intrusion mitigation measures would consist of a gas membrane barrier and passive sub-slab soil vapor collection piping (i.e. sub-slab vapor barrier system) being installed below all proposed inhabitable structures. The proposed system would effectively mitigate transport of subsurface contaminants in the vapor phase to indoor air. Additionally, the RAP

requires that this system be constructed such that the passive system can be changed to an active system (i.e. an exhaust fan system connected to the sub-slab piping).

Based on the assessments completed to-date and the VIHHRA's results, Stantec concludes that the proposed vapor intrusion mitigation would address the vapor intrusion impacts. It is Stantec's understanding that LACFD will require that a deed restriction/notification be recorded on the Project site's title to properly notify the City and homeowners of the vapor barriers' presence and to prohibit their disturbance. Prior to Grading Permit issuance, the vapor intrusion control system design will be submitted to the LACFD.

Groundwater Impacts

The second quarter 2019 groundwater monitoring results, which are anticipated to be the final round of monitoring at the Project site prior to development, are consistent with the results of prior groundwater monitoring events, characterizing that VOC concentrations are slightly above MCLs, and groundwater flow direction is generally to the east. Based on the reported VOC concentrations in onsite monitoring wells, groundwater flow direction to the east, and down-gradient definition confirmed through offsite grab groundwater sampling, no further assessment of groundwater is recommended.

Prior to Project site redevelopment, all groundwater monitoring wells would be abandoned in accordance with State of California and County of Los Angeles well-abandonment regulations. All groundwater monitoring well abandonment activities will be submitted to the LACFD for approval.

FINAL REMEDIATION SUMMARY REPORT

Upon completion of the remedial excavation, a Soil Excavation Report (SER) would be required to document all activities completed onsite. The SER would describe how the excavation was completed to remove the petroleum-impacted soil.

Following SER submittal and filing the deed notification/restriction for the proposed vapor barrier mitigation system with the Los Angeles County Recorder, Stantec would request closure/no further action from the LACFD.

COUNTY OF LOS ANGELES FIRE DEPARTMENT LETTER – CONDITIONAL AND FINAL NO FURTHER ACTION LETTER

The LACFD SMU completed a review of the Draft RAP (Stantec, June 27, 2019). Based on this review, the LACFD granted an approval for implementation of the RAP at the Project site. The LACFD concluded that the onsite implementation of the field activities outlined in the RAP are anticipated to meet general expectations presented in applicable USEPA guidance, Cal-EPA guidance, and other applicable guidance/advisory documents. The SMU's approval includes the following:

1. The LACFD adheres to the proposed excavation cleanup goal levels noted in RAP Section 3.1 for TPH concentrations in soil of 1,000 mg/kg (which could present a nuisance in the upper 10.0 feet of soil) and the RWQCB TPH soil screening levels established to protect groundwater. In addition, the LACFD adheres to the DTSC Hero and USEPA RSLs for TPH concentrations in soil established to protect human health.

2. The RAP activities shall be adhered to as approved and implemented by August 30, 2019. Any significant deviation or change must be submitted in writing and written approval obtained by the LACFD, prior to implementation. Any phone notifications pertaining to deviation/change during "real time" implementation of RAP activities must be followed-up by written correspondence. Additionally, the LACFD must be notified at least three (3) working days prior to the implementation of RAP field activities at the site.

3. The two trenches located within the onsite truck maintenance/service area that are tributary to the northern unpaved strip of land be plugged or otherwise managed to eliminate any potential discharge from the trenches to the unpaved area (north of the building). The Applicant is required to provide in the Final Remediation Summary Report to LACFD a description and photos of the BMPs implemented for the trenches.

4. A stand-alone Soil Management Plan (SMP) and associated Health and Safety Plan (HASP) must be provided for SMU review prior to future requests for no further action and prior to any site-wide grading activities.

5. The LACFD's authority does not extend to the permitting and/or removal of any potential onsite clarifiers, which would be under the City's and Los Angeles County Department of Public Works, Environmental Programs Division's (LACoDPW-EPD) jurisdiction. However, SMU can oversee the assessment and cleanup of onsite contamination resultant from past clarifier use, if applicable. In addition, LACoDPW-EPD would have jurisdiction of underground storage tanks (USTs) in the event that USTs are encountered during onsite grading/development activities. The LARWQCB would have initial jurisdiction for UST associated releases, if any, that potentially threaten the groundwater underlying the site.

6. .The owner of properties with soil and vapor contaminant concentrations exceeding their associated State/Federal residential screening levels (after site cleanup activities or human health risk assessments) will have to provide documentation to LACFD of the filing of a Notice with the County Recorder to notify future buyer(s) and occupants of the existence of contaminated media on the site and of any associated mitigation measures.

CONCLUSION

Based on the data presented in the preceding sections concerning petroleum-impacted soil and VOC-impacted soil vapor, the Project could 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. The RAP discusses a proposed plan of excavation and offsite disposal of petroleum-impacted soils above residential screening levels and presents

a plan for confirmation soil sampling to verify the removal of the impacted soils to levels below the approved site cleanup goals. Additionally, the RAP presents a plan for implementation of soil vapor barriers beneath the proposed residential buildings to mitigate against soil vapor intrusion into these residential buildings. MM HH-1 specifies that the City shall not issue any permits except as may be required for the excavation and removal of soil and building demolition until the LACFD issues a Conditional No Further Action (Conditional NFA) letter and that the City shall not issue any Building Permit for the Project until it receives a copy of the LACFD Final NFA letter. Therefore, with mitigation, the Project's potential impact concerning the creation of a hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment would be less than significant.

Mitigation Measures

MM HH-1 **Remedial Action Plan (RAP):** The City shall not issue any permits except as may be required for the excavation and removal of soil and building demolition until the Los Angeles County Fire Department issues a Conditional No Further Action (Conditional NFA) letter. Once the Applicant has provided a copy of the Conditional NFA letter to the City, the City may issue permits for demolition and grading. The City shall not issue any Building Permit for the Project until it receives a copy of the Los Angeles County Fire Department Final NFA letter.

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 Project site is 0.28 mile west of the nearest school (located at 1350 West 177th Street, Gardena) and the proposed uses are residential, which would not emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste. No impact would occur in this regard, 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 Department of Toxic Substances Control (DTSC). The Cortese list contains hazardous waste and substance sites including public drinking water wells with detectable levels of contamination, sites with known underground storage tanks (USTs) having a reportable release, solid waste disposal facilities from which there is a known migration, hazardous substance sites selected for remedial action, historic Cortese sites, and sites with known toxic material identified through the abandoned site assessment program. A regulatory agency database search was conducted as part of the Phase I ESA; see Appendix D of **Appendix E1**. All nine Cortese sites that were identified in the database search were located

offsite. Therefore, the Project site is not located on a site that is included on a list of hazardous materials sites. No impact would occur in this regard 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?

Less Than Significant Impact. The Project site is not within an airport land use plan or within 2.0 miles of a public airport or public use airport. The closest airport to the Project site is the Goodyear Blimp Base Airport, located approximately 1.87 miles to the southeast. This facility is a private airship base and not a public airport or public use airport. Therefore, the Project would not result in an airport-related safety hazard for people residing or working in the Project area. Refer to Response 4.13c concerning airport-related noise.

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

Less Than Significant Impact. See Response 4.17d.

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 Project site is in a fully urbanized area and it is not adjacent to any wildland. Therefore, the Project would not expose people or structures to a risk involving wildland fires, and no mitigation is required.

4.10 Hydrology and Water Quality

This Section is based on the Preliminary Hydrology Study (C&V Consulting Inc., Revised May 2019) (Hydrology Study), which is included in its entirety in **Appendix F1: Preliminary Hydrology Study**, and the Preliminary Low Impact Development (LID) Plan (C&V Consulting Inc., Revised April 2019) (LID Plan), which is included in its entirety in **Appendix F2: Preliminary Low Impact Development Plan.** The Preliminary Hydrology Study and Preliminary LID Plan were reviewed by the City of Gardena Building Official and deemed adequate; see **Appendix C2: Gardena Building Division Preliminary Review of Stormwater and Hydrology** (March 11, 2019).

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:				
(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	

Environmental Issue	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
e) Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?			X	

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.

Water Quality Standards/Waste Discharge Requirements - Short-Term Construction

The Project's construction-related activities would include excavation, grading, and trenching, which would displace soils and temporarily increase the potential for soils to be subject to wind and water erosion. Construction-related erosion effects would be addressed through compliance with the NPDES program's Construction General Permit. Construction activity subject to this 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 1.0 acre. The Project would disturb approximately 5.6 gross-acres, thus, would be subject to this General Permit. To obtain coverage under this General Permit, dischargers are 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 General 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 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. GMC Chapter 8.70 addresses stormwater and runoff pollution control and is intended to reduce the quantity of pollutants being discharged to waters of the United States. GMC §8.70.110.B.1 specifies that no Grading Permit shall be issued to construction projects that disturb 1.0 or more acres of soil without obtaining a *General Construction Activity Stormwater Permit* (GCASWP) from the State Water Resources Control Board. The types of BMPs required would be based on the amount of soil disturbed, the types of pollutants used or stored at the Project site, and proximity to water bodies.

The Project's LID Plan has four main objectives:

1. Identify all pollutant sources, including sources of sediment that may affect the quality of stormwater discharges associated with daily use/activity (stormwater discharges) from the property site.

2. Identify non-stormwater discharges.

3. Identify, construct, implement and maintain Best Management Practices (BMPs) to reduce or eliminate pollutants in stormwater discharges and authorized non-stormwater discharges from the property site.

4. Develop a maintenance schedule for BMPs designed to reduce or eliminate pollutants.

Refer to Response 4.10.c.ii for a description of existing and proposed site drainage. **Appendix F2 Table-1: Source Control BMPs** identifies the Non-Structural BMPs proposed for the Project. The source control and treatment BMPs and how each will be implemented to achieve the site design concept are detailed in **Appendix F2 Table 1**. Non-structural BMPs, which consist of educating employees and occupants, developing and implementing HOA guidelines, implementing BMPs and enforcing Code requirements are also proposed. The structural BMPs used for this project are summarized **Appendix F2 Table-2: Design BMPs** and **Appendix F2 Table-3: Treatment BMPs.**

Following compliance with NPDES and GMC requirements, which includes implementation of BMPs as a COA, the Project's construction-related activities would not violate any water quality standards or otherwise substantially degrade surface or groundwater quality. A less than significant impact would occur in this regard, and no mitigation is required.

Water Quality Standards/Waste Discharge Requirements - Long-Term Operations

The Los Angeles County Flood Control District, the County of Los Angeles, and the City of Gardena along with 83 other 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 MS4 and discharged to Los Angeles Region surface water bodies. These discharges are regulated under countywide waste discharge requirements contained in Order No. R4-2012-0175[33] (NPDES Permit No. CAS004001, *Waste Discharge Requirements for Municipal Separate Storm Sewer System (MS4) Discharges Within the Coastal Watersheds of Los Angeles County, Except Discharges Originating from the City of Long Beach MS4*, which was adopted November 8, 2012.[34] The MS4 Permit Order provides the revised waste discharge requirements for MS4 discharges within the Los Angeles County watersheds, which includes the City of Gardena. The MS4 Permit Order, which became effective December 28, 2012, supersedes Order No. 01-182. Los Angeles County uses its Low Impact Development (LID) Ordinance to require that projects comply with NPDES MS4 Permit water quality requirements.

The MS4 Permit Order requires development and implementation of a Planning and Land Development Program for all "New Development" and "Redevelopment" projects subject to the Order. New development and redevelopment projects/activities subject to Los Angeles County's LID Ordinance include all development projects equal to 1.0 acre or greater of disturbed area and

[33] State of California Water Quality Control Board. (undated). *Order No. R4-2012-0175 NPDES Permit NO. CAS004001*. Los Angeles, CA: State of California Water Quality Control Board.

[34] Ibid.

residential new or redeveloped projects that create, add, or replace 10,000 SF or greater impervious surface area. The Project involves approximately 5.6 gross-acres of disturbed area and would replace 10,000 SF or more of impervious surface area; as such, the Project is subject to Los Angeles County's LID Ordinance. GMC §8.70.110.B.2 specifies that new development subject to the MS4 Permit must comply with post-construction runoff pollution reduction BMPs implemented through the Standard Urban Stormwater Mitigation Plan (SUSMP). SUSMP conditions assigned by the City would consist of LID BMPs, source control BMPs, and structural and nonstructural BMPs for specific types of uses. LID controls effectively reduce the amount of impervious area of a completed project site and promote the use of infiltration and other controls that reduce runoff. Source control BMPs prevent runoff contact with pollutant materials that would otherwise be discharged to the MS4. Specific structural controls are also required to address pollutant discharges from certain uses including but not limited to housing developments, parking lots, and new streets, among others.

The following is a list of materials anticipated 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 proposes Site Design concepts intended to achieve the following:

- Minimize Urban Runoff,
- Minimize Impervious Footprint,
- Conserve Natural Areas, and
- Minimize Directly Connected Impervious Areas (DCIAs).

Infiltration is Los Angeles County's first option when screening potentially feasible LID BMPs. Infiltration systems collect stormwater runoff and conduct it into permeable soils beneath the site; effectively reducing pollution, reducing runoff and flooding, and recharging groundwater. The Project would treat site runoff in accordance with the Los Angeles County Low Impact Development Manual, 2014. To do so, runoff resulting from the 85th percentile rain event would be treated prior to leaving the site. As determined from the Project's LID Plan, the 85-percentile rain event for the Project site is 0.90 inches, which is used as the design storm for LID.

- As described above, **Appendix F2** Tables 1, 2, and 3 identify the Project's proposed structural and non-structural source control, design, and treatment BMPs and how these would be implemented to achieve each Site Design concept.

The Project would generate approximately 1.868 cubic feet per second (cfs) based on the 85th percentile 24-hr rain event. Stormwater runoff would be collected and treated by flowing through proposed Modular Wetlands Systems (MWS) Biofiltration Vaults with a total treatment capacity of approximately 2.078 cfs. Therefore, the proposed biofiltration units would be able to provide more than enough treatment capacity for the Project site.

The MWS Biofiltration system would address the Pollutants of Concern as water entering from proposed catch basins (Nutrients, Bacteria/Viruses, Total Suspended Solids) and would treat the required water quality volume according to the Flow-Based Standard. The MWS biofiltration units would be installed near each proposed catch basin; see **Appendix F2** Figure-3 for the Preliminary LID Exhibit. Drainage from rooftops and landscape areas would be collected through area drains and entered the proposed catch basins. All curb inlet catch basins would be equipped with trash racks for pretreatment and Dvert System to divert low flows to proposed MWS Biofiltration Vaults for water quality treatment.

Following compliance with NPDES requirements (i.e., Los Angeles County's LID Ordinance and GMC), 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 Project site is in GSWC's service area, and specifically, within the Southwest System service area, which serves Gardena, seven other cities, and portions of unincorporated Los Angeles County. Water supply sources for the Southwest System are imported water, GSWC operated groundwater wells, and recycled water. The Southwest System is supplied by two active, GSWC-owned wells in the Coastal Plain of Los Angeles Groundwater Basin's (Central Basin) Central Sub-basin, and 12 active GSWC-owned wells in the Coastal Plain of Los Angeles Groundwater Basin's (West Coast Basin) West Coast Sub-basin. Groundwater pumping for the Southwest System in 2015 totaled 5,915 acre-feet (AF), with 430 AF originating from the Central Basin and 5,484 AF from West Coast Basin. Gallons per capita per day usage in 2015 measured 87 GPCD. Both the Central and West Coast Basins are adjudicated, thus, are subject to a maximum allowed pumping allocation for groundwater extraction across the entire basins. Refer to Response 4.10e concerning groundwater management.

Basin recharge occurs through percolation of precipitation and artificial recharge activities at spreading grounds, among other sources. The Project site was previously developed, and Project implementation would not increase the site's effective impervious area, as compared to pre-Project conditions. Instead, with Project implementation, the site's effective imperviousness would decrease from 90 to 86 percent, allowing for more percolation of precipitation. Thus, the Project would not reduce the maximum availability of stormwater for groundwater recharge through percolation of precipitation. As concluded in Response 4.10e, the Project's water

demand would total approximately 28,536 GPCD or 31.96 acre-feet per year (AFY). GSWC maintains an allocation of 16,439 AFY from the Central Basin and 7,502 AFY from the West Basin. GSWC has confirmed that water service is available to the Project site from GSWC's Southwest District water system.[35] The adjudicated basins would continue to be subject to the maximum allowed pumping allocation for groundwater extraction. Continued diligence by the pumpers is expected to ensure the reliability of the West Coast Sub-Basin groundwater supplies. Therefore, the Project would not substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that the Project would impede the basins' sustainable groundwater management. Project impacts would be less than significant in this regard, 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; or

(iv) Impede or redirect flood flows?

Less Than Significant Impact. In the current condition, the site's northerly half generally sheet flows over land towards the site's northwest corner. Stormwater runoff enters an existing onsite storm drain inlet. The site's southerly half generally sheet flows over land towards the site's southwesterly corner West 178th Street. Stormwater runoff tributary to West 178th Street is conveyed as street flow within the existing curb/gutter in the westerly direction and enters an existing LACFCD catch basin located approximately 120 feet west of the site. Stormwater runoff enters this existing catch basin, continues within an existing LACFCD 48" Reinforced Concrete Pipe (RCP) BI 0432 – Line C, and ultimately discharges into Dominguez Channel. Stormwater runoff tributary to the existing onsite storm drain inlet directly connects the existing LACFCD 48" storm drain system and discharges to Dominguez Channel.

In the current condition, the easterly adjacent property (i.e., Subarea X3) sheet flows over land in the northwesterly direction to an existing storm drain inlet. There is an existing, non-operational stormwater sump pump located on the adjacent property that is intended to convey stormwater runoff to Dominguez Channel. Due to the existing sump pump non-operational

[35] J. Zhao, P.E., PhD., Personal Communication - Email, February 27, 2018.

status, stormwater eventually ponds and overflows onto the Project site, near the northeast corner.

The Preliminary Hydrology Study was prepared to determine the amount of stormwater runoff generated from the Project site in the existing and proposed conditions. The Study was also prepared to determine whether detention basins would be required by comparing the proposed and existing conditions peak flow rates for the 2, 25, 50 and 100-year peak storm events.

The proposed Project consists of 114 townhomes and a recreational area over approximately 5.63 acres. The development proposes to include drive aisles, parking, landscaping, walkways and common open space areas. The site would be graded to collect runoff at various low points throughout the site. Stormwater runoff generated by the entire site would be directed towards the site's southwest corner. The proposed development would utilize catch basins and an on-site area drain system to collect and convey to a proposed underground storm drain system. The stormwater runoff would be conveyed off-site via a proposed LACFCD connection to the existing 48" RCP storm drain system within West 178th Street and ultimately discharge into Dominguez Channel. Redirecting historic drainage patterns is not anticipated to cause any downstream capacity concerns given the stormwater runoff for both proposed and existing condition would be discharged to Dominguez Channel.

Each catch basin inlet would be equipped with Dvert System that would divert low flows to proposed Modular Wetlands System (MWS) Biofiltration Vaults for water quality treatment. To support the proposed development and prevent overflows onto the Project site from the easterly adjacent offsite property, a 24" storm drain pipe and catch basin are proposed along the site's northerly property line to provide conveyance of offsite storm water run-on from the easterly property (i.e., Subarea X3). Offsite stormwater runoff from the easterly adjacent offsite property will not be treated, only conveyed through the site.

For preliminary hydrologic purposes, initial subareas were determined based on the proposed preliminary grading and drainage design. Recommended impervious area ratio values from Los Angeles County Hydrology Manual 2006 - Appendix D were used in the Study. With Project implementation, the site's effective imperviousness would slightly decrease from 90 to 86 percent. During final engineering, the preliminary estimates of the impervious area will be verified for both the existing and proposed conditions to reflect peak flow values for individual subareas and based on LACFCD's allowable volume flow (i.e., Q) discharge rate.

During final engineering and based on LACFCD's allowable Q discharge rate, the analysis may determine that on-site detention and a restriction orifice are required to mitigate the increased post-developed peak flow rate and volume. On-site detention and flow restriction would be provided by upsizing underground private storm drain piping and implementing an orifice plate at the downstream manhole, prior to discharging stormwater runoff offsite. On-site detention and flow restriction would be accommodated within the existing Project boundaries.

Appendix F1 Section 6.0 presents the hydrology summary for the existing and proposed conditions for each tributary. The percent difference (deltas) for all concentration times, which are for the 100-year storm event, are as follows:

- Total site 2-year peak storm flow = 4.64/6.16 = -29.9 percent,
- Total site 25-year peak storm flow = 14.78/15.66 = -5.6 percent,
- Total site 50-year peak storm flow = 16.84/17.84 = -5.6 percent, and
- Total site 100-year peak storm flow = 19.55/20.01 = -2.3 percent.

The results from the Study utilizing HydroCalc software provided by Los Angeles County Department of Public Works demonstrate that the proposed stormwater peak flow from the Project site would be generally lower than the existing condition peak flow as indicated in the hydrology summary results; see also **Appendix F1** Section 6. The proposed peak flow would be lower primarily because the Project involves a change in land use from commercial to residential, which would lower the site's impervious area causing lower runoff flow rate and higher time of concentration. As noted above, the preliminary estimates of the impervious area will be verified for both the existing and proposed conditions during final engineering.

Since the stormwater runoff generated by the entire Project site is proposed to be conveyed to the existing LACFCD 48" RCP BI 0432 – Line C ultimately discharging into Dominguez Channel, the proposed peak flow rate compared to the allowable Q discharge rate will be verified with LACFCD at final engineering.

During a heavy rainfall, the Project site's grading design would allow for multiple low points equipped with curb inlet catch basins throughout the entire Project site to accommodate smaller drainage areas to mitigate stormwater ponding in one spot. In an event of overflowing, the proposed grading would facilitate the overflow by draining one-half of the Project site to northwest corner, matching the historic drainage condition, and providing wall knockouts for emergency overflow. The proposed catch basins would be equipped with internal bypass systems to convey larger storm event overflow conditions. Given that the peak flow runoff from the proposed preliminary condition is lower than the existing condition, detention is not required. However, the peak flow runoff will be verified during final engineering based on the LACFCD Allowable Q Discharge Rate.

Additionally, there are no streams or rivers near the Project site. Therefore, the Project would not substantially alter the site's existing drainage pattern or add impervious surfaces, such that it would substantially increase the rate or amount of surface runoff in a manner which would result in flooding, create/contribute runoff, which would exceed the capacity of existing drainage system, or impede/redirect flood flows. Impacts would be less than significant, and no mitigation is required. Refer to Response 4.10a concerning potential impacts involving erosion.

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

Less Than Significant Impact. The Project site is in an area of minimal flood hazard.[36] Tsunamis are sea waves that are generated in response to large-magnitude earthquakes. When these waves reach shorelines, they sometimes produce coastal flooding. Seiches are the oscillation of large bodies of standing water, such as lakes, that can occur in response to ground shaking. The Project site is approximately 5.6 miles northeast of the Pacific Ocean and there are no nearby bodies of standing water. Tsunamis and seiches do not pose hazards due to the Project site's inland location and lack of nearby bodies of standing water. The Project proposes a residential development that would involve the use of materials associated with routine property maintenance, such as janitorial supplies for cleaning purposes and/or herbicides and pesticides for landscaping. The Project is not within a flood hazard, tsunami, or seiche zone and would not risk the release of pollutants. Therefore, potential impacts associated with inundation by flood hazard, tsunami, or seiche would be less than significant, and no mitigation is required.

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

Less Than Significant Impact. The Southwest System is supplied by two active, GSWC-owned wells in the Coastal Plain of Los Angeles Groundwater Basin's Central Subbasin, and 12 active, GSWC-owned wells in the Coastal Plain of Los Angeles Groundwater Basin's West Coast Subbasin. GSWC monitors well capacity, status, and water quality.

In 2014, the California Sustainable Groundwater Management Act (SGMA) was passed, which provides authority for agencies to develop and implement groundwater sustainability plans (GSP) or alternative plans that demonstrate water basins are being managed sustainably.[37] Under the SGMA, the Central Basin and West Coast Basin are exempted from the requirement to form a Groundwater Sustainability Agency since they are adjudicated basins.

The Central Basin adjudication limit (total of the allowed pumping allocations (APA) of each party) for groundwater extraction across the entire basin is 217,467 AFY. GSWC maintains an APA of 16,439 AFY. GSWC's APA is shared between all their systems that extract groundwater from the Central Basin. Three agencies, Los Angeles County Department of Public Works (LACDPW), Water Replenishment District of Southern California (WRDSC), and CBMWD, work with the water producers to ensure that the APA is available to the Central Basin's pumpers.

The West Coast Basin adjudication limit for groundwater extraction across the entire basin is 64,468 AFY. GSWC maintains legal rights to 7,502 AFY. Three agencies, LACDPW, WRDSC, and

[36] Federal Emergency Management Agency. (April 2019). *FEMA Flood Map Service Center.* Retrieved from https://msc.fema.gov/portal/search?AddressQuery=1515%20W%20178th%20St%2C%20Gardena%2C%20CA%2090248#searchresultsanchor

[37] State Water Resources Control Board. Sustainable Groundwater Management Act (SGMA). (April 2019). Retrieved from https://www.waterboards.ca.gov/water_issues/programs/gmp/sgma.html

WBMWD, collaborate with the groundwater producers such as GSWC to ensure that the APA is available to be pumped from West Coast Basin wells.

GSWC currently operates 12 active wells in the Southwest System, 10 of which are in the West Coast Basin, and the remaining two are in the Central Basin. The Southwest System has a total normal year active well capacity of 10,865 gpm (17,525 AFY), of which 8,715 gpm (14,057 AFY) is in the West Coast Basin, and 2,150 gpm (3,468 AFY) is in the Central Basin.

Groundwater levels are managed within a safe basin operating range to protect the LA Basin's long-term sustainability and to protect against land subsidence. The Southwest System is supplied by two active, GSWC-owned wells in the Central Subbasin of the Coastal Plain of Los Angeles Groundwater Basin and 12 active, GSWC-owned wells in the West Coast Subbasin of the Coastal Plain of Los Angeles Groundwater Basin. The Central Basin's groundwater storage capacity is approximately 13.8 million AF. The storage capacity of the West Coast Basin's primary water producing aquifer, the Silverado aquifer, is estimated to be 6.5 million AF.

The Southwest System's water use in 2015 was 87 gallons per capita per day (GPCD), well below the SBX7-7 2015 interim target of 124 GPCD and the 2020 target of 121 GPCD. The Project's forecast population growth is approximately 327 persons, which would generate approximately 28,536 GPCD or 31.96 AFY. The Project's water demand, if solely taken from groundwater resources, would represent 0.23 percent of the West Coast Sub-Basin's total 2015 groundwater supply. Furthermore, the City would continue to comply with SBx7-7 requirements, which aim to reduce urban water usage by 20 percent by 2020. Therefore, impacts are less than significant, and no mitigation is required.

4.11 Land Use 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	

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 the construction of a new freeway or highway through an established neighborhood. The Project proposes a residential community consisting of 114 attached townhomes in 22 buildings. Given its nature and scope, the Project would not physically divide an established community. No impact would occur in this regard, 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. GGP Figure LU-2, *Land Use Policy Map*, depicts the City's land use designations and indicates the Project site is designated Industrial with a Mixed-Use Overlay (MUO). The Industrial designation allows for a wide variety of clean and environmental-friendly industries, technology-related uses and supporting facilities, and business parks. The MUO designation allows greater flexibility of development alternatives in appropriate areas of the City, especially high-density residential development. If residential uses are developed, they must be combined with a commercial component. The Project proposes a residential community consisting of attached townhomes and no commercial uses (they would not be viable at this location); therefore, the Project would conflict with the primary intended uses for the Industrial designation with a MUO.

The City of Gardena Zoning Map depicts the City's zones and indicates the Project site is zoned General Industrial (M-2) with a Mixed-Use Overlay Zone (MU). The M-2/MU Zone is also intended to allow a greater flexibility in development alternatives, especially higher-density residential. However, if residential uses are developed, they must be combined with a commercial component, which would not be feasible in this location. GMC §§18.36.020/18.38.010 and

§18.19.030 identify the uses permitted and conditionally permitted in the M-2/MU Zone, respectively.

The Project proposes a residential community consisting solely of attached townhomes, which are not permitted uses in the M-2/MU Zone. Therefore, the Project proposes both a General Plan Amendment and Zone Change to change the General Plan land use designation from Industrial with a MUO to High-Density Residential and the zoning from General Industrial (M-2) with a Mixed-Use Overlay Zone (MU) to High-Density Multiple-Family Residential Zone (R-4).

Similar to the MU overlay zone, the minimum permitted density for the R-4 Zone is 20 DU/AC; see GMC §18.18.020.A. The Project proposes to develop a residential community on the approximately 5.6-gross AC Project site consisting of 114 attached townhomes, at a density of 20.36 DU/GAC, and therefore meets the minimum density range for the R-4 Zone and does not exceed the allowed maximum of 30 DU/gross acre.

GMC §18.44.010 specifies that Site Plans are required to be submitted for any development project for which a General Plan Amendment, Zone Change, Conditional Use Permit, Variance, Tract Map, or other discretionary permit is being sought. The Project's requested entitlements include a General Plan Amendment, Zone Change, and Tentative Tract Map, as discussed above. The Site Plan would be approved (or conditionally approved), only after the City finds the proposed development, including its proposed uses and physical design, consistent with the GGP's intent and general purpose and GMC provisions. The Project would be consistent with the City's development standards, as recently amended by Ordinance No. 1804. Additionally, the City must find that the proposed development would not adversely affect the area's orderly and harmonious development and the City's general welfare.

GMC §17.08.020 specifies that the subdivider shall prepare, or cause to be prepared, a tentative map for all proposed divisions of land or reversions to acreage and shall file such tentative map with the planning and environmental quality commission's secretary. Such tentative map shall be processed in accordance with the Subdivision Map Act and the provisions of this chapter. The Project proposes TTM #82390 to create a single-lot subdivision for Condominium Purposes.

Therefore, following the City's approval of the requested entitlements (i.e., General Plan Amendment GPA #2-18, Zone Change ZC #3-18, Tentative Tract Map TTM #82390, and Site Plan Review SPR #11-18, the Project would not conflict with the GGP or GMC. Impacts would be less than significant, and no mitigation is 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

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 area's known or inferred mineral potential.[38] The Project site is not located in an area identified as a locally important mineral resource recovery site.[39] Further, the GGP does not identify the Project site as a locally-important mineral resource recovery site. Therefore, the proposed Project would have no impact concerning mineral resources, and no mitigation is required.

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

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

4.13 Noise

This Section is based on the *Acoustical Assessment* (Kimley-Horn & Associates, Inc., May 2019), which is included in its entirety in **Appendix G: Acoustical Assessment.**

Environmental Issue	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project result in:				
a) Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?			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	

Sound and Environmental Noise

Acoustics is the science of sound. 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.

Noise Descriptors

The dB scale alone does not adequately characterize how humans perceive noise. The dominant frequencies of a sound have a substantial effect on the human response to that sound. Several rating scales have been developed to analyze the adverse effect of community noise on people. Because environmental noise fluctuates over time, these scales consider that the noise's effect on people is largely dependent on the noise's total acoustical energy content, as well as the time when the noise occurs. The equivalent noise level (L_{eq}) is the average noise level averaged over the measurement period, while the day-night noise level (L_{dn}) and Community Equivalent Noise Level (CNEL) are measures of energy average during a 24-hour period, with dB weighted sound levels from 7:00 PM to 7:00 AM Most commonly, environmental sounds are described in terms of an average level (L_{eq}) that has the same acoustical energy as the summation of all the time-varying events.

A-Weighted Decibels

The perceived loudness of sounds is dependent on many factors, including sound pressure level and frequency content. However, within the usual range of environmental noise levels, perception of loudness is relatively predictable and can be approximated by dBA values. There is a strong correlation between dBA and the way the human ear perceives sound. For this reason, the dBA has become the standard tool of environmental noise assessment. All noise levels reported in this Section are in terms of dBA, but are expressed as dB, unless otherwise noted.

Addition of Decibels

The dB scale is logarithmic, not linear, and therefore sound levels cannot be added or subtracted through ordinary arithmetic. Two sound levels 10 dB apart differ in acoustic energy by a factor of 10. When the standard logarithmic dB is A-weighted, an increase of 10 dBA is generally perceived as a doubling in loudness. For example, a 70-dBA sound is half as loud as an 80-dBA sound and twice as loud as a 60-dBA sound. When two identical sources are each producing sound of the same loudness, the resulting sound level at a given distance would be 3.0 dBA higher than one source under the same conditions. Under the dB scale, three sources of equal loudness together would produce an increase of 5.0 dBA.

Sound Propagation and Attenuation

Sound spreads (propagates) uniformly outward in a spherical pattern, and the sound level decreases (attenuates) at a rate of approximately 6.0 dB for each doubling of distance from a

stationary or point source. Sound from a line source, such as a highway, propagates outward in a cylindrical pattern. Sound levels attenuate at a rate of approximately 3.0 dB for each doubling of distance from a line source, such as a roadway, depending on ground surface characteristics. No excess attenuation is assumed for hard surfaces like a parking lot or a body of water. Soft surfaces, such as soft dirt or grass, can absorb sound, so an excess ground-attenuation value of 1.5 dB per doubling of distance is normally assumed. For line sources, an overall attenuation rate of 3.0 dB per doubling of distance is assumed.

Noise levels may also be reduced by intervening structures; generally, a single row of buildings between the receptor and the noise source reduces the noise level by approximately 5.0 dBA, while a solid wall or berm reduces noise levels by 5.0 to 10 dBA. The way older homes in California were constructed generally provides a reduction of exterior-to-interior noise levels of approximately 20 to 25 dBA with closed windows. The exterior-to-interior reduction of newer residential units is generally 30 dBA or more.

Human Response to Noise

The human response to environmental noise is subjective and varies considerably from individual to individual. Noise in the community has often been cited as a health problem, not in terms of actual physiological damage, such as hearing impairment, but in terms of inhibiting general well-being and contributing to undue stress and annoyance. The health effects of noise in the community arise from interference with human activities, including sleep, speech, recreation, and tasks that demand concentration or coordination. Hearing loss can occur at the highest noise intensity levels.

Noise environments and consequences of human activities are usually well represented by median noise levels during the day or night or over a 24-hour period. Environmental noise levels are generally considered low when the CNEL is below 60 dBA, moderate in the 60 to 70 dBA range, and high above 70 dBA. Examples of low daytime levels are isolated, natural settings with noise levels as low as 20 dBA and quiet, suburban, residential streets with noise levels around 40 dBA. Noise levels above 45 dBA at night can disrupt sleep. Examples of moderate-level noise environments are urban residential or semi-commercial areas (typically 55 to 60 dBA) and commercial locations (typically 60 dBA). People may consider louder environments adverse, but most will accept the higher levels associated with noisier urban residential or residential-commercial areas (60 to 75 dBA) or dense urban or industrial areas (65 to 80 dBA). Regarding increases in dBA, the following relationships should be noted:

- Except in carefully controlled laboratory experiments, a 1.0-dBA change cannot be perceived by humans.
- Outside the laboratory, a 3.0-dBA change is considered a just-perceivable difference.
- A minimum 5.0-dBA change is required before any noticeable change in community response would be expected. A 5.0-dBA increase is typically considered substantial.

- A 10-dBA change is subjectively heard as an approximate doubling in loudness and would almost certainly cause an adverse change in community response.

Hearing Loss

While physical damage to the ear from an intense noise impulse is rare, a degradation of auditory acuity can occur even within a community noise environment. Hearing loss occurs mainly due to chronic exposure to excessive noise but may be due to a single event such as an explosion. Natural hearing loss associated with aging may also be accelerated from chronic exposure to loud noise. The Occupational Safety and Health Administration has a noise exposure standard that is set at the noise threshold where hearing loss may occur from long-term exposures. The maximum allowable level is 90 dBA averaged over eight hours. If the noise is above 90 dBA, the allowable exposure time is correspondingly shorter.

Annoyance

Attitude surveys are used for measuring the annoyance felt in a community for noises intruding into homes or affecting outdoor activity areas. In these surveys, it was determined that causes for annoyance include interference with speech, radio and television, house vibrations, and interference with sleep and rest. The L_{dn} as a measure of noise has been found to provide a valid correlation of noise level and the percentage of people annoyed. People have been asked to judge the annoyance caused by aircraft noise and ground transportation noise. There continues to be disagreement concerning these different sources' relative annoyance. A noise level of approximately 55 dBA L_{dn} is the threshold at which a substantial percentage of people begin to report annoyance.

Existing Noise Sources

Gardena is impacted by various noise sources, including mobile and stationary. Mobile noise sources, especially cars, trucks, and trains are the most common and significant sources of noise. Other noise sources are the various land uses (i.e., residential, commercial, institutional, and recreational and park activities) throughout the City that generate stationary-source noise.

As previously noted, the Project site is fully developed as an industrial use with a trucking warehouse, associated surface parking lot, and outdoor trailer storage. The warehouse is used for maintenance and storage of trucks and trailers.

Mobile Sources

Land uses surrounding the Project site include: an equestrian use (i.e., horse stables) and a vacant lot within a power line easement to the north, industrial uses (generally between Normandie Avenue and Denker Avenue) to the south, single-family residential (west of Denker Avenue) to the southwest, a mobile home park to the west, and light industrial to the east. The existing mobile noise sources in the Project area are generated by motor vehicles traveling along West 178th Street, including the truck traffic associated with the existing on-site trucking warehouse.

The General Plan has identified arterials and train movements as the City's most significant noise sources. The Circulation Element classifies 178th Street as a Collector roadway, not an Arterial.[40]

Stationary Sources

The Project vicinity's primary stationary noise sources are those associated with the on-site trucking warehouse operations and the industrial uses to the south and east. The stationary noise sources associated with the existing trucking warehouse include a surface parking lot, outdoor trailer storage, loading/unloading activities, and mechanical equipment (e.g., heating ventilation and air conditioning [HVAC] equipment)). The noise associated with these sources and other nearby sources may represent a single-event noise occurrence or short-term noise.

Noise Measurements

The Project site currently consists of a trucking warehouse with associated surface parking lot and outdoor trailer storage. To quantify existing ambient noise levels in the Project area, Kimley-Horn conducted two short-term noise measurements on March 26, 2019. The noise measurement sites were representative of typical existing noise exposure within and immediately adjacent to the Project site. The 10-minute measurements were taken between 11:00 AM and 12:00 PM Short-term L_{eq} measurements are considered representative of the daily noise levels. The average noise levels and sources of noise measured at each location are listed in **Table 4.13-1: Existing Noise Measurements** and shown on **Exhibit 4.13-1: Noise Measurement Locations**.

TABLE 4.13-1: EXISTING NOISE MEASUREMENTS

Site #	Location	L_{eq} (dBA)	L_{min} (dBA)	L_{max} (dBA)	Time
1	Southeast corner of 178th Street and Denker Avenue.	67.8	46.5	86.0	11:19 AM
2	On sidewalk of southeast corner of Project site, on 178th Street.	63.4	43.7	80.4	11:34 AM

Source: Noise measurements taken by Kimley-Horn, March 26, 2019. See **Appendix A** for noise measurement results.

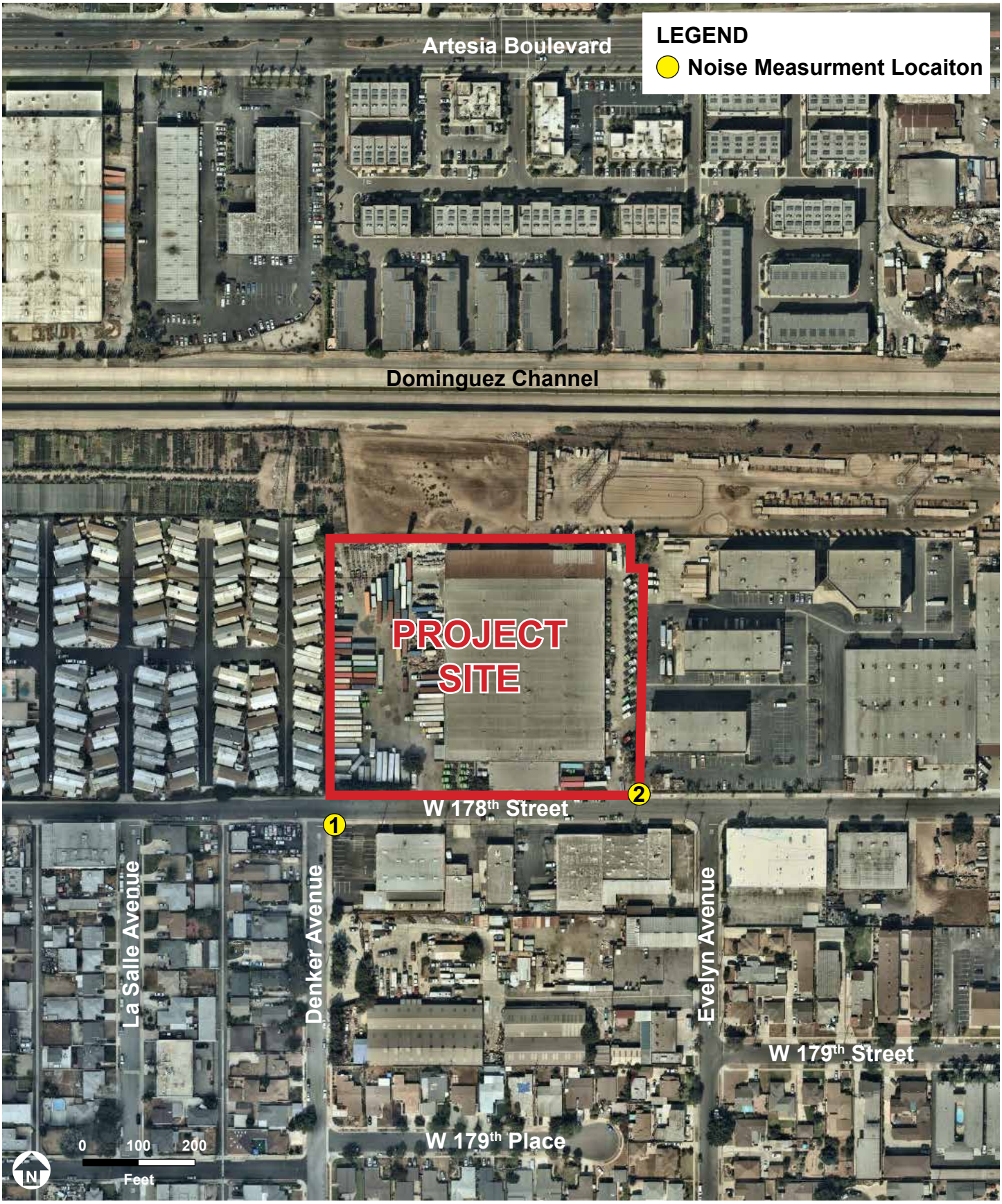
Sensitive Receptors

Noise exposure standards and guidelines for various types of land uses reflect the varying noise sensitivities associated with each of these uses. Residences, hospitals, schools, guest lodging, libraries, and churches are treated as the most sensitive to noise intrusion and therefore have more stringent noise exposure targets than do other uses, such as manufacturing or agricultural uses that are not subject to impacts such as sleep disturbance. Sensitive receptors near the Project site consist mostly of single-family residences/mobile homes, religious institutions,

[40] City of Gardena. (2006, Updated February 2013). *Gardena General Plan 2006. Figure CI-1: Roadway Network*. Gardena, CA: City of Gardena.

educational institutions, and recreational facilities. **Table 4.13-2: Sensitive Receptors**, lists the distances and locations of sensitive receptors within the Project vicinity.

TABLE 4.13-2: SENSITIVE RECEPTORS	
Receptor Type/Description	**Distance and Direction from the Project Site**
RESIDENTIAL	
Mobilehome Park Residential Neighborhood	Adjacent to the west
Single-Family Residential Neighborhood	120 feet to the southwest
Single-Family Residential Neighborhood	475 feet to the south
Multi-Family Residential Dwelling	350 feet to the southeast
RELIGIOUS INSTITUTIONS	
Gardena Torrance Southern Baptist	580 feet to the southeast
Gardena Valley Assembly of God	1,150 feet to the south
Gospel Venture International Church	1,386 feet to the west
First Missionary Baptist Church	1,390 feet to the southeast
The Church of Jesus Christ of Latter-day Saints	2,680 feet to the northwest
St Francis Korean Catholic Church	3,000 feet to the west
EDUCATIONAL INSTITUTIONS	
Pacific Lutheran Jr./Sr. High School	1,150 feet to the south
Gardena High School	1,210 feet to the east
Riley High School Gardena	2,078 feet to the south
Arlington Elementary School	3,340 feet to the west
RECREATIONAL FACILITIES	
City of Torrance Guenser Park	2,300 feet to the west
Arthur Lee Johnson Memorial Park	2,670 feet to the northeast



Source: Near Maps

Kimley»Horn

Welcome To GARDENA

Melia 178th Street Townhomes Project
Initial Study/Mitigated Negative Declaration

Exhibit 4.13-1
Noise Measurement Locations

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Local Regulatory Setting

City of Gardena General Plan

The City of Gardena General Plan (General Plan) establishes goals, policies, and programs to protect residents from excessive noise. The General Plan identifies transportation, such as arterials and train movements, as the most significant noise-producing sources, as well as fixed sources[41]. Land uses near these significant noise-producers can incorporate buffers and noise control techniques including setbacks, landscaping, building transitions, site design, and building construction techniques to reduce the impact of excessive noise. Selection of the appropriate noise control technique would vary depending on the level of noise that needs to be reduced as well as the location and intended land use. The General Plan includes acceptable noise levels associated with specific land uses; see **Table 4.13-3: Gardena Noise and Land Use Compatibility.**

TABLE 4.13-3: GARDENA NOISE AND LAND USE COMPATIBILITY

Land Use Category	CNEL, dBA[1]						
	<	*55*	*60*	*65*	70	75	80
Residential – Single-family, multifamily, duplex	A	A	B	C	C	NA	NA
Residential – Mobilehomes	A	A	B	C	C	NA	NA
Transient Lodging – Motels, hotels	A	A	B	B	C	C	NA
Schools, Libraries, Churches, Hospitals, Nursing Homes	A	A	B	C	C	NA	NA
Auditoriums, concert Halls, Amphitheaters, Meeting Halls	B	B	C	C	NA	NA	NA
Sports Arenas, Outdoor Spectator Sports, Amusement Parks	A	A	A	B	B	NA	NA
Playgrounds, Neighborhood Parks	A	A	A	B	C	NA	NA
Golf Courses, Riding Stables, Cemeteries	A	A	A	A	B	C	C
Office and Professional Buildings	A	A	A	B	B	C	NA
Commercial Retail, Banks, Restaurants, Theaters	A	A	A	A	B	B	C
Industrial, Manufacturing Utilities, Wholesale, Service Stations	A	A	A	A	B	B	B
Agriculture	A	A	A	A	A	A	A

NOTE:
CNEL = Community Equivalent Noise Level; dBA = Decibel

[41] City of Gardena, *General Plan Community Safety Element Noise Plan,* 2006.

LEGEND:

A – Normally Acceptable – Specified land use is satisfactory, based upon the assumption that any buildings involved are of normal conventional construction, without any special noise insulation requirements.

B – Conditionally Acceptable – New construction or development should be undertaken only after a detailed analysis of the noise requirements is made and needed noise insulation features are included in the design. Conventional construction, but with closed windows and fresh air supply systems or air conditioning will normally suffice.

C – Normally Unacceptable – New construction or development should generally be discouraged. If it does proceed, a detailed analysis of the noise reduction requirements must be made and needed noise insulation features included in the design.

D – Clearly Unacceptable – New construction or development should generally not be undertaken.

NA – Not Applicable

Source: City of Gardena, General Plan Community Safety Element Noise Plan, 2006.

The City has designated several streets/street segments as truck routes. General Plan Figure CI-3 illustrates the locations of designated truck routes within Gardena and indicates those nearest the Project site are Normandie Avenue to the east and Western Avenue to the west.[42]

City of Gardena Municipal Code

City of Gardena Municipal Code (GMC) §8.36.040 and §8.36.050 state the exterior and interior noise standards for the City in terms of $L_{eq}(15)$ and L_{max}. The allowable noise levels at land uses receiving noise are summarized in **Table 4.13-4: Allowable Exterior and Interior Noise Levels**. GMC §8.36.050(C) states that if the ambient noise level exceeds the noise standard, then the ambient noise level shall become the noise standard. GMC §8.36.080(G) states that noise associated with construction, repair, remodeling, grading, or demolition between the hours of 7:00 AM and 6:00 PM on weekdays and between the hours of 9:00 AM and 6:00 PM on Saturday are exempt from these noise standards. GMC §8.36.070 prohibits the operation of a device that generates vibration which is above the perception threshold of an individual at or beyond the property line if the source is on private property.

TABLE 4.13-4: ALLOWABLE EXTERIOR AND INTERIOR NOISE LEVELS

Type of Land Use	15-Minute Average Noise Level (L_{eq} (15))		Maximum Noise Level (L_{max})	
	7 am – 10 pm	10 pm – 7am	7 am – 10 pm	10 pm – 7 am
Exterior Noise Levels				
Residential	55 dB(A)	50 dB(A)	75 dB(A)	70 dB(A)
Residential portions of mixed-use	60 dB(A)	50 dB(A)	80 dB(A)	70 dB(A)
Commercial	65 dB(A)	60 dB(A)	85 dB(A)	80 dB(A)
Industrial of manufacturing	70 dB(A)	70 dB(A)	90 dB(A)	90 dB(A)
Interior Noise Levels				
Residential	45 dB(A)	40 dB(A)	65 dB(A)	60 dB(A)
Residential portions of mixed-use	45 dB(A)	40 dB(A)	70 dB(A)	60 dB(A)

Source: City of Gardena, *Municipal Code*, §8.36.040 and §8.36.050, 2018.

[42] City of Gardena. (2006, Updated February 2013). *Gardena General Plan 2006. Figure CI-3: Designated Truck Routes*. Gardena, CA: City of Gardena.

Impact Analysis

4.13a Would the project result in generation a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?

Less Than Significant Impact.

Construction Noise

Construction noise typically occurs intermittently and varies depending on the nature or phase of construction (e.g., land clearing, grading, excavation, paving). Noise generated by construction equipment, including earthmovers, material handlers, and portable generators, can reach high levels. During construction, exterior noise levels could affect the residential neighborhoods surrounding the construction site. Project construction would occur adjacent to existing mobile homes residences to the west and existing single-family residences to the south. However, it is acknowledged that construction activities would occur throughout the Project site and would not be concentrated at a single point near sensitive receptors.

Construction activities would include site preparation, grading, building construction, paving, and architectural coating. Such activities would require graders, scrapers, and tractors during site preparation; graders, dozers, and tractors during grading; cranes, forklifts, generators, tractors, and welders during building construction; pavers, rollers, mixers, tractors, and paving equipment during paving; and air compressors during architectural coating. Typical operating cycles for these types of construction equipment may involve 1 or 2 minutes of full power operation followed by 3 to 4 minutes at lower power settings. Other primary sources of acoustical disturbance would be random incidents, which would last less than one minute (such as dropping large pieces of equipment or the hydraulic movement of machinery lifts). Noise generated by construction equipment, including earthmovers, material handlers, and portable generators, can reach high levels. Typical noise levels associated with individual construction equipment are listed in **Table 4.13-5: Typical Construction Noise Levels**.[43]

[43] This Project will not use a pile driver.

TABLE 4.13-5: TYPICAL CONSTRUCTION NOISE LEVELS		
Equipment	**Typical Noise Level (dBA) at 50 feet from Source**	**Typical Noise Level (dBA) at 100 feet from Source[1]**
Air Compressor	80	74
Backhoe	80	74
Compactor	82	76
Concrete Mixer	85	77
Concrete Pump	82	76
Concrete Vibrator	76	79
Crane, Derrick	88	76
Crane, Mobile	83	70
Dozer	85	82
Generator	82	77
Grader	85	79
Impact Wrench	85	76
Jack Hammer	88	79
Loader	80	79
Paver	85	82
Pile-driver (Impact)	101	74
Pile-driver (Sonic)	95	79
Pneumatic Tool	85	95
Pump	77	89
Roller	85	79
Saw	76	71
Scraper	85	84
Shovel	82	89
Truck	84	79
Note: 1. Calculated using the inverse square law formula for sound attenuation: $dBA_2 = dBA_1+20Log(d_1/d_2)$ Where: dBA_2 = estimated noise level at receptor; dBA_1 = reference noise level; d_1 = reference distance; d_2 = receptor location distance		
Source: Federal Transit Administration, *Transit Noise and Vibration Impact Assessment Manual*, September 2018.		

The sensitive receptors nearest the Project site are residential uses: the mobile home park adjacent to the west; and the single-family residential neighborhood approximately 120 feet to the southwest. As shown in **Table 4.13-5**, exterior noise levels could affect the nearest existing noise-sensitive receptors. These sensitive receptors may be exposed to elevated noise levels during Project construction. However, construction noise would be acoustically dispersed throughout the Project site and not concentrated in one area near surrounding sensitive uses. The GMC does not establish quantitative construction noise standards. Instead, the City has established limited hours of construction activities. GMC §8.36.080 exempts noise associated with new construction activity, remodeling, rehabilitation, or grading of any property from the GMC noise limitations, provided construction activities take place between the hours of 7:00 AM

and 6:00 PM on weekdays, between the hours of 9:00 AM and 6:00 PM on Saturdays, with no construction activities taking place at any time on Sundays or federal holidays. All motorized equipment used in such activity shall be equipped with functioning mufflers as mandated by the state. Additionally, existing noise levels in the Project vicinity range from 63.4 to 67.8 dBA Leq; see **Table 4.13-1**.

Construction activities may also cause increased noise along access routes to and from the Project site due to movement of equipment, materials, and workers. A maximum of approximately 7,600 CY of soil import is anticipated, which would be transported along local roadways, including 178th Street and the truck routes nearest the Project site (i.e., Normandie Avenue to the east and Western Avenue to the west). Compliance with GMC would minimize impacts from construction noise, as construction would be limited to daytime hours on weekdays and Saturdays. Thus, following compliance with GMC standards, Project construction activities would result in a less than significant noise impact.

Operational Noise

The Project proposes to replace the existing trucking warehouse with residential townhomes. Thus, the operational noise (stationary and traffic) associated with the existing trucking warehouse would cease and would be replaced with operational noise typical of residential uses. The major noise sources associated with the Project that would potentially impact existing and future nearby residences include stationary noise sources and off-site traffic noise.

Stationary Noise Sources. With Project implementation, the stationary noise sources (i.e., surface parking lot, outdoor trailer storage, loading/unloading activities, and HVAC equipment) associated with the existing trucking warehouse would be removed and replaced with stationary noise typical of residential uses. Noise typical of residential uses includes group conversations, pet noise, and general maintenance activities. Generally, noise levels from stationary sources are anticipated to decrease with implementation of the proposed residential uses, as compared to the existing industrial use, given the existing surface parking lot and outdoor trailer storage would be removed and loading/unloading activities would cease. Further, noise from residential stationary sources would primarily occur during the "daytime" activity hours of 7:00 AM to 10:00 PM. Additionally, the residences would be required to comply with the General Plan and GMC noise standards.

The Project is surrounded primarily by residential and industrial uses. The nearest sensitive receptors to the Project site ae the mobile home residences located adjacent to the west and single-family residences to the south across West 178th Street. Potential stationary noise sources related to long-term Project operations would include mechanical equipment. Mechanical equipment (e.g., heating ventilation and air conditioning [HVAC] equipment) typically generates noise levels of approximately 50 dBA at 50 feet. The HVAC units associated with the proposed buildings would be located approximately 25 feet from the closest sensitive receptors. At 25 feet, HVAC noise levels would be 56 dBA. Ground-mounted HVAC equipment is anticipated to be installed in the rear of proposed homes and attenuated by a solid property wall that would

reduce noise levels to 48 dBA. As noise levels would be below the City's 55 dBA standard, noise impacts associated with HVAC equipment would be less than significant.

Nominal parking noise would occur within the on-site shared driveway and visitor parking stalls. Each proposed DU would include a two-car garage, which would attenuate parking noise. It is also noted that parking noise occurs at the adjacent properties under existing conditions. Parking and driveway noise would be consistent with the existing noise in the vicinity and would be partially masked by background traffic noise from motor vehicles traveling along West 178th Street. Actual noise levels over time resulting from parking activities are anticipated to be far below the City's noise standards. Therefore, noise impacts associated with parking would be less than significant.

Off-Site Traffic Noise. Project implementation would generate traffic volumes along West 178th Street and Project area roadways. The Project would result in 620 average daily vehicle trips (ADT).[44] This trip generation estimate is conservative given trip credits for the existing land uses that would be displaced have not been applied. When trip credits for the existing trucking warehouse are applied to the Project's trip generation estimates, the Project's net new trips would be offset, with proportionate offsets in traffic noise. Notwithstanding, for a conservative approach, this analysis assumes a traffic increase of 620 ADT. The Project's traffic would result in noise on Project area roadways. In general, a 3-dBA increase in traffic noise is barely perceptible to people, while a 5-dBA increase is readily noticeable. Traffic volumes on Project area roadways would have to approximately double for the resulting traffic noise levels to generate a 3-dBA increase.[45] The Circulation Element classifies 178th Street (the nearest roadway) as a Collector roadway, and therefore does not have calculated average daily traffic. These roadways carry an average of less than 15,000 vehicles per day.[46] Therefore, even without applying the credit for the existing noise associated with the displaced land uses, because the Project-related traffic increase would not result in a permanent 3-dBA increase in ambient noise levels, noise impacts associated with Project traffic would be less than significant.

4.13b Would the project generate excessive groundborne vibration or groundborne noise levels?

Less Than Significant Impact.

Construction

Increases in groundborne vibration levels attributable to the Project would be primarily associated with short-term construction-related activities. Project construction could result in

[44] Kimley-Horn & Associates, Inc. *Melia 178th Street Townhomes Project – Trip Generation Analysis*, May 2019.

[45] According to the California Department of Transportation, *Technical Noise Supplement to Traffic Noise Analysis Protocol* (September 2013), it takes a doubling of traffic to create a noticeable (i.e., 3 dBA) noise increase.

[46] City of Gardena, *City of Gardena General Plan Draft Environmental Impact Report, pages 38-39*, January 2006.

varying degrees of temporary groundborne vibration, depending on the specific construction equipment used and the operations involved.

The Federal Transit Administration (FTA) has published standard vibration velocities for construction equipment operations. In general, the FTA architectural damage criterion for continuous vibrations (i.e., 0.2 in/sec) appears to be conservative. The types of construction vibration impacts 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. Ordinary buildings that are not particularly fragile would not experience any cosmetic damage (e.g., plaster cracks) at distances beyond 30 feet. This distance can vary substantially depending on the soil composition and underground geological layer between vibration source and receiver. In addition, not all buildings respond similarly to vibration generated by construction equipment. For example, for a building that is constructed with reinforced concrete with no plaster, the FTA guidelines show that a vibration level of up to 0.20 in/sec is considered safe and would not result in any construction vibration damage.

Table 4.13-6: Typical Construction Equipment Vibration Levels, lists vibration levels at 25 feet for typical construction equipment. Groundborne vibration generated by construction equipment spreads through the ground and diminishes in magnitude with increases in distance. As indicated in **Table 4.13-6**, based on FTA data, vibration velocities from typical heavy construction equipment operations that would be used during Project construction range from 0.003 to 0.089 in/sec PPV at 25 feet from the source of activity.

TABLE 4.13-6: TYPICAL CONSTRUCTION EQUIPMENT VIBRATION LEVELS

Equipment	Peak Particle Velocity at 25 Feet (in/sec)
Large Bulldozer	0.089
Caisson Drilling	0.089
Loaded Trucks	0.076
Rock Breaker	0.059
Jackhammer	0.035
Small Bulldozer/Tractors	0.003

Notes:
[1] 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 Federal Transit Administration, *Transit Noise and Vibration Impact Assessment Manual Table 7-4*, 2018; D = the distance from the equipment to the receiver.

Source: Federal Transit Administration, Transit Noise and Vibration Impact Assessment Manual, 2018.

The nearest sensitive receptors to the Project site are the residential uses approximately 25 feet to the west from the proposed active construction zone. As shown in **Table 4.13-6**, at 25 feet, construction equipment vibration velocities would not exceed 0.089 in/sec PPV, which is below the FTA's 0.20 PPV threshold. It is also acknowledged that construction activities would occur throughout the Project site and would not be concentrated at the point closest to the nearest

residential structure. Therefore, vibration impacts associated with the proposed Project would be less than significant.

Operations

The Project proposes a residential development that would not involve railroads or substantial heavy truck operations. Rather, the Project would remove the existing trucking warehouse, removing the groundborne vibration associated with the existing truck operations. Thus, the Project would not generate groundborne vibration that could be felt at surrounding uses. As a result, impacts from vibration associated with Project operations would be less than significant.

4.13c Would the project be 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?

Less Than Significant Impact. The closest airport to the Project site is Goodyear Blimp Base Airport, located approximately 1.87 miles to the southeast. This is a private airship base used as the base of operations for Goodyear Blimps. This airship base would not expose people residing or working in the Project area to excessive airport- or airstrip-related noise levels. Additionally, the Project is not within an airport land use plan or within 2.0 miles of a public airport or public use airport. Therefore, impacts would be less than significant.

Cumulative Noise Impacts

The Project's construction activities would not result in a substantial temporary increase in ambient noise levels. As discussed in Threshold 6.1, the City permits construction activities between 7:00 AM and 6:00 PM on weekdays, between 9:00 AM and 6:00 PM on Saturdays and prohibits construction activities on Sundays and federal holidays. There would be periodic, temporary, noise impacts that would cease upon completion of construction activities. The Project would contribute to other proximate construction noise impacts if construction activities were conducted concurrently. However, based on the noise analysis above, the Project's construction-related noise impacts would be less than significant following compliance with the GMC. Given that noise dissipates as it travels away from its source, operational noise impacts from on-site activities and other stationary sources would be limited to the Project site and vicinity. Thus, cumulative operational noise impacts from related projects, in conjunction with Project-specific noise impacts, would not be cumulatively significant.

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

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. The City's current population as of January 1, 2019 is approximately 61,042 persons.[47] The City's housing stock totaled 21,873 DU with approximately 2.87 persons per household (PPH).

No employment-generating land uses or extension of roads capable of inducing direct/indirect population growth in the City are proposed. However, the Project proposes development of a residential community consisting of 114 attached townhomes. Assuming 114 DU and 2.87 PPH, the Project's forecast population growth is approximately 327 persons. Therefore, the Project would induce direct population growth in the City by proposing new homes. The Project's forecast population growth would increase the City's existing population of approximately 61,042 persons by less than one percent (approximately 0.54 percent). Additionally, it is the City's goal (GGP Land Use Goal 1) to "preserve and protect existing single-family and low/medium-density residential neighborhoods while promoting the development of additional high-quality housing types in the City." The proposed Project would be in furtherance of this goal by providing additional housing types in the City. The Project's nominal population growth is not considered substantial in a City-wide context. Therefore, the Project would result in a less than significant concerning population growth, and no mitigation is required.

[47] California Department of Finance. (2018). E-5 Population and Housing Estimates for Cities, Counties, and the State, 2011-2018 with 2010 Census Benchmark.

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

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

4.15 Public Services

Environmental Issue	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	

Impact Analysis

4.15a Fire Protection?

Less Than Significant Impact. The City contracts the Los Angeles County Fire Department (LACFD) to provide fire protection and emergency medical services for the City. LACFD operates two fire stations within the City: Fire Station 158, located at 1650 West 162nd Street, and Fire Station 159, located at 2030 West 135th Street. The closest fire station to the Project site is Station #158, approximately 1.0 mile to the north. The population growth associated with the Project would incrementally increase the demand for fire protection and emergency medical services to the Project site. However, the LACFD Fire Prevention Division has reviewed the Project and specified access and water system requirements, which would enhance the proposed development's fire protection. LACFD Fire Prevention Division granted clearance of the Project's tentative tract map on May 24, 2019 and the Project would be required to comply with standard LACFD conditions of approval.

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, thus, no environmental impact would occur in this regard.

4.15b Police Protection?

Less Than Significant Impact. Police protection services would be provided by the City of Gardena Police Department (GPD). The GPD has 83 police officers and 19 part-time employees. The closest police station is located at 1718 West 162nd Street, approximately 1.0 mile north of the Project site.

The population growth associated with the Project would incrementally increase the demand for police protection services to the Project site. However, through the City's Site Plan Review process, the GPD would review the Project concerning access and other safety measures, which would enhance the proposed development's police protection. 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, thus, no environmental impact would occur in this regard.

4.15c Schools?

Less Than Significant Impact. The Project site is within Los Angeles Unified School District (LAUSD) boundaries. The public schools listed below would serve the proposed Project.[48]

- 186th Street Elementary School (K-5),
- Peary Middle School (6-8), and
- Gardena High School (9-12).

Various private schools serving Kindergarten through 12th grades also exist in the Project area.

Based on 114 DU and LAUSD's student generation factor of 0.437 students per new DU, the proposed Project is forecast to generate approximately 50 new students to the LAUSD.[49] The student population growth associated with the Project would incrementally increase the demand for school facilities/services. However, the Project would be subject to payment of school impact fees in accordance with Senate Bill 50 (SB50). 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…" Therefore, Project impacts to schools 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 school facilities, thus, no environmental impact would occur in this regard.

4.15d Parks?

Less Than Significant Impact. See Response 4.16 below.

4.15e Other public facilities?

Less Than Significant Impact. Los Angeles County Library operates 84 community-based library outlets, including four bookmobiles in 51 of 88 cities and unincorporated areas.[50] Los Angeles

[48] Los Angeles Unified School District. (2018). Retrieved from https://www.arcgis.com/home/webmap/viewer.html?webmap=e32c5cd92bf74e19acafb26752b63f0a.

[49] Los Angeles Unified School District. (2018). Developer Fee Justification Study, Table 3: LA Unified Student Generation Factors. Roseville, CA: Schoolworks, Inc.

[50] LA County Library. (2018). Public Libraries. https://www.lacounty.gov/things-to-do/libraries-museums/public-libraries/.

County Library is responsible for maintenance and library improvements to meet future library service's needs. The population growth associated with the Project would incrementally increase the demand for library services, and specifically at the Gardena Mayme Dear Library located at 1731 West Gardena Boulevard, Gardena. The Library system has developed a Strategic Plan that identifies goals and objectives including financial management and fundraising strategies to maintain and enhance library facilities to meet future demands. Given the Project's nature and scope, 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/ physically altered library protection facilities, thus, no environmental impact would occur in this regard.

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	

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. GMC §18.16.050 and §18.18.010 require 600 SF/DU of open space divided between common and private open space; at least 150 SF/DU must be private open space, 200 SF/DU must be common open space, and 250 SF/DU can be either. The Project includes approximately 1.12 acres (48,727 SF) of common open space, including a central recreational area with a swimming pool, paseos, a pocket park, and trail). Also, approximately 21,279 SF of private open space is proposed, including approximately 14,059 SF within private patios and approximately 7,220 SF within private balconies.

Under GMC Chapter 17.20, the City requires dedication of land, payment of fees, or a combination of both for park or recreational purposes. GMC §17.20.030 specifies that a minimum of 3.0 acres of usable park area is required per 1,000 persons residing within the subdivision. Based on U.S. Census and 2.9 persons per household, the Project's forecast population growth is approximately 331 persons.[51] Based on this forecast population growth and the City's park area target of 3.0 acres per 1,000 persons, the Project would create a demand for approximately 0.99

[51] Note, assuming 114 DU and 2.87 PPH consistent with the California Department of Finance, the Project's forecast population growth is approximately 327 persons; see California Department of Finance. (2018). *E-5 Population and Housing Estimates for Cities, Counties, and the State, 2011-2018 with 2010 Census Benchmark*. However, for this analysis, U.S. Census persons per household is used for compliance with GMC requirements.

acres of usable park area. A condition of approval will be imposed requiring the Developer to comply with GMC requirements and pay a park and recreation fee under the Subdivision Map Act and GMC Chapter 17.20.

Considering the active open spaces that provide for onsite recreational areas and payment of fees, the Project would result in a less than significant impact concerning recreational facilities and no mitigation is required.

The environmental effects associated with the proposed recreational facilities are analyzed throughout this Initial Study. As concluded in this Initial Study, the Project's environmental effects would be less than significant, following compliance with the established regulatory framework and COA.

COA REC-1 **Recreational Facilities**. The developer shall pay in lieu park fees in accordance with Gardena Municipal Code Chapter 17.20. Total in lieu park fees shall be paid in full to the City prior to Final Map.

4.17 Transportation

This Section is based on the *Melia 178th Street Project - Trip Generation Analysis Memorandum* (Kimley-Horn, May 2019), which is included in its entirety in **Appendix H: Trip Generation Analysis.**

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	

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.

Circulation System (Including Roadways)

The Project site is currently occupied by an active trucking warehouse use (i.e., RoadEx America). The Project proposes to remove this existing use and, in its place, develop a residential community consisting of 114 three-story, attached townhomes. Therefore, the trips currently associated with the Project site would be taken as a trip credit to offset the new trips that would be generated by the proposed Project.

Trip generation estimates for the existing trucking warehouse have been developed by collecting AM and PM peak hour traffic count data at the two existing site driveways on 178th Street. Trip generation estimates for the proposed Project are based on the ITE *Trip Generation Manual* (10th Edition) trip generation rates for ITE Land Use 221 – Multifamily Residential – Mid-Rise (3 – 10 stories). Summaries of the data collection and trip generation analysis are presented below.

Existing Trucking Warehouse Trip Generation

Traffic count data was collected at the Project site driveways on Monday, March 25, 2019 from 6:00 AM to 9:00 AM, and from 3:00 PM to 7:00 PM, for a total of seven hours of data collection. The driveway counts included a separate tally of passenger cars and trucks.

The data collection also included counts of pedestrians walking to/from the Project site. Throughout the data collection period, individuals were observed parking on 178th Street or Denker Avenue and walking to/from the Project site. The street parking in the area was observed to be heavily occupied during the daytime hours. During the seven-hour data collection period, as many as 78 pedestrians were observed entering/exiting the Project site during the AM peak hour. These pedestrians were assumed to be trucking warehouse employees or visitors, and therefore were counted as vehicular trips associated with the existing trucking warehouse.

Table 4.17-1: Summary of RoadEx Driveway Traffic Data Collection summarizes the existing AM and PM peak hour period site trips, for passenger cars, trucks, and pedestrians. As indicated in **Table 4.17-1**, passenger cars, trucks, and pedestrians generate approximately 63 AM peak hour trips and 64 PM peak hour trips.

TABLE 4.17-1: SUMMARY OF ROADEX DRIVEWAY TRAFFIC DATA COLLECTION

Period	Type of Trip[1]	Trips During Entire Data Collection Period[2]	Trips During Peak Hour[2, 3]
AM (Morning) (6:00 AM to 9:00 AM)	Passenger Cars	16	7
	Trucks	47	20
	Sub-Total	***63***	***27***
	Pedestrians	78	36
	Total Morning	***141***	***63***
PM (Evening) (3:00 PM to 7:00 PM)	Passenger Cars	33	15
	Trucks	76	21
	Sub-Total	***109***	***36***
	Pedestrians	66	28
	Total Evening	***175***	***64***
Total AM and PM Trips		***316***	***127***

Notes:

For purposes of reporting data collection results at the Project site driveways:

- Cars = Passenger cars entering or exiting the site driveways.
- Trucks = Trucks entering or exiting the site driveways.
- Pedestrians = Individuals observed parking on the street and walking to/from the Project site.

Accounts for both inbound and outbound movements (i.e., trips).

Highest single hour of traffic during the AM and PM data collection periods.

Source: Kimley-Horn, Melia 178th Street Project - Trip Generation Analysis Memorandum, Kimley-Horn, May 2019.

Proposed Project Trip Generation

The trip generation estimates for the proposed Project are summarized on **Table 4.17-2: Comparison of Project Trip Generation**. Based on the ITE trip generation rates for Multifamily Residential – Mid-Rise, the proposed Project is estimated to generate 620 average daily trips (ADT), with 41 AM peak hour trips and 51 PM peak hour trips.

TABLE 4.17-2: COMPARISON OF PROJECT TRIP GENERATION
EXISTING: ROADEX TRUCKING PROPOSED: MELIA HOMES MULTIFAMILY RESIDENTIAL

Land Use	ITE Code	Unit	Trip Generation Rates [1]						
			Daily	AM Peak Hour			PM Peak Hour		
				In	Out	Total	In	Out	Total
RoadEx Trucking Business	***Site traffic volumes based on peak period driveway counts - March 2019***								
Multifamily Housing (Mid-Rise)	221	DU	5.440	0.094	0.266	0.360	0.268	0.172	0.440
Land Use	**Quantity**	**Unit**	**Trip Generation Estimates**						
			Daily	**AM Peak Hour**			**PM Peak Hour**		
				In	**Out**	**Total**	**In**	**Out**	**Total**
Existing Use									
RoadEx Trucking Business - Vehicles			n/a	13	14	27	16	20	36
Pedestrians to and from RoadEx [2]			n/a	26	10	36	9	19	28
Total Existing Trips			n/a	39	24	63	25	39	64
Proposed Use									
Multifamily Housing (Mid-Rise)	114	DU	620	11	30	41	31	20	51
Net Difference (Proposed Minus Existing)			***n/a***	***-28***	***6***	***-22***	***6***	***-19***	***-13***

Notes:
[1] Source: Institute of Transportation Engineers (ITE) Trip Generation Manual, 10th Edition
[2] Throughout the data collection period, individuals were observed parking on 178th Street or Denker Avenue and walking to and from the RoadEx property. Each pedestrian entering or exiting the RoadEx site is assumed to be a RoadEx employee or visitor and is counted as a vehicular trip associated with the existing RoadEx business.

Trip Generation Analysis

As previously noted, the Project proposes to remove the existing trucking warehouse. Therefore, the trips currently associated with the Project site would be taken as a trip credit to offset the new trips that would be generated by the proposed Project.

Table 4.17-2 summarizes the existing site trips and proposed Project trips. When the existing trips generated by the trucking warehouse are subtracted from the proposed Project trip generation estimates, the Project would result in -22 AM peak hour trips and -13 PM peak hour trips. Thus, the Project would result in a net decrease in peak hour trips.

Surrounding Roadways Analysis

In addition to the existing traffic levels currently associated with the Project site, two traffic-related conditions exist on the surrounding street system:

- As previously mentioned, individuals were observed parking on the street and walking to/from the Project site. During the seven-hour data collection period, as many as 78 pedestrians were observed entering or exiting the Project site; see **Table 4.17-2**.
- During the data collection period, several large trucks were observed parked along 178th Street, or pulled over, idling and waiting for an opening on the Project site. **Table 4.17-3: Summary of Truck Activity on 178th Street** summarizes the instances observed, along with the time of day and duration. **Exhibit 4.17-1: Truck Activity on 178th Street** provides photographs of some trucks observed parked or waiting on 178th Street.

Project implementation would remove the existing trucking warehouse, thus, removing the associated trucking activities including the street parking and idling described above. Therefore, circulation and capacity on the street system serving the Project site would improve with Project implementation.

TABLE 4.17-3: SUMMARY OF TRUCK ACTIVITY ON 178TH STREET

Activity on 178th Street	Time of Day	Duration
Several trucks parked – both sides of street	Trucks were parked on 178th Street when the data collectors arrived at 6:00 AM	Unknown
1 truck parked – north side of street	Prior to 6:00 AM to 7:35 AM	1 hour 35 minutes
1 truck waiting – south side of street	7:25 to 7:35 AM	10 minutes
1 truck waiting – north side of street	2:48 to 2:58 PM	10 minutes
1 truck waiting – north side of street	3:43 to 3:59 PM	16 minutes
1 truck waiting – north side of street	4:07 to 4:10 PM	3 minutes
1 truck waiting – north side of street	4:52 to 5:07 PM	15 minutes
1 truck waiting – north side of street	5:44 to 5:57 PM	13 minutes
1 truck waiting – south side of street	6:09 to 6:15 PM	6 minutes

As demonstrated by the trip generation and surrounding roadways analyses presented above, the Project would improve existing conditions, thus, would not conflict with a program plan, ordinance, or policy addressing the circulation system. Therefore, the Project would result in a less than significant impact, and no mitigation is required.

Transit Facilities

Transit service to the Project area is provided by LA Metro, which serves the greater Los Angeles metropolitan area, and by GTrans, the City of Gardena transit service. The bus stops closest to the Project site are located:

- On the east and west sides of Normandie Avenue, north and south of 178th Street, approximately 1,405 feet and 1,426 feet from the Project site; and
- On the east side of South Western Avenue, south of Artesia Boulevard, approximately 1,648 feet from the Project site.

Bus routes serving the Project area are described below.

LA Metro Route 125 operates between the Cities of Norwalk and El Segundo, traveling through the City of Gardena along Rosecrans Avenue in the Project vicinity. Route 125 operates on weekdays from approximately 4:30 AM to 10:00 PM, with 15- to 25-minute headways (the time between bus arrivals); on Saturdays from approximately 5:00 AM to 9:15 PM and on Sundays and Holidays from approximately 6:00 AM to 8:45 PM with approximately 30-minute headways.

GTrans Line 4 operates between the 147th Street/Hawthorne Boulevard to Harbor Gateway Transit Center, traveling along Normandie Avenue in the Project vicinity. Line 4 operates on weekdays from approximately 5:25 AM to 7:05 PM with 15- to 55-minute headways. Line 4 does not operate on weekends.

GTrans Line 2 operates on a loop between PCH and Imperial Highway, traveling along South Western Avenue in the Project vicinity. Line 2 operates on weekdays from approximately 4:40 AM to 10:00 PM with 15- to 30-minute headways. On weekends, Line 2 operates from approximately 5:00 AM to 9:30 PM with 40- to 40-minute headways.

The Project would continue to be served by the existing transit system. The population growth associated with the Project would incrementally increase the demand for public transit services. However, the Project would not conflict with a program plan, ordinance, or policy addressing transit. Therefore, the Project would result in a less than significant impact, and no mitigation is required.

Trucks Parked on 178th Street Prior to 6:00 AM Data Collection

Truck Waiting on South Side of 178th Street - 7:25 - 7:35 AM

Truck Waiting on North Side of 178th Street - 2:48 - 2:58 PM

Truck Waiting on South Side of 178th Street - 6:09 - 6:15 PM

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Bicycle Facilities

Normandie Avenue is designated as a Class III bike route, which are identified by signage along the street that denotes "BIKE ROUTE." However, there is currently no bike route signage along Normandie Avenue in the Project vicinity. The population growth associated with the Project could incrementally increase the usage of this bike route and others throughout the City. However, the Project would not conflict with a program plan, ordinance, or policy addressing bicycle facilities. Additionally, the Project proposes a visitor bicycle rack (for two bicycle parking stalls). Therefore, the Project would result in a less than significant impact, and no mitigation is required.

Pedestrian

A pedestrian sidewalk is currently provided along Project site frontage at West 178th Street. The Project would not interfere with use of this sidewalk. The Project proposes pedestrian access via the primary entrance on West 178th Street. Additionally, a natural area with decomposed granite (DG) trail along the northern property boundary is proposed for pedestrian use. The Project would not conflict with a program plan, ordinance, or policy addressing bicycle facilities. Therefore, the Project would result in a less than significant impact, and no mitigation is required.

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

No Impact. State CEQA Guidelines §15064.3 codifies the change from Level of Service to VMT as a metric for transportation impact analysis. Pursuant to Senate Bill (SB) 743, VMT analysis is the primary method for determining CEQA impacts. Jurisdictions are not required to adopt VMT as a significant impact determination until July 2020, unless jurisdictions move forward with establishing VMT thresholds ahead of the deadline. As of this writing, the City of Gardena has not adopted a VMT threshold, therefore VMT was not analyzed. Concerning implementation of VMT, the recently amended State CEQA Guidelines mandate that the new methodology will apply prospectively only and will not affect projects that have already commenced environmental review. State CEQA Guidelines §15064.3(c); 15007. Therefore, the Project would not conflict or be inconsistent with State CEQA Guidelines §15064.3(b). No impact would occur in this regard, 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)?

No Impact. The proposed Project does not include the use of any incompatible vehicles or equipment on-site, such as farm equipment. The Project would not provide any off-site roadway improvements that could substantially increase hazards due to a design feature. The Project is compatible with the surrounding land uses. All on-site and site-adjacent improvements, including traffic signing/striping and Project driveways, would be constructed as approved by the City of Gardena Park Public Works Department. Sight distance at Project access points would comply

with applicable City of Gardena/California Department of Transportation sight distance standards. Therefore, no impact would occur, and no mitigation is required.

4.17d Would the project result in inadequate emergency access?

Less Than Significant Impact. Primary vehicular access to the Project site is proposed via a two-way driveway at the southern boundary at West 178th Street. Vehicular metal sliding gates designed to meet GFD standards and a visitor kiosk/pilaster (with telephone keypad) are proposed at the main entry. A secondary/emergency vehicle access equipped with a Fire Department Knox box is proposed at the Project site's southwestern corner at 178th Street. Pedestrian access is proposed via the primary entrance on West 178th Street. The LACFD Fire Prevention Division 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. Following compliance with LACFD access requirements, adequate emergency access to the Project site would be provided. Impacts would be less than significant, and no mitigation is required.

4.18 Tribal Cultural Resources

This Section is based on the *Assembly Bill 52 and Senate Bill 18 Communications initiated by the City of Gardena*. The documents for the initiation process are included in **Appendix B2: 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); or		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		

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); or

4.18aii 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 Impact With Mitigation Incorporated.

Assembly Bill 52

Chapter 532 Statutes of 2014 (i.e., Assembly Bill 52 (AB52)) requires that lead agencies evaluate a project's potential impact on "tribal cultural resources," which include "[s]ites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native American tribe that are eligible for inclusion in the California Register of Historical Resources or included in a local register of historical resources." AB52 also gives lead agencies the discretion to determine, based on substantial evidence, whether a resource qualifies as a "tribal cultural resource."

In compliance with PRC §21080.3.1(b), the City provided formal notification to California Native American tribal representatives identified by the California NAHC. Native American groups may have knowledge about the area's cultural resources and may have concerns about a development's adverse effects 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 B2**.

AB52 Native American Group Contacted:

- Gabrieleno Band of Mission Indians-Kizh Nation, Andrew Salas.

On February 19, 2019, the City received a request for consultation pursuant to AB52 from the Gabrieleno Band of Mission Indians-Kizh Nation. In response to this request, the City engaged with the Gabrieleno Band of Mission Indians-Kizh Nation in consultation on the Project, and a telephone meeting was held May 22, 2019. The parties agreed to impose mitigation measures to mitigate potential impacts to tribal cultural resources, thus concluding consultation pursuant to AB52 requirements. Following compliance with MMs TCR-1 and TCR-2, potential impacts to tribal cultural resources would be reduced to less than significant.

Senate Bill 18

Chapter 905 Statutes of 2004 (i.e., Senate Bill 18 (SB18) requires that lead agencies, "prior to the adoption or amendment of a city or county's general plan, conduct consultations with California Native American tribes for the purpose of preserving specified places, features, and objects that are located within the city or county's jurisdiction. The bill would define the term "consultation" for purposes of those provisions. By imposing new duties on local governments with respect to consultations regarding the protection and preservation of California Native American historical, cultural, and sacred sites, the bill would impose a state-mandated local program." In compliance with PRC §21080.3.1(b), 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 the area's cultural resources and may have concerns about a development's adverse effects on tribal cultural resources, as defined in PRC §21074. The City contacted the tribal representatives noted below. Correspondence to and from tribal representatives is included as **Appendix B2**.

As of this Initial Study's release date, the City has not received a request for consultation pursuant to SB18.SB18 Native American Groups Contacted:

- Gabrielino/Tongva Nation, Sandonne Goad,
- Gabrielino-Tongva Indians of California Tribal Council, Robert Dorame,
- Gabrielino-Tongva Tribe, Charles Alvarez,
- Gabrieleno/Tongva San Gabriel Band of Mission Indians, Anthony Morales, and
- Gabrieleno Band of Mission Indians-Kizh Nation, Andrew Salas.

As discussed in Response 4.9b, the Project site has been extensively altered by prior ground disturbance and development. However, there is the potential for the Project to affect previously unidentified Native American tribal cultural resources. Construction activities would include excavation and grading. With implementation of MMs TCR-1 and TCR-2, potential impacts to tribal cultural resources would be less than significant.

Mitigation Measures

MM TCR-1 **Retain a Native American Monitor/Consultant:** Prior to Grading Permit issuance, the Project Applicant shall retain and compensate for the services of a Tribal monitor/consultant who is both approved by the Gabrieleño Band of Mission Indians-Kizh Nation Tribal Government and listed under the Native American Heritage Commission's (NAHC) Tribal Contact list for the Project area. The NAHC provides this list. The monitor/consultant shall only be present onsite during the construction phases that involve the following ground-disturbing activities: grading, excavation, and trenching, within the Project area. The Tribal Monitor/consultant shall complete daily monitoring logs that provide descriptions of the day's activities, including construction activities, locations, soil, and any cultural materials identified. The on-site monitoring shall end when the ground-disturbing activities are completed, or when the Tribal Representatives and monitor/consultant have indicated that the site has a low potential for impacting Tribal Cultural Resources.

MM TCR-2 **Unanticipated Discovery of Tribal Cultural and Archaeological Resources:** Upon discovery of any archaeological resources, construction activities shall cease in the find's immediate vicinity until the find can be assessed. All archaeological resources unearthed by ground-disturbing activities shall be evaluated by an archaeologist meeting the Secretary of the Interior's Professional Qualifications Standards for archaeology (National Park Service 1983) and tribal monitor/consultant approved by the Gabrieleño Band of Mission Indians-Kizh Nation. If the resources are Native American in origin, the Gabrieleño Band of Mission Indians-Kizh Nation shall coordinate with the landowner regarding treatment and curation of these resources. Typically, the Tribe requests reburial

or preservation for educational purposes. Work may continue elsewhere on the Project site while evaluation and, if necessary, mitigation takes place (State CEQA Guidelines §15064.5 [f]). If the archaeologist determines that the resource constitutes a "historical resource" or "unique archaeological resource," time allotment and funding sufficient to allow for implementation of avoidance measures or appropriate mitigation shall be made available. The treatment plan established for the resources shall be in accordance with State CEQA Guidelines §15064.5(f) for historical resources and Public Resources Code § 21083.2(b) for unique archaeological resources. Preservation in place (i.e., avoidance) is the preferred manner of treatment. If preservation in place is infeasible, treatment may include implementation of archaeological data recovery excavations to remove the resource along with subsequent laboratory processing and analysis. Any historic archaeological material that is not Native American in origin shall be curated at a public, non-profit institution with a research interest in the materials, such as the Natural History Museum of Los Angeles County or the Fowler Museum, if such an institution agrees to accept the material. If no institution accepts the archaeological material, they shall be offered to a local school or local historical society for educational purposes.

4.19 Utilities and Service Systems

This Section is based on the *Sanitary Sewer Analysis* (C&V Consulting, Inc. Revised July 2019) (Sewer Analysis), which is included in its entirety in **Appendix I: Sanitary Sewer Analysis.**

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 facilities concerning the following, the construction or relocation of which could cause significant environmental effects? i. Water, ii. Wastewater, iii. Wastewater Treatment (see Response 4.19.c below), iv. Stormwater Drainage, v. Electric Power, Natural Gas, and Telecommunications.			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 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	

Impact Analysis

4.19a Require or result in the relocation or construction of new or expanded facilities concerning the following, the construction or relocation of which could cause significant environmental effects?

i. Water,

Less Than Significant Impact. See Response 4.19b below.

ii. Wastewater,

iii. Wastewater Treatment,

Less Than Significant Impact. See Response 4.19.c below.

iv. Stormwater Drainage,

Less Than Significant Impact. Refer to Response 4.10c concerning drainage patterns and stormwater drainage systems. As discussed in Response 4.10c, the Project proposes on-site drainage improvements. No off-site drainage improvements are proposed. The environmental effects associated with the proposed drainage improvements are analyzed throughout this Initial Study. As concluded in this Initial Study, the drainage improvements' environmental effects would be less than significant, following compliance with the established regulatory framework. No mitigation is required.

i. Electric Power, Natural Gas, and Telecommunications.

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 operated and maintain transmission and distribution infrastructure in the Project area, which currently serves the Project site. Refer to Responses 4.6a and 4.6b for further discussions concerning electricity and natural gas usage. The Project's anticipated electricity demand would be approximately 491,045 kWh per year. The Project's anticipated natural gas demand (approximately 1,078,980 cubic feet per year). The Project proposes to connect to existing electrical, natural gas, and telecommunications infrastructure, and no off-site improvements are proposed. The environmental effects associated with the necessary on-site electrical, natural gas, and telecommunications improvements are analyzed throughout this Initial Study. As concluded in this Initial Study, the improvements' environmental effects would be less than significant, following compliance with the established regulatory framework. 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 GSWC supplies water to the Project site. GSWC's *Final Draft 2015 Urban Water Management Plan - Sou*thwest (UWMP) Tables 7-2, 7-3, and 7-4 indicate water supplies would meet the service area's water demands for normal, single-dry, and multiple dry-year conditions through 2040. UWMP water demand forecasts are based on adopted General Plans.

The 5.63-acre Project site is designated Industrial with a Mixed-Use Overlay. The Mixed-Use Overlay permits residential development on selected areas designated for commercial and industrial land uses. For lots greater than 1.0 AC, the maximum allowed intensity and density (stepped density) within the Mixed-Use Overlay designation are a floor-area ratio (FAR) of 0.5 and 30 DU/AC and a minimum density of 20 DU/AC. Based on a 5.63-acre site and 30 DU/AC, the Project site's maximum residential development capacity is 170 DU, based on the current Mixed-Use Overlay designation. The Project proposes 114 DU at a density of 20.36 DU/GAC, which would not exceed the site's maximum allowable density of 30 DU/AC and maximum residential development capacity of 170 DU, based on the current Mixed-Use Overlay designation. Thus, the Project would not increase growth beyond the General Plan's projections, which are the basis for the UWMP water demand forecasts.

The Project proposes General Plan Amendment GPA #2-18 to change the GGP land use designation from Industrial with a MUO to High-Density Residential. Further, GSWC has analyzed the proposed Project to determine if sufficient water supplies are available to serve the Project from existing entitlements and resources. GSWC has confirmed water service would be available to the Project site from GSWC's Southwest District water system, and service could be provided from their existing water facilities within West 178th Street.[52] Thus, GSWC would have adequate water supplies from existing entitlements. Project impacts concerning water demand would be less than significant, and no mitigation is required. Further, GSWC provides conservation programs along with incentives to conserve water in the City. Although the GSWC service area population is expected to increase, the overall baseline potable demand in acre-feet per year (AFY) is expected to decrease due to further water use efficiency and recycled water programs.[53]

The Project proposes on-site water improvements and one connection (at the site's primary entrance) to an existing 12-inch water main within West 178th Street. No off-site water improvements are proposed. The environmental effects associated with the proposed water improvements are analyzed throughout this Initial Study. As concluded in this Initial Study, the water improvements' environmental effects would be less than significant, following compliance with the established regulatory framework. No mitigation is required.

[52] J. Zhao, P.E., PhD., personal communication (*Will Serve Letter for 1515 W. 178th Street)*, September 25, 2018.

[53] Golden State Water Company. (2016). *2015 Urban Water Management Plan – Southwest*. Rancho Cordova, CA: Kennedy/Jenks Consultants.

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 projected demand in addition to the provider's existing commitments?

Less Than Significant Impact.

Wastewater Generation and Infrastrustructure

The Project's wastewater flow is estimated at approximately 0.1393 cfs, which would increase the overall downstream system by approximately 41.7 percent at peak flow rates.

The Project site is within the jurisdictional boundaries of Sanitation Districts of Los Angeles County Sanitation District No. 5 (LACSD). The Project's wastewater would discharge to the local sewer line for conveyance to a LACSD's trunk sewer. Access to the City's sanitary sewer system would be provided with connection to an existing 8-inch line within West 178th Street, at the site's southwest corner. The existing 8-inch sewer line, located approximately 2.0 feet south of the northerly right-of-way, flows westerly in West 178th Street. At the Project site's southwest corner, the existing 8-inch sewer main connects to an existing sewer manhole (Manhole #1). Existing flows from the site, the commercial buildings to the south, 71 existing single-family residential dwellings to the south/southeast, and the mobile home park to the west are all tributary to existing Manhole #1. Flows continue to drain in the westerly direction to an existing sanitary sewer lift station located near the northwest corner of the West 178th Street at La Salle Avenue intersection. The lift station discharges flows via an existing 6-inch Schedule 40 pipe to an existing LACSD 57-inch trunk sewer (Joint Outfall "D", Unit 2, Section 3) that continues to flow in the southerly direction within La Salle Avenue. The existing and proposed development peak flows for the manholes and pump are detailed in **Appendix I**.

The Sewer Analysis concludes that considering the proposed development peak flows in addition to the monitored and calculated existing peak flow rates, there is an increased impact to the downstream existing sanitary sewer system, however the potential increase is within acceptable agency standards. Considering the manhole monitoring and sewer generation rate, the overall total future peak flow rate, including the proposed development is approximately 0.3210 cfs (207,500 gpd). The Sewer Analysis also concluded the increased overall future peak flow rate of approximately 335.89 gpm of (0.7583 cfs) can be maintained within the existing pump systems operating capacity. Although, the proposed development increases the overall downstream pipe capacity, the existing pipe capacity is currently over the typical 50% maximum capacity requirement. Overall, the Sewer Analysis results indicate that the future peak flow rates produced by the proposed development would not significantly impact or exceed the maximum pump capacity within the downstream existing sewer lift station.

Therefore, the Project's effluent peak flow rates and volumes would not significantly impact or exceed the existing sewer capacity in the public sewer system or the existing sanitary sewer lift station. A less than significant impact would occur and no mitigation is required.

The Project proposes on-site wastewater improvements and one connection to an existing 8-inch line within West 178th Street, at the site's southwest corner. No off-site wastewater improvements are proposed/required. The environmental effects associated with the proposed wastewater improvements are analyzed throughout this Initial Study. As concluded in this Initial Study, the wastewater improvements' environmental effects would be less than significant, following compliance with the established regulatory framework. No mitigation is required.

Wastewater Treatment

The wastewater generated by the proposed Project would be treated at LACSD's Joint Water Pollution Control Plant located in the City of Carson. The Plant has a capacity of 400 mgd and currently produces an average recycled water flow of 254.6 mgd. The Project would generate approximately 0.1393 cfs (90,032 gallons per day (gpd)). The HSC empowers the LACSD to charge a fee for the privilege of connecting to the LACSD's Sewage System for increasing the strength or quantity of wastewater discharged from connected facilities. The fee payment would be required before a permit to connect to the sewer is issued. Additionally, the Project would not require or result in the construction of new water treatment facilities or expansion of existing facilities.

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. Waste Resources of Gardena ("Waste Resources") provides solid waste and recycling services for the City's residential, commercial, and industrial customers. Waste Resources currently uses the Chiquita Canyon Sanitary Landfill for non-recyclable municipal solid waste by way of its transfer station Waste Resources Recovery, at 357 West Compton Boulevard, Gardena. Construction and demolition debris is sent either directly to a recycling partner or to California Waste Services for sorting and recycling.

The Project proposes to remove all existing on-site structures and surface parking lot and develop a residential community consisting of attached townhomes. State law requires a 65 percent diversion rate for construction and demolition (C&D) projects. The Gardena City Council has recently adopted Ordinance No. 1797 to update the GMC to comply with State law. Each C&D project for which a Building/Demolition Permit is applied for and approved must achieve the waste diversion performance standard or show a good faith effort to achieve that standard. Thus, the Project would be subject to compliance with Ordinance No. 1797, which would achieve compliance with State law.

Project implementation would increase solid waste disposal demands over existing conditions. Chiquita Canyon Sanitary Landfill is located at 29201 Henry Mayo Drive, Castaic, and its maximum permitted throughput is 6,000 tons per day (TPD). The facility's remaining capacity is approximately 8.6 million CY and maximum capacity is approximately 63.9 million CY,

respectively.[54] Thus, the Project would be served by a landfill with sufficient remaining permitted capacity to accommodate the Project's solid waste disposal needs. Therefore, the Project's solid waste disposal needs could be accommodated at one or a combination of the disposal facilities discussed above. Operational activities would be required to comply with all applicable federal, State, and local statues and regulations for solid waste, including those identified under the 2016 (or most recent) CALGreen and AB 939. In 2018, all projects subject to the City's diversion program met or exceeded the 65 percent requirement. The Project would result in less than significant impacts concerning solid waste, and no mitigation is required.

[54] California Department of Resources Recycling and Recovery (CALRecycle). (2018). *Solid Waste Information System (SWIS)* Chiquita *Canyon Sanitary Landfill (19-AA-0052)*. Retrieved from https://www2.calrecycle.ca.gov/swfacilities/Directory/19-AA-0052/.

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

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

No Impact. According to CalFire Fire Hazard Severity Zone Map for the City of Gardena, the Project site is not within a State Responsibility Area. The Project site is in a Non-Very High Fire Hazard Severity Zone (VHFHSZ) zone within a local responsibility area.[55] Project design and site access would adhere to LCFD regulations and designs. Further, Project construction would not require the complete closure of any public or private streets during construction. Temporary construction activities would not impede use of the streets for emergencies or access for emergency response vehicles. Therefore, the Project would not result in inadequate emergency access, and no impact would occur.

[55] CalFire. (November 2007). *Los Angeles County FHSZ Map.* Retrieved from http://www.fire.ca.gov/fire_prevention/fhsz_maps_losangeles

b) Would the project, due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?

No Impact. As discussed above, the Project is not within an area classified as very high fire hazard severity zone. Therefore, no impacts would occur.

c) Would the project require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?

No Impact. As discussed above, the Project is not within an area classified as very high fire hazard severity zone. The Project site is surrounded by development in an urbanized area of the City. The Project would tie into existing infrastructure that currently serves the Project site. Project implementation would not result in the new construction, installation, or maintenance of new infrastructure. No impact would occur.

d) Would the project expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?

No Impact. The Project is not within an area classified as very high fire hazard severity zone. The Project site and surrounding vicinity are relatively flat. There are no known landslides near the site nor is the site in the path of any known or potential landslides. Therefore, no impacts would occur.

4.21 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	

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

As concluded in Section 4.4, the Project would not 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, or 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. As also concluded in Section 4.5, following compliance with MM TCR-1 and TCR-2, potential impacts to archaeological resources would be reduced to less than significant.

As concluded in Section 4.18, the Project could cause an adverse change in the significance of a tribal cultural resource, unless mitigated. Following compliance with MM TCR-1 and TCR-2, potential impacts to tribal cultural resources would be reduced to less than significant.

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, hazards and hazardous materials, and tribal cultural resources. A Mitigation Program has been prepared for each of these environmental issue areas to reduce impacts to less than significant. Standard COA would also be imposed upon the Project. Other development projects within the City would also be subject to these requirements, as applicable.

All other Project impacts were determined either to have no impact or to be less than significant following compliance with the established regulatory framework, without the need for mitigation. Cumulatively, the proposed Project would not result in any significant impacts that would substantially combine with impacts of other current or probable future impacts; see also Responses 4.3d and 4.8b. 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 the respective sections, the proposed Project would have no potentially significant impacts. Standard conditions would be imposed upon the Project. The Project would not cause substantial adverse effects on human beings directly or indirectly. Therefore, impacts concerning adverse effects on human beings would be less than significant, and no mitigation is required.

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