

LEGEND:

- EXPLORATORY BORING
- PERCOLATION TEST

SCALE: 1" = 40'

ALLOCATIONS ARE APPROXIMATE

BASIS BY: SOH & ASSOCIATES "PRELIMINARY" GRADING PLAN, SYCAMORE HILLS BUSINESS CENTER, SHEET 2 OF 6, PLAN NOT DATED



SYCAMORE HILLS DISTRIBUTION CENTER

Percolation Test Map

Figure 5.6-4

Threshold F: *Will the Project directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?*

According to the Paleontological Resource Assessment conducted by AE, published geologic maps indicate the ground surface of the Project area consists of plutonic and medium- to high-grade metamorphic bedrock, both of which do not normally yield fossils. Museum records indicate no previously recorded vertebrate fossil localities within the Project area or from the types of rocks mapped within its boundaries. As a result, the County assigned a Low level of paleontological sensitivity to the entire Project area. Since no paleontological resources were found in or nearby the Project area during the field survey, the assessment concurs with the County's Low paleontological sensitivity ranking. Project related ground disturbance is not likely to impact significant paleontological resources in the Project area. Mitigation is not recommended unless a fossil is encountered during grading and other construction activities. If an unanticipated on-site fossil is discovered during construction, implementation of mitigation measure **MM GEO-1** is required to ensure potential impacts will be **less than significant with mitigation**.

5.6.6 Proposed Mitigation Measures

A DEIR is required to describe feasible mitigation measures, which could minimize significant adverse impacts (CEQA Guidelines, Section 15126.4). Mitigation measures were evaluated for their ability to eliminate the potential significant adverse impacts upon geology/soils or to reduce impacts to below the level of significance.

No significant impact with respect to people or structures due to seismic activity, seismic hazards, soil erosion, and unstable and unsuitable soils are anticipated as a result of the Project. For impacts related to paleontological resources, mitigation measure **MM GEO-1** is required in order to ensure no potential fossils are destroyed.

The following mitigation measure is needed to reduce the significance of potential geologic impacts.

MM GEO-1: If one or more fossils are discovered during construction, all ground disturbing activities within 50 feet of the area of the find shall be ceased and the applicant shall retain a paleontologist who meets the Society of Vertebrate Paleontology (SVP) qualifications standards for Project Paleontologist to oversee the documentation of the extent and potential significance of the finds as well as recovery efforts. Ground-disturbing activities may resume in the area of the finds at the discretion of the Project Paleontologist. If the fossils are significant per the SVP's 2010 criteria, then paleontological monitoring shall be conducted on an as-needed basis for further ground-disturbing activities in the Project Area.

Excluding **MM GEO-1**, no additional mitigation is required as General Plan policies PS-1.1 through 1.5 & Policy PS-9.9 would require that development not be located on unstable soils or geologically hazardous areas; Subdivision Code Sections 18.090.050, 18.200.010 & 020 require all developments to have geological studies identify and avoid/mitigate hazards and comply with erosion control standards; California Building Code Chapters, 15, 16, 18, and 33 require development to comply with the general design requirements; and the National Pollution

Discharge Elimination System (NPDES) which requires new development to prepare a Storm Water Pollution Prevention Plan (SWPPP), to help control runoff and erosion.

5.6.7 Cumulative Environmental Effects

The planned and pending projects near the Project site include residential development, warehouses, commercial, office, and public facilities. These planned and pending projects would increase structural development near the Project site, and in turn exposing new residents, employees, customers and property to potential risks from seismic hazards or soil instability in the area. Like the Project, all new planned and pending development in the City and adjacent jurisdictions would be subject to current seismic and erosion control standards. Although new development would be exposed to existing geologic and seismic hazards, it would not increase the potential for such hazards to occur. Geologic hazards are site-specific, and individual developments would not create additive impacts that would affect geologic conditions on another site. Therefore, because the Project and cumulative development projects will comply with current seismic and erosion control standards, cumulative impacts are **less than significant**.

Cumulative projects within the City have the potential to impact paleontological resources, the City's General Plan and General Plan EIR incorporate policies and programs to protect and/or document these resources as part of the City's development review process and mitigation measures that require preparation of technical studies, and the presence of monitors if necessary. Therefore, the General Plan EIR concluded that with adherence to and implementation of General Plan policies, mitigation measures, and standard Federal, State, and City regulations, cumulative impacts to historical resources, archaeological resources, and paleontological resources will be less than significant with mitigation. With implementation of mitigation measure **MM GEO-1** the potential for the Project to contribute to a cumulative impact is reduced to **less than significant levels**.

5.6.8 References

The following references were used in the preparation of this section of the DEIR:

AE 2020a	Applied EarthWorks, <i>Paleontological Resource Assessment for the Sycamore Hills Distribution Center Project, City of Riverside, Riverside County, California</i> . September 2020 (Appendix G)
GeoMat	GeoMat Testing Laboratories, Inc., Report of Preliminary Dep Percolation Testing, Proposed Commercial Building, APN 263-060-022, Riverside, California. July 2019 (Appendix G)
GP 2025	City of Riverside, General Plan 2025, certified November 2007 with subsequent amendments to various elements. (Available at https://riversideca.gov/cedd/sites/riversideca.gov.icedd/files/pdf/planning/general-plan/18_Public_Safety_Element_with%20maps.pdf , accessed August 2020.)

GP 2025 FPEIR	City of Riverside, General Plan 2025 Program Environment Impact Report (SCH# 2004021108), certified November 2007. (Available at https://riversideca.gov/cedd/sites/riversideca.gov.chedd/files/pdf/planning/general-plan/vol2/5-6_Geology_and_Soils.pdf , accessed August 2020.)
GPA 960 DEIR	County of Riverside, <i>County of Riverside Draft Environmental Impact Report No.521</i> , February 2015. (Available at https://planning.rctlma.org/Portals/14/genplan/general_plan_2015/DEIR%20521/04-12_GeologyAndSoils.pdf , accessed August 2020.)
NorCal Engineering	NorCal Engineering Soils and Geotechnical Consultants, <i>Geotechnical Engineering Investigation</i> , prepared March 29, 2019 and updated September 2020 (Appendix G)
Riverside County Mapping Portal	Riverside County Mapping Portal, Faults, Gis.countyofriverside.us , (Available at https://gis.opendata-countyofriverside.opendata.arcgis.com/datasets/faults , accessed December 14, 2020.)
RCMMC	Riverside County Information Technology, Geographic Information Services, Map My County, online GIS database (Available at https://gis.countyofriverside.us/Html5Viewer/?viewer=MMC_Public , accessed February 19, 2020.)
RMC	City of Riverside, Municipal Code. (Available at http://www.riversideca.gov/municode/ , accessed February 3, 2020.)
Soil Survey Staff	Soil Survey Staff, Natural Resource Conservation Service, United States Department of Agriculture. Web Soil Survey. Available online at http://websoilsurvey.nrcs.usda.gov/ . Accessed December 2019.
USDA	United States Department of Agriculture, List of Hydric Soils. 2018. Available online at: http://www.nrcs.usda.gov/wps/PA_NRCSCconsumption/download?cid=stelprdb1248596&ext=xlsx .
Wood	Wood Environmental & Infrastructure, Inc., <i>Jurisdictional Delineation Report, Sycamore Hills Distribution Center, City of Riverside, Riverside County, California</i> , December 2020 (Appendix D)

5.7 Greenhouse Gas Emissions

Based upon Appendix G of the *State CEQA Guidelines*, the analysis in the IS/NOP prepared for this Project (Appendix A), and comments received during the NOP public review period (Appendix A), this section evaluates the Project's impacts on Greenhouse Gas GHG emissions.

The analysis in this section is based on the *Greenhouse Gas Analysis for the Sycamore Hills Distribution Project* prepared by RECON (Appendix H, October 2020). The *Greenhouse Gas Analysis* evaluates the significance of the Project's GHG emissions based on screening levels recommended by the SCAQMD's Interim CEQA GHG Significance Thresholds. The California Emissions Estimator Model (CalEEMod) Version 2016.3.2 was used to calculate the Project's GHG emissions. An individual project cannot generate enough GHG emissions to effect a discernable change in global climate change. However, the Project may participate in this potential impact by its incremental contribution combined with the cumulative increase of all other sources of GHGs which, when taken together, may influence global climate change. Because these changes may have serious environmental consequences, this section will evaluate the potential for the Project to have a significant effect upon California's environment as a result of its potential contribution to the enhanced greenhouse effect.

5.7.1 Setting

Greenhouse Effect

The earth's natural warming process is known as the "greenhouse effect." Certain atmospheric gases act as an insulating blanket for solar energy to keep the global average temperature in a suitable range. These gases are called "greenhouse gases" (GHGs) because they trap heat like the glass walls of a greenhouse. The greenhouse effect raises the temperature of the earth's surface by about 60°F. With the natural greenhouse effect, the average temperature of the earth is about 45°F; without it, the earth would be about minus 15°F. It is normal for the earth's temperature to fluctuate over extended periods of time. Over the past 100 years, however, the earth's average global temperature has generally increased by one (1) °F. In some regions of the world, the increase has been as much as four (4) °F.

Scientists studying the particularly rapid rise in global temperatures during the late twentieth century believe that natural variability alone does not account for that rise. Rather, human activity spawned by the industrial revolution has resulted in increased emissions of CO₂ and other forms of GHGs, primarily from the burning of fossil fuels (during motorized transport, electricity generation, consumption of natural gas, industrial activity, manufacturing, etc.) and deforestation, as well as agricultural activity and the decomposition of solid waste. The most common GHG is CO₂, which constitutes approximately 84 percent of all GHG emissions in California. Worldwide, the State of California ranks as the 12th to 16th largest emitter of CO₂ and is responsible for approximately two percent of the world's CO₂ emissions. Scientists refer to the global warming context of the past century as the "enhanced greenhouse effect" to distinguish it from the natural greenhouse effect. While the increase in temperature is known as "global warming," the resulting change in weather patterns is known as "global climate change." Global climate change is evidenced in changes to wind patterns, storms, precipitation, and air temperature.

Global climate change is by definition a global issue and California's efforts to reduce GHG emissions will not alone change the impact of global climate change. Global concentrations of GHGs rather than locational GHG emissions result in adverse climate change impacts that differentially occur throughout the world. However, though global climate change ultimately calls for both national and international responses, states play a key role in addressing the issue. 23 U.S. states, including California, and the District of Columbia have adopted state-specific GHG emissions targets. Specifically, with the implementation of GHG policies, California's GHG emissions have decreased even while the State's population and economy have grown. In 2015, California's GHG emissions were 10 percent lower than when levels peaked in 2004, and the State's 2016 emissions decreased below 1990 levels for the first time since the 2004 peak.

Global Warming Potentials

There are numerous GHGs, both naturally occurring and manmade. Each GHG has a variable atmospheric lifetime and global warming potential (GWP). The atmospheric lifetime of the gas is the average time a molecule stays stable in the atmosphere. Most GHGs have long atmospheric lifetimes, remaining in the atmosphere for hundreds or thousands of years. GWP is a measure of the potential for a gas to trap heat and warm the atmosphere. Although GWP is related to its atmospheric lifetime, many other factors including chemical reactivity of the gas also influence GWP. GWP is reported as a unitless factor representing the potential for the gas to affect global climate relative to the potential of CO₂. Because CO₂ is the reference gas for establishing GWP, by definition, its GWP is one (1). While methane (CH₄) has a shorter atmospheric lifetime than CO₂, it has a 100-year GWP of 25, signifying that CH₄ has 25 times more of an effect on global warming than CO₂ on a molecule-by-molecule basis.

GHG emissions estimates are typically represented in terms of equivalent metric tons of CO₂ (MT CO₂E). CO₂E emissions are the product of the amount of each gas by its GWP. The effects of several GHGs may be discussed in terms of million metric tons of CO₂ equivalent (MMT CO₂E) and can be summed to represent the total potential of these gases to warm the global climate. Table 5.7-1 – Global Warming Potentials and Atmospheric Lifetimes summarizes some of the most common GHGs.

It should be noted that the USEPA and other organizations occasionally update the GWP values they use. This change can be due to updated scientific estimates of the energy absorption or lifetime of the gases or to changing atmospheric concentrations of GHGs that result in a change in the energy absorption of one additional ton of a gas relative to another. The GWPs shown in Table 5.7-1 are the most current. However, it should be noted that in the CalEEMod, CH₄ has a GWP of 21 and nitrous oxide (N₂O) has a GWP of 310, and these values were those used in the Project's GHG analysis.

All of the gases in Table 5.7-1 are produced by both biogenic (natural) and anthropogenic (human) sources. These gases are those of primary concern in the Project's GHG analysis. CO₂ would be emitted by the Project due to the combustion of fossil fuels in vehicles (including construction), from electricity generation and natural gas consumption, water use, and from solid waste disposal. Smaller amounts of CH₄ and N₂O would be emitted from the same Project operations.

Table 5.7-1 – Global Warming Potentials and Atmospheric Lifetimes

Gas	Atmospheric Lifetime (years)	100-year Gap	20-year GWP
CO ₂	50-200	1	1
CH ₄ *	12.4	25/28*	84
N ₂ O	121	298/265*	264
HFC-23	222	12,400	10,800
HFC-32	5.2	677	2,430
HFC-125	28.2	3,170	6,090
HFC-134a	13.4	1,300	3,710
HFC-143a	47.1	4,800	6,940
HFC-152a	1.5	138	506
HFC-227ea	38.9	3,350	5,360
HFC-236fa	242	8,060	6,940
HFC-43-10mee	16.1	1,650	4,310
CF ₄	50,000	6,630	4,880
C ₂ F ₆	10,000	11,100	8,210
C ₃ F ₈	2,600	8,900	6,640
C ₄ F ₁₀	2,600	9,200	6,870
c-C ₄ F ₈	3,200	9,540	7,110
C ₅ F ₁₂	4,100	8,550	6,350
C ₆ F ₁₄	3,100	7,910	5,890
SF ₆	3,200	23,500	17,500

Source: Intergovernmental Panel on Climate Change (IPCC) 2007, 2014

*The CH₄ and N₂O 100-year GWPs included in CalEEMod are 25 and 298, respectively, from the IPCC Fourth Assessment Report. All other values are from the current Fifth Assessment Report.

Environmental Setting

State and Regional GHG Inventories

The California Air Resources Board (CARB) performs statewide GHG inventories. The inventory is divided into nine broad sectors of economic activity: agriculture, commercial, electricity generation, forestry, high GWP emitters, industrial, recycling and waste, residential, and transportation. Emissions are quantified in MMT CO₂E. Table 5.7-2 – California GHG Emissions by Sector shows the estimated statewide GHG emissions for the years 1990, 2010, and 2017. Although annual GHG inventory data is available for years 2000 through 2017, the years 1990, 2010, and 2017 are highlighted in Table 5.7-2 because 1990 is the baseline year for established reduction targets, 2010 corresponds to the same years for which inventory data for the City is available, and 2017 is the most recent data available.

Table 5.7-2 – California GHG Emissions by Sector in 1990, 2010, and 2017¹

Sector	1990 Emissions in MMT CO₂E (% total)²	2010 Emissions in MMT CO₂E (% total)²	2017³ Emissions in MMT CO₂E (% total)²
Electricity Generation	110.5 (25.7%)	90.6 (20.2%)	62.6 (14.8%)
Transportation	150.6 (35.0%)	170.2 (38.0%)	174.3 (41.1%)
Industrial	105.3 (24.4%)	101.8 (22.7%)	101.1 (23.8%)
Commercial	14.4 (3.4%)	20.1 (4.5%)	23.3 (5.5%)
Residential	29.7 (6.9%)	32.1 (7.2%)	30.4 (7.2%)
Agriculture & Forestry	18.9 (4.4%)	33.7 (7.5%)	32.4 (7.6%)
Not Specified	1.3 (0.3%)	--	--
Total⁴	430.7	448.5	424.1

Source: CARB 2007 and 2019.
¹1990 data was obtained from the CARB 2007 source and are based on IPCC fourth assessment report GWPs.
²Percentages may not total 100 due to rounding.
³2010 and 2017 data was retrieved from the **CARB 2019** source and are based on IPCC fourth assessment report GWPs.
⁴Totals may vary due to independent rounding.

As shown in Table 5.7-2, statewide GHG source emissions totaled approximately 431 MMT CO₂E in 1990, 449 MMT CO₂E in 2010, and 424 MMT CO₂E in 2017. Many factors affect year-to-year changes in GHG emissions, including economic activity, demographic influences, environmental conditions such as drought, and the impact of regulatory efforts to control GHG emissions. As shown, transportation-related emissions consistently contribute to the most GHG emissions.

A City of Riverside emissions inventory was prepared for baseline year 2010 as a part of the City's CAP. The total community-wide GHG emissions in 2010 were 2,617,540 MT CO₂E. Table 5.7-3 – City of Riverside GHG Emissions in 2010 (below) summarizes the sources and quantities of community emissions. The largest source of emissions is transportation.

Table 5.7-3 – City of Riverside GHG Emissions in 2010

Sector	2010 GHG Emissions (MT CO₂E)
Residential Energy Use	481,903 (18.4%)
Commercial/Industrial Energy Use	722,321 (27.6%)
Transportation	1,358,647 (51.9%)
Solid Waste	54,669 (2.1%)
Total	2,617,540

Source: City of Riverside 2016

5.7.2 Related Regulations

In response to rising concern associated with increasing GHG emissions and global climate change impacts, several plans and regulations have been adopted at the international, national, and state levels with the aim of reducing GHG emissions. The following is a discussion of the federal, state, and regional plans and regulations most applicable to the Project.

5.7.2.1 International Regulations

Climate change is a global issue involving GHG emissions from all around the world; therefore, countries such as the ones discussed below have made an effort to reduce GHGs.

Intergovernmental Panel on Climate Change

In 1988, the United Nations and the World Meteorological Organization established the IPCC to assess the scientific, technical and socioeconomic information relevant to understanding the scientific basis of risk of human-induced climate change, its potential impacts, and options for adaptation and mitigation.

United Nations' Framework Convention on Climate Change ('Convention')

On March 21, 1994, the U.S. joined a number of countries around the world in signing the Convention. Under the Convention, governments gather and share information on GHG emissions, national policies, and best practices; launch national strategies for addressing GHG emissions and adapting to expected impacts, including the provision of financial and technological support to developing countries; and cooperate in preparing for adaptation to the impacts of climate change.

International Climate Change Treaties

The Kyoto Protocol is an international agreement linked to the Convention. The major feature of the Kyoto Protocol is that it sets binding targets for 37 industrialized countries and the European community for reducing GHG emissions at an average of five percent against 1990 levels over the five-year period 2008–2012. The Convention (as discussed above) encouraged industrialized countries to stabilize emissions; however, the Protocol commits them to do so. Developed countries have contributed more emissions over the last 150 years; therefore, the Protocol places a heavier burden on developed nations under the principle of “common but differentiated responsibilities.”

In 2001, President George W. Bush indicated that he would not submit the treaty to the U.S. Senate for ratification, which effectively ended American involvement in the Kyoto Protocol. In December 2009, international leaders met in Copenhagen to address the future of international climate change commitments post-Kyoto. No binding agreement was reached in Copenhagen; however, the Committee identified the long-term goal of limiting the maximum global average temperature increase to no more than 2° Celsius above pre-industrial levels, subject to a review in 2015. The UN Climate Change Committee held additional meetings in Durban, South Africa in November 2011; Doha, Qatar in November 2012; and Warsaw, Poland in November 2013. The meetings are gradually gaining consensus among participants on individual climate change issues.

On September 23, 2014 more than 100 Heads of State and Government and leaders from the private sector and civil society met at the Climate Summit in New York hosted by the United Nations. At the Summit, heads of government, business and civil society announced actions in areas that would have the greatest impact on reducing emissions, including climate finance, energy, transport, industry, agriculture, cities, forests, and building resilience.

Parties to the United Nations' Framework Convention on Climate Change (UNFCCC) reached a landmark agreement on December 12, 2015 in Paris, charting a fundamentally new course in the two-decade-old global climate effort. Culminating a four-year negotiating round, the new treaty ends the strict differentiation between developed and developing countries that characterized earlier efforts, replacing it with a common framework that commits all countries to put forward their best efforts and to strengthen them in the years ahead. This includes, for the first time, requirements that all parties report regularly on their emissions and implementation efforts and undergo international review.

The agreement and a companion decision by parties were the key outcomes of the conference, known as the 21st session of the UNFCCC Conference of the Parties (COP) 21. Together, the Paris Agreement and the accompanying COP decision:

- Reaffirm the goal of limiting global temperature increase well below 2 degrees Celsius, while urging efforts to limit the increase to 1.5 degrees;
- Establish binding commitments by all parties to make “nationally determined contributions” (NDCs), and to pursue domestic measures aimed at achieving them;
- Commit all countries to report regularly on their emissions and “progress made in implementing and achieving” their NDCs, and to undergo international review;
- Commit all countries to submit new NDCs every five years, with the clear expectation that they will “represent a progression” beyond previous ones;
- Reaffirm the binding obligations of developed countries under the UNFCCC to support the efforts of developing countries, while for the first time encouraging voluntary contributions by developing countries too;
- Extend the current goal of mobilizing \$100 billion a year in support by 2020 through 2025, with a new, higher goal to be set for the period after 2025;
- Extend a mechanism to address “loss and damage” resulting from climate change, which explicitly will not “involve or provide a basis for any liability or compensation;”
- Require parties engaging in international emissions trading to avoid “double counting;” and
- Call for a new mechanism, similar to the Clean Development Mechanism under the Kyoto Protocol, enabling emission reductions in one country to be counted toward another country's NDC.

5.7.2.2 Federal Regulations

Council on Environmental Quality

The federal government, USEPA, and other federal agencies have many federal level programs and projects to reduce GHG emissions. In June 2012, the Council on Environmental Quality (CEQ) revised the Federal Greenhouse Gas Accounting and Reporting Guidance originally issued in October 2010. The CEQ guidance identifies ways in which federal agencies can improve

consideration of GHG emissions and climate change for federal actions. The guidance states that NEPA documents should provide decision makers with relevant and timely information and should consider (1) GHG emissions of a Proposed Action and alternative actions and (2) the relationship of climate change effects to a Proposed Action or alternatives. Specifically, if a Proposed Action would be reasonably anticipated to cause direct emissions of 25,000 MT CO₂E GHG emissions on an annual basis, agencies should consider this as an indicator that a quantitative assessment may be meaningful to decision makers and the public.

USEPA

In 2009, the USEPA issued its science-based finding that the buildup of heat-trapping GHGs in the atmosphere endangers public health and welfare. The “Endangerment Finding” reflects the overwhelming scientific evidence on the causes and impacts of climate change. It was made after a thorough rulemaking process considering thousands of public comments and was upheld by the federal courts.

The USEPA has many federal level programs and projects to reduce GHG emissions, provides technical expertise, and encourages voluntary reductions from the private sector. The U.S. EPA also collaborates with the public sector, including states, tribes, localities and resource managers, to encourage smart growth, sustainability preparation, and renewable energy and climate change preparation. These initiatives include the Clean Energy – Environment State Partnership Program, the Climate Ready Water Utilities Initiative, the Climate Ready Estuaries Program, and the Sustainable Communities Partnership.

Additionally, in 2004, the U.S. EPA introduced the SmartWay program, which is a partnership between the USEPA and the freight industry to reduce fuel consumption and emissions. The program provides a system for tracking and documenting information about fuel use and freight emissions across supply chains; helps companies identify more efficient carriers, transportation modes, equipment, and operations to improve sustainability and lower costs from goods movement, supports global energy security and offsets environmental risk; and reduces freight transportation-related emissions by accelerating the use of advanced fuel-saving technologies. SmartWay is supported by major transportation industry associations, environmental groups, state and local governments, international agencies, and the corporate community.

Corporate Average Fuel Economy Standards

Project-generated vehicle trips would require the consumption of fuel and result in GHG emissions. The federal Corporate Average Fuel Economy (CAFE) standards determine the fuel efficiency of certain vehicle classes in the U.S. The first phase of the program applied to passenger cars, new light-duty trucks, and medium-duty passenger cars with model years 2012 through 2016 and required these vehicles to achieve a standard equivalent to 35.5 miles per gallon (mpg). The second phase of the program applies to model years 2017 through 2025 and increased the standards to 54.5 mpg. Separate standards were also established for medium- and heavy-duty vehicles. The first phase applied to model years 2014 through 2018 and the second phase applies to model years 2018 through 2027. With improved gas mileage, fewer gallons of

transportation fuel would be combusted to travel the same distance, thereby reducing nationwide GHG emissions associated with vehicle travel.

Safer Affordable Fuel-Efficient Vehicle Rule

The National Highway Traffic Safety Administration (NHTSA) is required by federal law to set fuel economy standards at the maximum feasible level for both passenger cars and light trucks for every model year. If the NHTSA determines that previously set standards are no longer maximum feasible, the NHTSA may amend the standards.

On April 2, 2018, the EPA issued the Mid-Term Evaluation Final Determination that found that the model years 2022-2025 CO₂ emissions standards were not appropriate and should be revised. In August 2018, the USEPA and NHTSA jointly proposed the rulemaking titled, “The Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule for Model Years 2021-2026 Passenger Cars and Light Trucks.” With this, the agencies proposed new and amended GHG and CAFE standards for model year 2021 to 2026 light-duty vehicles. On March 31, 2020, the NHTSA and USEPA issued the SAFE Vehicle Rule. The SAFE Vehicle Rule sets firm but feasible fuel economy and CO₂ standards that increase 1.5 percent in stringency each year from model years 2021 through 2026. The standards apply to both passenger cars and light trucks.

One National Program Rule on Federal Preemption of State Fuel Economy Standards

On September 19, 2019, the NHTSA and the USEPA issued a final action titled the “One National Program Rule” to enable the federal government to provide nationwide uniform fuel economy and GHG emission standards for automobiles and light duty trucks. The action finalized critical parts of the SAFE Vehicle Rule first proposed in August 2018. The action made clear that federal law preempts state and local tailpipe GHG emissions standards as well as zero emission vehicle (ZEV) mandates.

5.7.2.3 State Regulations

The State of California has adopted a number of plans and regulations aimed at identifying statewide and regional GHG emissions caps, GHG emissions reduction targets, and actions and timelines to achieve the target GHG reductions.

Executive Orders and Statewide GHG Emission Targets

Executive Order S-3-05

This State Executive Order (EO) established the following GHG emission reduction targets for the State of California:

- by 2010, reduce GHG emissions to 2000 levels;
- by 2020, reduce GHG emissions to 1990 levels;
- by 2050, reduce GHG emissions to 80 percent below 1990 levels.

This EO also directs the secretary of the California Environmental Protection Agency to oversee the efforts made to reach these targets and to prepare biannual reports on the progress made

toward meeting the targets and on the impacts to California related to global warming, including impacts to water supply, public health, agriculture, the coastline, and forestry. With regard to impacts, the report shall also prepare and report on mitigation and adaptation plans to combat the impacts. The first Climate Action Team Assessment Report was produced in March 2006 and has been updated every two years.

EO B-30-15

This EO, issued on April 29, 2015, establishes an interim GHG emission reduction goal for the State of California by 2030 of 40 percent below 1990 levels. This EO also directed all state agencies with jurisdiction over GHG emitting sources to implement measures designed to achieve the new interim 2030 goal, as well as the pre-existing, long-term 2050 goal identified in EO S-3-05. Additionally, this EO directed CARB to update its Climate Change Scoping Plan to address the 2030 goal.

California Global Warming Solutions Act

In response to EO S-3-05, the California Legislature passed AB 32, the California Global Warming Solutions Act of 2006, and thereby enacted Sections 38500–38599 of the California Health and Safety Code. The heart of AB 32 is its requirement that CARB establish an emissions cap and adopt rules and regulations that would reduce GHG emissions to 1990 levels by 2020. AB 32 also required CARB to adopt a plan by January 1, 2009 indicating how emission reductions would be achieved from significant GHG sources via regulations, market mechanisms, and other actions.

In 2008, CARB estimated that annual statewide GHG emissions were 427 MMT CO₂E in 1990 and would reach 596 MMT CO₂E by 2020 under a business as usual (BAU) condition (CARB 2008). To achieve the mandate of AB 32, CARB determined that a 169 MMT CO₂E (or approximate 28.5 percent) reduction in BAU emissions was needed by 2020. In 2010, CARB prepared an updated 2020 forecast to account for the recession and slower forecasted growth. CARB determined that the economic downturn reduced the 2020 BAU by 55 MMT CO₂E; as a result, achieving the 1990 emissions level by 2020 would require a reduction in GHG emissions of 21.7 (not 28.5) percent from the 2020 BAU. California has been on track to achieve 1990 levels and based on the GHG inventories shown in Table 5.7-2, achieved the goal by 2017.

Approved in September 2016, Senate Bill (SB) 32 updates the California Global Warming Solutions Act of 2006 and enacts EO B-30-15. Under SB 32, the state would reduce its GHG emissions to 40 percent below 1990 levels by 2030. This is equivalent to an emissions level of approximately 260 MMT CO₂E for 2030. In implementing the 40 percent reduction goal, CARB is required to prioritize emissions reductions to consider the social costs of the emissions of GHGs; where “social costs” is defined as “an estimate of the economic damages, including, but not limited to, changes in net agricultural productivity; impacts to public health; climate adaptation impacts, such as property damages from increased flood risk; and changes in energy system costs, per metric ton of GHG emission per year.”

Climate Change Scoping Plan

As directed by the California Global Warming Solutions Act of 2006, in 2008, CARB adopted the *Climate Change Scoping Plan: A Framework for Change (Scoping Plan)*, which identifies the main strategies California will implement to achieve the GHG reductions necessary to reduce forecasted business as usual (BAU) emissions in 2020 to the state's historic 1990 emissions level. In November 2017, CARB released the 2017 Climate Change Scoping Plan Update, the Strategy for Achieving California's 2030 Greenhouse Gas. The 2017 Scoping Plan identifies state strategies for achieving the state's 2030 interim GHG emissions reduction target codified by SB 32. Measures under the 2017 Scoping Plan Scenario build on existing programs such as the Low Carbon Fuel Standard, Advanced Clean Cars Program, Renewables Portfolio Standard (RPS), Sustainable Communities Strategy, Short-Lived Climate Pollutant Reduction Strategy, and the Cap-and-Trade Program. Additionally, the 2017 Scoping Plan proposes new policies to address GHG emissions from natural and working lands.

Regional Emissions Targets – Senate Bill 375

SB 375, the 2008 Sustainable Communities and Climate Protection Act, was signed into law in September 2008 and requires CARB to set regional targets for reducing passenger vehicle GHG emissions in accordance with the Scoping Plan. The purpose of SB 375 is to align regional transportation planning efforts, regional GHG reduction targets, and fair-share housing allocations under state housing law. SB 375 requires Metropolitan Planning Organizations (MPOs) to adopt a Sustainable Communities Strategy or Alternative Planning Strategy to address GHG reduction targets from cars and light-duty trucks in the context of that MPO's Regional Transportation Plan. Southern California Association of Governments (SCAG) is the region's MPO. In 2018, CARB set targets for the SCAG region of an 8 percent reduction in GHG emissions per capita from automobiles and light-duty trucks compared to 2005 levels by 2020 and a 19 percent reduction by 2035. These targets are periodically reviewed and updated.

Renewables Portfolio Standards

The Renewables Portfolio Standards (RPS) promotes diversification of the state's electricity supply and decreased reliance on fossil fuel energy sources. Originally adopted in 2002 with a goal to achieve a 20 percent renewable energy mix by 2020 (referred to as the "Initial RPS"), the goal has been accelerated and increased by EOs S-14-08 and S-21-09 to a goal of 33 percent by 2020. In April 2011, SB 2 (1X) codified California's 33 percent RPS goal. In September 2015, the California Legislature passed SB 350, which increases California's renewable energy mix goal to 50 percent by year 2030. Renewable energy includes (but is not limited to) wind, solar, geothermal, small hydroelectric, biomass, anaerobic digestion, and landfill gas.

Solid Waste Diversion

The Commercial Recycling Requirements mandate that businesses (including public entities) that generate 4 cubic yards or more of commercial solid waste per week and multi-family residential with five units or more arrange for recycling services. Additionally, Assembly Bill (AB) 341 mandates that 75 percent of the solid waste generated be reduced, recycled, or composted by

2020. Businesses can take one or any combination of the following in order to reuse, recycle, compost, or otherwise divert solid waste from disposal:

- Donate, sell, and/or make other arrangements for pick-up of recyclable materials. This includes self-hauling the materials to recycling facilities.
- Arrange for recycling services directly through Waste Management.

California Code of Regulations, Title 34 – California Building Code

The California Code of Regulations, Title 24, is referred to as the California Building Code, or CBC. It consists of a compilation of several distinct standards and codes related to building construction, including plumbing, electrical, interior acoustics, energy efficiency, handicap accessibility, and so on. Of particular relevance to GHG reductions are the CBC's energy efficiency and green building standards as outlined below.

Title 24, Part 6 – Energy Efficiency Standards

The California Code of Regulations, Title 24, Part 6 is the California Energy Efficiency Standards for Residential and Nonresidential Buildings (also known as the California Energy Code). This code, originally enacted in 1978, establishes energy-efficiency standards for residential and non-residential buildings in order to reduce California's energy consumption. The Energy Code is updated periodically to incorporate and consider new energy-efficient technologies and methodologies as they become available, and incentives in the form of rebates and tax breaks are provided on a sliding scale for buildings achieving energy efficiency above the minimum standards.

The current version of the Energy Code, known as 2019 Title 24, or the 2019 Energy Code, became effective January 1, 2020. The Energy Code provides mandatory energy-efficiency measures as well as voluntary tiers for increased energy efficiency. The California Energy Commission (CEC), in conjunction with the California Public Utilities Commission, has adopted a goal that all new residential and commercial construction achieve zero net energy by 2020 and 2030, respectively. It is expected that achievement of the zero net energy goal will occur via revisions to the Title 24 standards.

New construction and major renovations must demonstrate their compliance with the current Energy Code through submission and approval of a Title 24 Compliance Report to the local building permit review authority and the CEC. The compliance reports must demonstrate a building's energy performance through use of CEC approved energy performance software that shows iterative increases in energy efficiency given the selection of various heating, ventilation, and air conditioning; sealing; glazing; insulation; and other components related to the building envelope.

Title 24, Part 11 – California Green Building Standards

The California Green Building Standards Code, referred to as CALGreen, was added to Title 24 as Part 11 first in 2009 as a voluntary code, which then became mandatory effective January 1, 2011 (as part of the 2010 CBC). The most recent 2019 CALGreen institutes mandatory minimum

environmental performance standards for all ground-up new construction of non-residential and residential structures. Local jurisdictions must enforce the minimum mandatory Green Building Standards and may adopt additional amendments for stricter requirements.

The mandatory standards require:

- Outdoor water use requirements as outlined in local water efficient landscaping ordinances or current Model Water Efficient Landscape Ordinance standards, whichever is more stringent;
- Requirements for water conserving plumbing fixtures and fittings;
- 65 percent construction/demolition waste diverted from landfills;
- Infrastructure requirements for electric vehicle charging stations;
- Mandatory inspections of energy systems to ensure optimal working efficiency; and
- Requirements for low-pollutant emitting exterior and interior finish materials such as paints, carpets, vinyl flooring, and particleboards.

Similar to the reporting procedure for demonstrating Energy Code compliance in new buildings and major renovations, compliance with the CALGreen mandatory requirements must be demonstrated through completion of compliance forms and worksheets.

Heavy-Duty Truck Regulations

Tractor-Trailer GHG Regulation

CARB approved the Tractor-Trailer GHG Regulation to significantly reduce GHG emissions produced by certain heavy-duty tractor-trailers. The tractors and trailers subject to this regulation must either use EPA SmartWay certified tractors and trailers or retrofit their existing fleet with SmartWay verified technologies. The regulation applies primarily to owners of 53-foot or longer box-type trailers, including both dry-van and refrigerated-van trailers, and owners of the heavy-duty tractors that pull them on California highways. These owners are responsible for replacing or retrofitting their affected vehicles with compliant aerodynamic technologies and low rolling resistance tires. Sleeper cab tractors model year 2011 and later must be SmartWay certified. All other tractors must use SmartWay verified low-rolling resistance tires. There are also requirements for trailers to have low rolling resistance tires and aerodynamic devices.

Phase 1 and 2 Heavy-Duty Vehicle Standards

CARB has adopted heavy-duty vehicle standards for GHG emissions from heavy-duty trucks and engines sold in California. It establishes GHG emission limits on truck and engine manufacturers and harmonizes with the USEPA rule for new trucks and engines nationally. Existing heavy-duty vehicle regulations in California include engine criteria emission standards, tractor-trailer GHG requirements to implement SmartWay strategies (i.e., the Heavy-Duty Tractor-Trailer Greenhouse Gas Regulation), and in-use fleet retrofit requirements such as the Truck and Bus Regulation. In September 2011, the USEPA adopted their new rule for heavy-duty trucks and engines. The U.S. EPA rule has compliance requirements for new compression and spark ignition

engines, as well as trucks from Class 2b through Class 8. Compliance requirements begin with model year 2014 with stringency levels increasing through model year 2018. The rule organizes truck compliance into three groupings, which include (a) heavy-duty pickups and vans; (b) vocational vehicles; and (c) combination tractors. The USEPA rule does not regulate trailers.

CARB staff has worked jointly with the U.S. EPA and the National Highway Traffic Safety Administration on the next phase of federal GHG emission standards for medium- and heavy-duty vehicles, called federal Phase 2. The federal Phase 2 standards were built on the improvements in engine and vehicle efficiency required by the Phase 1 emission standards and represent a significant opportunity to achieve further GHG reductions for 2018 and later model year heavy-duty vehicles, including trailers.

5.7.2.4 Regional Regulations

SCAQMD

SCAQMD is the agency responsible for air quality planning and regulation in the South Coast Air Basin. The SCAQMD addresses the impacts to climate change of projects subject to SCAQMD permit as a lead agency if they are the only agency having discretionary approval for the project and acts as a responsible agency when a land use agency must also approve discretionary permits for the project. The SCAQMD acts as an expert commenting agency for impacts to air quality. This expertise carries over to GHG emissions, so the agency helps local land use agencies through the development of models and emission thresholds that can be used to address GHG emissions.

In 2008, SCAQMD formed a Working Group to identify GHG emissions thresholds for land use projects that could be used by local lead agencies in the South Coast Air Basin. The Working Group developed several different options that are contained in the SCAQMD Draft Guidance Document – *Interim CEQA GHG Significance Thresholds for Stationary Sources, Rules, and Plans*, that could be applied by lead agencies. The working group met again in 2010 to review the guidance. The SCAQMD Board has not approved the thresholds; however, the Guidance Document provides substantial evidence supporting the approaches to significance of GHG emissions that can be considered by the lead agency in adopting its own threshold. The current interim thresholds consist of the following tiered approach (SCAQMD 2008, 2010):

- Tier 1 – The project is exempt from the California Environmental Quality Act (CEQA).
- Tier 2 – The project is consistent with an applicable regional GHG emissions reduction plan. If a project is consistent with a qualifying local GHG reduction plan, it does not have significant GHG emissions.
- Tier 3 – Project GHG emissions represent an incremental increase below or mitigated to less than Significance Screening Levels, where
 - Residential/Commercial Screening Level
 - Option 1: 3,000 MT CO₂E screening level for all residential/commercial land uses

- Option 2: Screening level thresholds for land use type acceptable if used consistently by a lead agency:
 - Residential: 3,500 MT CO₂E
 - Commercial: 1,400 MT CO₂E
 - Mixed-Use: 3,000 MT CO₂E
 - 10,000 MT CO₂E is the Permitted Industrial Screening Level
- Tier 4 – The project achieves performance standards, where performance standards may include:
 - Option 1: Percent emission reduction target. SCAQMD has no recommendation regarding this approach at this time.
 - Option 2: The project would implement substantial early implementation of measures identified in the CARB's Scoping Plan. This option has been folded into Option 3.
 - Option 3: SCAQMD Efficiency Targets.
 - 2020 Targets: 4.8 MT CO₂E per service population (SP) for project-level analyses or 6.6 MT CO₂E per SP for plan level analyses where service population includes residential and employment populations provided by a project.
 - 2035 Targets: 3.0 MT CO₂E per SP for project-level analyses or 4.1 MT CO₂E per SP for plan level analyses.
- Tier 5 – Offsets along or in combination with the above target Significance Screening Level. Offsets must be provided for a 30-year project life, unless the project life is limited by permit, lease, or other legally binding condition.

If a project complies with any one of these tiers, its impacts related to GHG emissions would be considered less than significant.

The SCAQMD's interim thresholds used the EO S-3-05 year 2050 goal as the basis for the Tier 3 screening level. Achieving the EO's objective would contribute to worldwide efforts to cap CO₂ concentrations at 450 parts per million, thus stabilizing global climate.

SCAQMD only has authority over GHG emissions from development projects that include air quality permits. At this time, it is unknown if the project would include stationary sources of emissions subject to SCAQMD permits. Notwithstanding, if the project requires a stationary permit, it would be subject to the applicable SCAQMD regulations.

SCAQMD Regulation XXVII, adopted in 2009 includes the following rules:

- Rule 2700 defines terms and post global warming potentials.
- Rule 2701, SoCal Climate Solutions Exchange, establishes a voluntary program to encourage, quantify, and certify voluntary, high quality certified GHG emission reductions in the SCAQMD.

- Rule 2702, GHG Reduction Program created a program to produce GHG emission reductions within the SCAQMD. The SCAQMD will fund projects through contracts in response to requests for proposals or purchase reductions from other parties.

5.7.2.5 Local Regulations

Riverside GP 2025

The GP 2025 includes an Air Quality Element that details provisions and programs to reduce current pollution emissions, to require new development to include measures to comply with air quality standards, and to address new air quality requirements. These programs also serve to reduce GHG emissions. The Air Quality Element contains objectives and policies related to land use strategies, transportation, stationary sources, energy conservation, public education, multi-jurisdictional cooperation, and sustainability. Policies that may be applicable to the Project include:

Objective AQ-5: Increase energy efficiency and conservation in an effort to reduce air pollution.

Policy AQ-5.1: Utilize source reduction, recycling, and other appropriate measures to reduce the amount of solid waste disposed of in landfills.

Policy AQ-5.3: Continue and expand use of renewable energy sources such as wind, solar, water, landfill gas, and geothermal sources.

Policy AQ-5.6: Support the use of automated equipment for conditional facilities to control heating and air conditioning.

Policy AQ-5.7: Require residential building construction to meet or exceed energy use guidelines in Title 24 of the California Administrative Code.

Objective AQ-8: Make sustainability and global warming education a priority for the City's effort to protect public health and achieve State and Federal clean air standards

Policy AQ 8.17: Develop measures that a minimum of 40 percent of the waste from all construction sites throughout Riverside be recycled by the end of 2008.

Riverside Good Neighbor Guidelines

The City adopted Good Neighbor Guidelines for Siting New and/or Modified Warehouse/Distribution Facilities (GNG) in October 2008 to focus on the relationship between land use, permitting, and air quality. They also highlight strategies that can help minimize the impacts of diesel emissions associated with warehouse/distribution centers. Specifically, the Guidelines help to minimize the impacts of diesel particulate matter from on-road trucks associated with warehouses and distribution centers on existing communities and sensitive receptors.

The Good Neighbor Guidelines goals and strategies, adopted by the City in 2008, applicable to the Project include:

Goal 1: Minimize exposure to diesel emissions to neighbors that are situated in close proximity to the warehouse/distribution center.

Strategy 1a: Design facilities to allow for the queuing of the trucks on-site and away from sensitive receptors. Conversely, prevent the queuing of the trucks on streets or elsewhere outside of the facility in compliance with Title 10-Vehicles and Traffic-Chapter 10.44-Stopping, Standing and Parking.

Strategy 1b: To the extent possible, locate driveways, loading docks, and internal circulation routes away from residential uses or any other sensitive receptors.

Strategy 1c: In compliance with CEQA, conduct SCAQMD URBEMIS and EMFAC computer models, as appropriate, to initially evaluate warehouse and distribution projects on a case by case basis to determine the significance of air quality impacts and whether air quality thresholds would be exceeded as a result of the project. Where thresholds are exceeded, a more detailed air quality analysis/health risk assessment prepared by an air quality specialist is required to be prepared and submitted by the project applicant. As a general rule, the following guidelines can be used to determine whether a proposed project will be required to prepare additional technical analyses:

- i. An air quality study for an industrial project is required when the proposed project has the potential to exceed established thresholds as noted by URBEMIS and EMFAC computer models provided by SCAQMD. If these models indicate the project will exceed thresholds due to existing or proposed site conditions, intensity of development, location of nearest sensitive receptor, or any other exceptional circumstance warranting the need for additional review the preparation of an air quality study will be required.
- ii. A health risk assessment is required when the truck traffic areas of an industrial project are located within 1,000 feet of sensitive receptors, in accordance with SCAQMD guidelines and/or practices.

Goal 4: Reduce and/or eliminate diesel idling within the warehouse/distribution center.

On November 10, 2020, The Riverside City Council adopted updates to the GNGs, in addition to associated amendments to Title 19 – Zoning Code of the Riverside Municipal Code (RMC), the Hunter Business Park Specific Plan, and the Sycamore Canyon Business Park Specific Plan related to siting industrial uses in the City when located adjacent to sensitive receptors, including residential neighborhoods, schools, parks, playgrounds, day care centers, nursing homes, hospitals, and other public spaces. City Council action also allowed any project achieving substantial completion within 90 days of the effective date of the implementing ordinance to continue to be subject to the 2008 GNG. As this Project was deemed complete prior to adoption of the updated GNG (discussed further in Sections 5.2.5 and 5.7.5), it does not need to comply with the updated GNG.

Green Action Plan

The 2012 Green Action Plan is a product of the City's Clean & Green Task Force, which was created to: build upon the policies of the City's General Plan 2025; ensure that the green design guidelines would be developed and followed; provide a framework for sustainability pilot projects; and initiate partnerships among regional agencies and nearby cities. The Task Force first created the Sustainability Policy Statement (SPS), a document featuring eight main categories: Save Water, Keep it Clean, Make it Solar, Make it Shady, Clean the Air, Save Fuel, Make it Smart, and Build Green. Once the SPS was adopted, the Green Action Plan was created to serve as a guidebook that would tie specific tasks to the policies of the SPS. The Green Action Plan focuses on seven key areas of city life: Energy, GHG Emissions, Waste, Urban Design, Urban Nature, Transportation and Water.

The City formed a Green Accountability Performance (GAP) Committee to carry out the tasks and within just two years nearly each of the plan's 38 tasks had been accomplished. The GAP Committee was reimagined to focus on healthy communities, and Riverside was awarded its designation by the United States Center for Disease Control and Prevention (CDC) as an Emerald City, an honor that has gained the City national acclaim. Healthy Communities is the GAP's eighth focus area, with 19 goals and over 50 additional tasks. The Healthy Communities strategies strengthen the Green Action Plan as setting a clear path to sustainability and serving as a living document that reflects the growth of the green movement, the progression of renewable energy, and the fresh ideas of the GAP Committee.

Riverside Restorative Growthprint

The Riverside Restorative Growthprint (RRG), adopted in January 2016, combines two plans: The Economic Prosperity Action Plan (RRG-EPAP) and the Climate Action Plan (RRG-CAP). The RRG-CAP provides a roadmap for the City to achieve GHG emission reductions through 2035, and establishes policies and priorities enabling the City to implement strategies that fulfill the requirements of state initiatives AB 32 and SB 375. The RRG-CAP is thus a qualifying local GHG plan under Tier 2 of the SCAQMD tiered thresholds described above as the RRG-CAP's objectives include a reduction in GHG emissions. The RRG-CAP includes a baseline GHG inventory (for year 2007 and updated in 2010) for local government operations and for the community as a whole and establishes emission reduction targets consistent with state law. In 2007, the City's total community-wide emissions were estimated at 3,024,066 MT CO₂E, while emissions resulting from municipal operations were responsible for approximately 122,525 MT CO₂E. In 2010, the community-wide and municipal operations emissions had decreased by approximately 13.4 percent, mainly due to City actions to reduce the carbon intensity of its electric portfolio. The RRG-CAP aims to reduce GHG emissions to 26.4 percent below year 2007 baseline emissions (15 percent below year 2010 baseline emissions) by 2020 for an emissions target of 2,224,908 MT CO₂E; and 49 percent below year 2007 baseline emissions by 2035 for an emissions target of 1,542,274 MT CO₂E.

The RRG-EPAP identifies opportunities where the community can reduce GHG emissions in a way that also advances economic growth and provide meaningful benefit to the residents,

employees, investors, and visitors to the City. While the RRG-CAP identifies GHG reduction measures and strategies, the RRG-EPAP identifies those measures and strategies that have the most potential to spur economic development.

5.7.3 Project Design Considerations

The Project would incorporate a number of Project design features that would reduce GHG emissions, many of which are consistent with GHG reduction strategies developed by groups and public agencies, such as CARB, CAPCOA, and the California Attorney General's Office. To ensure that the latest, most advanced technology can be used, the Project may substitute design features if they are proven to be equally effective or more effective at reducing GHG emissions.

Sustainability Features

As described in DEIR Section 3.2.4 (Sustainability Features), the Project would meet or exceed all applicable standards under California's Green Building Code Title 24 standards. This will be accomplished by incorporating, at minimum, the following sustainability features or other features that are equally efficient:

Energy Efficiency

- Design building shells and components, such as electrical systems, windows, and roof systems to comply with the provisions of the Title 24 standards for nonresidential buildings. The Project would be constructed in accordance with energy efficiency standards effective at the time building permits are issued. The effective date of the 2019 Building Energy Efficiency Standards was January 1, 2020, and it is anticipated that nonresidential buildings will use approximately 30 percent less energy due to lighting upgrades under the revised standards.
- Install efficient lighting and lighting control systems. Light-emitting diodes (LEDs) will be installed for outdoor lighting, which will incorporate motion sensors that turn lighting off when not in use.
- Install skylights on the rooftops, 2.5% of roof area of both buildings, and incorporate the use of natural lighting.
- Achieve construction energy efficiencies and energy conservation through bulk purchase, transport, and use of construction materials. Use of materials in bulk reduces energy demands associated with preparation and transport of construction materials as well as transport and disposal of construction waste.
- The Project proposes conventional industrial uses that are not inherently energy intensive and reflect contemporary energy efficient/energy conserving designs and operational programs.

Renewable Energy

- Design buildings to have “solar ready” roofs that will structurally accommodate later installation of rooftop solar panels. Building operators providing rooftop solar panels will submit plans for solar panels prior to occupancy.

Water Conservation and Efficiency

- Create water-efficient landscapes in compliance with the City’s Water Efficient Landscape and Irrigation Ordinance in 19.570.
- Include landscaping in areas of parking lots to reduce the heat island effect.
- Install water-efficient irrigation systems and devices according to the City’s Water Efficient Landscape and Irrigation Ordinance 19.570, which complies with the California Department of Water Resources Model Efficient Landscape Ordinance.
- Design buildings to be water-efficient; install water-efficient fixtures and appliances.
- Restrict watering methods (e.g., prohibit systems that apply water to non-vegetated surfaces) and control runoff.
- Provide education about water conservation and available programs and incentives to the building operators to distribute to employees.

Solid Waste Measures

- Sort, recycle, and divert from landfills Project-related construction and demolition waste in accordance with mandatory regulatory requirements.
- Provide interior and exterior storage areas for recyclables and green waste and adequate recycling containers located in public areas.
- The property operator will provide readily available information provided by the City for employee education about reducing waste and available recycling services.

Transportation and Motor Vehicles

- Limit idling times of construction vehicles to no more than 5 minutes in accordance with CCR, Title 13, Motor Vehicles, section 2449(d)(3) Idling.
- Implement sidewalks to facilitate and encourage pedestrian access, which would reduce vehicle miles traveled (VMT) and associated energy consumption.
- Provide a total of 39 electric vehicle (EV) parking stalls (24 within Parcel 1 for Building A and 15 within Parcel 2 for Building B) to encourage the use of low or zero-emission vehicles.
- Provide a total of 13 clean air/van pool parking stalls (8 within Parcel 1 for Building A and 5 within Parcel 2 for Building B) to support and encourage ridesharing.

- Promote the use of bicycles as an alternative means of transportation by providing short-term and/or long-term bicycle parking accommodations in accordance with the California Green Buildings Standards Code Sections 5.710.6.2.1 and 5.710.6.2.2.
- The building operator will support and encourage ridesharing and transit for the construction crew.

On-Site Equipment and Loading Docks

- The Project will require building operators (by contract specifications) to turn off equipment, including heavy-duty equipment, motor vehicles, and portable equipment when not in use for more than 5 minutes. Truck idling shall not exceed 5 minutes in time. All facilities will post signs requiring that trucks shall not be left idling for more than 5 minutes pursuant to Title 13 of the California Code of Regulations, Section 2485, which limits idle times to no more than 5 minutes.

Construction

- Require construction equipment to turn off when not in use.
- Use locally produced and/or manufactured building materials for at least 10 percent of the construction materials used for the Project.
- Use “green” building materials where feasible, such as those materials that are resource-efficient and recycled and manufactured in an environmentally conscious way.
- During grading, heavy-duty construction equipment (i.e., excavators, graders, scrapers, dozers, tractor/loader/backhoes, etc.) shall be CARB/U.S. Environmental Protection Agency Tier 3 certified. All construction equipment is subject to the CARB In-Use Off-Road Diesel-Fueled Fleets Regulation. This regulation, which applies to all off-road diesel vehicles 25 horsepower or greater, limits unnecessary idling to 5 minutes, requires all construction fleets to be labeled and reported to CARB, bans Tier 0 equipment and phases out Tier 1 and 2 equipment (thereby replacing fleets with cleaner equipment), and requires that fleets comply with Best Available Control Technology requirements.¹

5.7.4 Thresholds of Significance

The CEQA Guidelines allow lead agencies to establish significance thresholds for their respective jurisdictions. These significance thresholds may be adopted after considering thresholds of significance adopted or recommended by other public agencies or experts. The City of Riverside has not established local CEQA significance thresholds as described in Section 15064.7 of the State CEQA Guidelines. The City of Riverside generally utilizes the CEQA significance thresholds in Appendix G (“Environmental Checklist”) of the State CEQA Guidelines. The Environmental Checklist prepared by the City for the Project (see Appendix A of this document) indicates that

¹ Air Quality Analysis for the Sycamore Hills Distribution Project, page 34, contained in Appendix C of this EIR.

impacts related to the Sycamore Hills Distribution Center Project may be considered potentially significant if the proposed project would:

- (Threshold A) generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment; or
- (Threshold B) conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases.

The SCAQMD published its *Interim CEQA GHG Significance Thresholds for Stationary Sources, Rules, and Plans* in 2008 (SCAQMD 2008). The interim thresholds are a tiered approach; projects may be determined to be less than significant under each tier or require further analysis under subsequent tiers. The five tiers are discussed in Section 5.7.2.3 above.

Consistent with the SCAQMD guidance, the recommended tiered approach for land use development projects in SCAQMD jurisdiction is assessment against the applicable screening levels. As the project is not exempt from CEQA and is not part of an approved local plan, Project emissions are assessed against the industrial 10,000 MT CO₂E screening level. This screening level is intended to exempt projects that are too small to have significant impacts from further analysis.

5.7.5 Environmental Impacts

Threshold A: *Would the Project generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?*

The Project's GHG emissions were calculated using the CalEEMod Version 2016.3.2 (California Air Pollution Control Officers Association [CAPCOA] 2017). The CalEEMod program is a tool used to estimate air emissions resulting from land development projects based on California-specific emission factors. CalEEMod can be used to calculate emissions from mobile (on-road vehicles), area (fireplaces, consumer products [cleansers, aerosols, and solvents], landscape maintenance equipment, architectural coatings), water and wastewater, and solid waste sources. GHG emissions are estimated in terms of total MT CO₂E.

The analysis methodology and input data are described in the following sections. Where Project-specific data was not available, model inputs were based on information provided in the CalEEMod User's Guide. Operational emissions were calculated for the projected soonest project operational year of 2023.

Construction Emissions

Construction activities emit GHGs primarily through combustion of fuels (mostly diesel) in the engines of off-road construction equipment and through combustion of diesel and gasoline in on-road construction vehicles and the commute vehicles of the construction workers. Smaller amounts of GHGs are also emitted through the energy use embodied in water use for fugitive dust control.

Every phase of the construction process, including demolition, grading, paving, and building, emits GHGs in volumes directly related to the quantity and type of construction equipment used when building the project. GHG emissions associated with each phase of project construction are calculated by multiplying the total fuel consumed by the construction equipment and worker trips by applicable emission factors. The number and pieces of construction equipment are calculated based on the project-specific design. In the absence of project-specific construction information, equipment for all phases of construction is estimated based on the project size.

Construction emissions were modeled assuming site preparation/grading would last three months, and the remaining construction activities (building, paving, landscaping, architectural coatings) would last approximately one year for a total construction duration of 15 months. During the grading phase, soil quantities would be balanced on site between the two building areas with no net import or export. Table 5.7-4 summarizes the anticipated construction phases, duration, and equipment.

Table 5.7-4 – Construction Phases and Equipment

Equipment	Quantity	Daily Operation Time (Hours)
Site Preparation (18 Days)		
Rubber-Tired Dozers	3	8
Tractors/Loaders/Backhoes	4	8
Grading (47 Days)		
Excavators	2	8
Graders	1	8
Rubber-Tired Dozers	1	8
Scrapers	2	8
Tractors/Loaders/Backhoes	2	8
Building Construction (243 Days)		
Cranes	1	7
Forklifts	3	8
Generator Sets	1	8
Tractors/Loaders/Backhoes	3	7
Welders	1	8
Architectural Coatings (111 Days)		
Air Compressor	1	6
Paving (18 Days)		
Pavers	2	8
Paving Equipment	2	8
Rollers	2	8
NOTE: Each phase would also include vehicles associated with work commutes, dump trucks for hauling, and trucks for deliveries.		

Based on guidance from the SCAQMD, the total construction GHG emissions resulting from a project should be amortized over 30 years and added to operational GHG emissions to account for their contribution to GHG emissions over the lifetime of a project.

Operational Emissions

Mobile Emissions

Operational emissions were calculated for the projected soonest Project operational year of 2023.

GHG emissions from vehicles come from the combustion of fossil fuels in vehicle engines. The vehicle emissions are calculated based on the vehicle type and the trip rate for each land use. The vehicle emission factors and fleet mix used in the current version of CalEEMod are derived from CARB's 2014 Emission Factors model. The U.S. EPA recently approved the use of CARB's 2017 Emission Factor model (EMFAC2017). However, this had not yet been incorporated into CalEEMod, and there is no standardized approach to modifying the emission factors included in CalEEMod. Generally, vehicles have become cleaner over time; therefore, the mobile emissions would not be higher if CalEEMod were adjusted using EMFAC2017 emission factors.

Mobile source operational emissions are based on the trip rate, trip length, and vehicle mix. Total passenger vehicle and truck trip generation was obtained from the traffic report prepared for the project. The trip lengths for passenger vehicles and trucks were obtained from the trip length analysis prepared for the project. Riverside County Transportation Analysis Model (RivTAM) was utilized to conduct a select zone model run for the Project. The Vehicle Miles Traveled (VMT) from/to the Project Traffic Analysis Zone (TAZ) by vehicle type was calculated based on select zone model skims. The average trip length was calculated based on model VMT and daily traffic flow by vehicle type. (Urban Crossroads 2019; Appendix H)² The project-specific trip generation and trip length data is summarized in Table 5.7-5.

Table 5.7-5 – Project Trip Generation and Trip Length

Vehicle Type	Daily Trip Generation (ADT)	Trip Length (miles)
Passenger Cars	573	24.2
Trucks	274	38.7
2-axle	46	38.7
3-axle	57	38.7
4+-axle	171	38.7
Total	847	--
SOURCE: Urban Crossroads' 2019 Vehicle Miles Traveled (VMT)/Trip Length Analysis (Appendix H) ADT = average daily traffic		

Although the proposed Project is for high cube transload short-term warehouse use, which is the use analyzed in the *Greenhouse Gas Analysis for the Sycamore Hills Distribution Project* prepared by RECON (Appendix H, October 2020), manufacturing is a permitted use in the

² The 2020 VMT Analysis contained in Appendix L and used to support the VMT analysis in Section 5.12 Transportation was prepared in accordance with the City of Riverside Public Works Department Traffic Impact Analysis Guidelines for Vehicle Miles Traveled and Level of Service Assessment, July 2020 and evaluates project generated VMT per employee and compares that to the City of Riverside VMT per employee. However, the 2020 VMT analysis did not include Project generated truck trips, therefore the 2019 VMT analysis which included VMT for both passenger cars and trucks and is more conservative was used for the GHG analysis contained herein.

SCBPSP and the Zone. As outlined in the Project Description, the Project is a speculative development, and the tenants are unknown at this time. Therefore, in order to ensure future use of the site is consistent with high cube transload short-term warehouse use, and the analysis contained herein, Mitigation Measure **MM AIR-1** is required, which requires the applicant record a covenant on the property (Parcels 1 and 2) that prohibit manufacturing use and provide proof of recording the covenant to the City prior to issuance of Occupancy Permits.

Energy Use Emissions

GHGs are emitted as a result of activities in buildings for which electricity and natural gas are used as energy sources. GHGs are emitted during the generation of electricity from fossil fuels off-site in power plants. These emissions are considered indirect but are calculated in association with a building's overall operation. Electric power generation accounts for the second largest sector contributing to both inventoried and projected statewide GHG emissions. Combustion of fossil fuel emits criteria pollutants and GHGs directly into the atmosphere. When this occurs in a building, it is considered a direct emissions source associated with the building. CalEEMod estimates emissions from the direct combustion of natural gas for space and water heating.

CalEEMod estimates GHG emissions from energy use by multiplying average rates of residential and non-residential energy consumption by the quantities of residential units and non-residential square footage entered in the land use module to obtain total projected energy use. This value is then multiplied by electricity and natural gas GHG emission factors applicable to the project location and utility provider.

Energy consumption values are based on the CEC sponsored California Commercial End Use Survey and Residential Appliance Saturation Survey studies, which identify energy use by building type and climate zone. Because these studies are based on older buildings, adjustments have been made in CalEEMod to account for changes to Title 24 Building Codes. CalEEMod 2016.3.2 is based on the 2016 Title 24 energy code (Part 6 of the Building Code). The next version of the energy code, 2019 Title 24, went into effect on January 1, 2020. For non-residential buildings, it is estimated that the 2019 standards will decrease energy consumption by 30 percent. The project would be subject to the 2019 Title 24 energy code standards. However, as a conservative analysis, GHG emissions were calculated assuming the default 2016 Title 24 energy code standards.

The Project would be served by Riverside Public Utilities for electricity. Therefore, Riverside Public Utilities' specific energy-intensity factors (i.e., the amount of CO₂, CH₄, and NO_x per kilowatt hour) are used in the calculations of GHG emissions. As discussed, the state mandate for renewable energy is 33 percent by 2020. However, the energy-intensity factors included in CalEEMod by default only represent an 18.4 percent procurement of renewable energy. To account for the continuing effects of RPS, the energy-intensity factors included in CalEEMod were adjusted to reflect the current procurement of 33 percent renewable energy. Riverside Public Utilities energy intensity factors are shown in Table 5.7-6.

Table 5.7-6 – Riverside Public Utilities Intensity Factors

GHG	2009 (lbs/MWh)	2020 (lbs/MWh)
Carbon Dioxide (CO ₂)	1,325.65	1,051.61
Methane (CH ₄)	0.029	0.023
Nitrous Oxide (N ₂ O)	0.006	0.004
SOURCE: CPUC 2017 lbs = pound; MWh = megawatt hour		

Area Source Emissions

Area sources include GHG emissions that would occur from the use of landscaping equipment. The use of landscape equipment emits GHGs associated with the equipment's fuel combustion. The landscaping equipment emission values were derived from the 2011 In-Use Off-Road Equipment Inventory Model.

Water and Wastewater Emissions

The amount of water used, and wastewater generated by a project has indirect GHG emissions associated with it. These emissions are a result of the energy used to supply, distribute, and treat the water and wastewater. In addition to the indirect GHG emissions associated with energy use, wastewater treatment can directly emit both CH₄ and N₂O. The indoor and outdoor water use consumption data for each land use subtype comes from the Pacific Institute's Waste Not, Want Not: The Potential for Urban Water Conservation in California 2003 (as cited in CAPCOA 2017). Based on that report, a percentage of total water consumption was dedicated to landscape irrigation, which is used to determine outdoor water use. Wastewater generation was similarly based on a reported percentage of total indoor water use.

The Project would be subject to CalGreen, which requires a 20 percent increase in indoor water use efficiency. Thus, in order to demonstrate compliance with CalGreen, a 20 percent reduction in indoor water use was included in the water consumption calculations for the Project.

In addition to water reductions under CalGreen, the GHG emissions from the energy used to transport the water are affected by RPS. As discussed previously, to account for the effects of RPS through 2020, the energy-intensity factors included in CalEEMod were adjusted to reflect 33 percent renewable energy (see Table 5.7-6).

Solid Waste Emissions

The disposal of solid waste produces GHG emissions from anaerobic decomposition in landfills, incineration, and transportation of waste. To calculate the GHG emissions generated by disposing of solid waste for the Project, the total volume of solid waste was calculated using waste disposal rates identified by California Department of Resources Recycling and Recovery (CalRecycle). The methods for quantifying GHG emissions from solid waste are based on the Intergovernmental Panel on Climate Change method, using the degradable organic content of waste. GHG emissions associated with the Project's waste disposal were calculated using these parameters. According to a CalRecycle report to the Legislature, as of 2013 California has achieved a statewide 50 percent diversion of solid waste from landfills through "reduce/recycle/compost" programs.

However, AB 341 mandates that 75 percent of the solid waste generated be reduced, recycled, or composted by 2020. Therefore, to account for the continuing actions of recycling requirements under state law (i.e., AB 341), a 25 percent solid waste diversion rate was included in the model. Table 5.7-7 below provides a summary of Project GHG emissions, including those resulting from solid waste emissions.

Summary of GHG Emission Calculations

Based on the methodology summarized in the sections above, the primary sources of direct and indirect GHG emissions have been calculated. Table 5.7-7 summarizes the estimated emissions of the above discussed Project construction, mobile, energy use, area source, water and wastewater, and solid waste emissions.

Table 5.7-7 – Summary of Project GHG Emissions (metric tons per year)

Source	MT CO ₂	MT CH ₄	MT N ₂ O	MT CO ₂ E
Mobile – Passenger Cars	1,204	<1	0	1,204
Mobile – Trucks	4,316	<1	0	4,320
Energy Source	781	<1	<1	782
Area Sources	<1	<1	0	<1
Water/Wastewater Sources	728	4	<1	846
Solid Waste Sources	86	5	1	214
Construction (Amortized over 30 years)	37	<1	0	38
Total	7,152	9	<1	7,405*
<i>SCAQMD Significance Threshold for Industrial Sources</i>				10,000
MT CO ₂ E = metric tons of carbon dioxide equivalent MT CH ₄ = metric tons of methane MT N ₂ O = metric tons of nitrous oxide *The GWPs included in CalEEMod are from the IPCC Fourth Assessment Report. For informational purposes, total emissions calculated by CalEEMod were adjusted to account for the updated IPCC Fifth Assessment Report GWPs. Using the current GWPs, total annual project emissions would be 7,428 MT CO ₂ , and would also be less than the screening threshold. Note that the IPCC updates the GWPs periodically, and the next anticipated update will occur in 2022.				

As shown in Table 5.7-7, the Project would result in a net increase of 7,405 MT CO₂E per year. As discussed previously, the SCAQMD's 10,000 MT CO₂E screening level is appropriate for exempting industrial projects that are too small to have significant impacts from further analysis.

Conclusion

As discussed, the Project's GHG analysis utilizes the SCAQMD's *Interim CEQA GHG Significance Thresholds for Stationary Sources, Rules, and Plans*. The interim thresholds are a tiered approach; project impacts may be determined to be less than significant under each tier or require further analysis under subsequent tiers. Because the Project is subject to CEQA and is not subject to a regional GHG emissions reduction plan, the Project does not fall under Tiers 1 or 2. As shown in Table 5.7-7 – Summary of Project GHG Emissions, construction and operation of the Project would result in the annual equivalent emission of 7,405 MT CO₂E in 2023. Project GHG emissions would be less than the applicable SCAQMD screening level of 10,000 MT CO₂E for industrial uses. As Project emissions would be less than the 10,000 MT CO₂E screening level, GHG emissions impacts would be **less than significant with Mitigation Measure MM AIR-1**.

In addition, **Mitigation Measure MM BIO-6** includes enhancement of a total of 1.58 acres of riparian habitat and creation (establishment) of 0.61 acre of in-kind riparian woodland in Area C and restoration of 0.02 acre of riparian habitat in Drainage B, all within the Restricted Property/Conservation Area that will be managed in perpetuity. By preserving and enhancing on-site natural vegetation this mitigation measure would also reduce the Project's overall GHG impact as vegetation absorbs carbon dioxide and releases oxygen.

MM BIO-6 states that prior to issuance of occupancy permit, in order to reduce impacts to on-site Riparian/Riverine areas and suitable habitat for least Bell's vireo (an endangered bird), on-site mitigation shall include:

1. Enhancement of a total of 1.58 acres of riparian habitat: 0.01 acres in Drainage A, 1.34 acres in Drainage B, and 0.23 acre in Area C.
2. Create (establish) 0.61 acre of in-kind riparian woodland in Area C.
3. Restoration of 0.02 acre of riparian habitat in Drainage B.
4. The non-jurisdictional, non-riparian/riverine upland areas of slopes associated with the access road will be restored/replanted with native seed mix.
5. The roadway/access to Parcel1/Building A shall include culverts to provide a hydrological connection to the riparian habitat on the east side of the roadway and a corridor for small wildlife species.
6. Record lettered parcels A and B for portions of the site that will not be developed, but includes the revised restricted property and is designed as conservation area. Parcel A 7.19 acres and Parcel B 5.04 acres, with a combined total of 12.23 acres, shall be managed in perpetuity by a 3rd party, anticipated to be the Rivers and Lands Conservancy (RLC) or other CDFW approved entity, with an endowment funded by the developer.

MM BIO-6 further reduces GHG impacts that are already less than significant.

Threshold B: *Would the Project conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases?*

As listed in Section 5.7.2 Related Regulations, Project-applicable plans, policies, and/or regulations adopted for the purpose of reducing GHG emissions include objectives and policies of the GP 2025 Air Quality Element, the City's Good Neighbor Guidelines, the Climate Change Scoping Plan, and the RRG-CAP. Discussions of the Project's consistency with each of these other plans/policies/regulations is provided below.

General Plan 2025

The Project is consistent with the objectives and policies in the Open Space and Conservation Element, including those that encourage efficient use of energy resources. The Project is consistent with the objectives and policies in the Air Quality Element, including those to improve job-housing balance, reduce vehicle miles traveled and length of work trips, improve flow of traffic, reduce air pollution by reducing emissions from mobile sources, reduce pollution from stationary

sources, reduce particulate matter, and increase energy efficiency and conservation. Refer to Appendix B for the analysis of the Project's consistency with applicable General Plan 2025 Air Quality Element policies.

Good Neighbor Guidelines

The Project was evaluated for consistency with the City's *Good Neighbor Guidelines for Siting New and/or Modified Warehouse Distribution Facilities* (Good Neighbor Guidelines; City of Riverside 2008).

- The Good Neighbor Guidelines were designed to help minimize the impacts of diesel particulate matter from on-road trucks associated with warehouses and distribution centers on existing communities and sensitive receptors located in the region. Although the Good Neighbor Guidelines specifically address air quality issues, the recommended strategies also serve to reduce GHG emissions. The Good Neighbor Guidelines goals and strategies, adopted by the City in 2008, applicable to the Project include: Minimize exposure to diesel emissions to neighbors that are situated in close proximity to the warehouse/distribution center;

- Recommended strategy: Design facilities to allow for the queuing of truck on-site and away from sensitive receptors. Conversely, prevent the queuing of trucks on streets or elsewhere outside of facility in compliance with Title 10 – Vehicles and Traffic – Chapter 10.44 – Stopping, Standing and Parking.

Project consistency: Based on the Project location and design, no truck queuing would occur next to sensitive receptors, which are located south of Alessandro Boulevard. Truck queuing would not occur outside the facility.

- Recommended strategy: To the extent possible, locate driveways, loading docks and internal circulation route away from residential uses or any other sensitive receptors.

Project consistency: Driveways, loading docks, and internal circulation routes are not adjacent to sensitive receptors. Further, as calculated in this analysis, emissions due to on-site operations would not expose sensitive receptors to substantial pollutant concentrations.

- Recommended strategy: Conduct SCAQMD URBEMIS and EMFAC computer models as appropriate, to initially evaluate warehouse and distribution projects on a case by case basis to determine the significance of air quality impacts and whether air quality thresholds would be exceeded as a result of the project. Where thresholds are exceeded, a more detailed air quality analysis/ health risk assessment by an air quality specialist is required to be prepared and submitted by the project applicant.

Project consistency: As calculated and concluded in the Project's Air Quality Analysis (Appendix C), the Project would not result in significant air quality impacts. Moreover, as discussed in the Project's GHG Analysis (Appendix H) and

summarized in this section, the Project would not result in significant GHG emissions impacts.

- Recommended strategy: Enforce compliance with Riverside Municipal Code Section 19.880 – “Transportation Demand Management Regulations”. This section of the Code requires trip reduction plans to be submitted for all businesses, including warehouses, with over one hundred employees to reduce work-related vehicles trips by six and one half percent from the number of trips related to the project.

Project consistency: The Project would include transportation demand management measures that would reduce emissions associated with employee trips. These include access to public transit (Routes 20 and 208), bicycle parking, clean air/van pool parking spaces, and electric vehicle parking.

- Eliminate diesel trucks from unnecessarily traversing through residential neighborhoods;
 - Recommended strategy: Require warehouse/distribution centers to establish a specific truck route between the warehouse/distribution center and the State Route 60 and Interstate 215 freeways for City approval as part of the Design Review process. In addition, a haul route plan for construction activities should also be provided as part of the Design Review process.

Project consistency: The Project site is located one mile west of Interstate 215, with direct access via Alessandro Boulevard which is an existing truck route for operations as well as transporting construction equipment to and from the site. As identified on the site plans, an existing 20-foot wide dirt road located between proposed Parcels 1 and 2 will be used temporarily as a haul route during grading activities to move excess earthen material from Parcel 1 to Parcel 2.

- Recommended strategy: Require warehouse/distribution centers to clearly specify all entrance and exit points on the site plan submitted for City review and approval.

Project consistency: The Project site plans indicate all entrance and exit points.

- Recommended strategy: Require warehouse/distribution centers to provide on-site signage for directional guidance to trucks entering and exiting the facility.

Project consistency: On-site signage for directional guidance will be provided.

- Recommended strategy: Require warehouse/distribution centers to provide signage or flyers that advise truck drivers of the closest restaurants, fueling stations, truck repair facilities, lodging and entertainment.

Project consistency: The future tenants are unknown at this time; however, this information is readily available to truck drivers.

- Eliminate trucks from using residential areas and repairing vehicles on the streets;
 - Recommended strategy: Enforce compliance with Riverside Municipal Code Section 10.44.155 – “Parking of certain commercial vehicles, trailers and semi-trailers prohibited; exceptions”, Section 10.44.160 – “Parking of certain commercial vehicles prohibited in residential districts” and Section 10.44.040 “Parking for certain purposes prohibited”.
Project consistency: The Project would comply with all Municipal Code requirements. No trucks would be parked off-site or drive through residential communities.
- Reduce and/or eliminate diesel idling within the warehouse/distribution center;
 - Recommended strategy: Promote the installation of on-site electric hook-ups to eliminate the idling of main and auxiliary engines during loading and unloading of cargo and when trucks are not in use – especially where Transportation Refrigeration Units are proposed to be used.
Project consistency: The project would not include Transportation Refrigeration Units. All trucks would be required to comply with the CARB idling limit of 5 minutes.
 - Recommended strategy: Implement General Plan 2025 Program Final Program Environmental Impact Report, Mitigation Measure MM Air 12. This Mitigation Measure requires that all new truck terminals, warehouses and other shipping facilities requiring the use of refrigerated trucks and with more than 50 truck trips per day shall provide electrical hookups for the refrigerated units to reduce idling and its associated air quality pollutants. Additionally, future tenant improvements involving conversion of a warehouse for refrigeration storage shall include electrical hookups for refrigerated units.
Project consistency: The Project would not include Transportation Refrigeration Units or refrigeration storage.
 - Recommended strategy: Require signage (posted inside and outside of the warehouse facility) to inform truck drivers of CARB regulations, idling limits, authorized truck route, and designated truck parking locations. Post signs requesting truck drivers to turn off engines when not in use and restrict idling within facilities to less than 5 minutes.
Project consistency: The Project would include signage regarding idling limits, truck routes, and parking.

Additionally, the City’s Guidelines recommend the enforcement of the Riverside Municipal Code. As discussed in Section 5.7.2.5 above, on November 10, 2020, the Riverside City Council adopted updates to the Good Neighbor Guidelines, in addition to associated amendments to Title 19 – Zoning Code of the Riverside Municipal Code (RMC), the Hunter Business Park Specific

Plan, and the Sycamore Canyon Business Park Specific Plan related to siting industrial uses in the City when located adjacent to sensitive receptors, including residential neighborhoods, schools, parks, playgrounds, day care centers, nursing homes, hospitals, and other public spaces. City Council action also allowed any project achieving substantial completion within 90 days of the effective date of the implementing ordinance to continue to be subject to the 2008 GNG. As this Project was deemed complete prior to adoption of the updated GNG, it does not need to comply with the updated GNG. Nevertheless, the Project is consistent with the updated GNG.

The updated 2020 Good Neighbor Guidelines include new requirements for technical studies and new guidelines related to noise and neighborhood character. The following is a short summary of the applicable updates:

- **Technical Studies:** The 2020 GNGs require the preparation of an Air Quality Analysis, and Health Risk Assessments for industrial uses within 1,000 feet of sensitive receptors.

Project Consistency: The Project has completed an Air Quality Analysis (Appendix C) and Health Risk Assessments (Appendix C) as part of the EIR process.

- **Noise:** The updated guidelines include measures related to minimizing noise from construction activities and ensuring compliance with Title 7 – Noise of the Riverside Municipal Code as it relates to noise in residential neighborhoods.

Project Consistency: As outlined in Section 5.11 Noise, **Mitigation Measure MM NOI-1** is required to minimize construction noise and operational noise generated by the Project will comply with the noise standards in Title 7 of the RMC.

- **Neighborhood Character:** The new guidelines incorporate tiered development standards in Title 19 – Zoning Code related to building setbacks, height, and size, based on proximity to residential uses. The guidelines also require screening of industrial uses from Sensitive Receptors, and landscaping to soften visual impacts.

Project Consistency: The tiered development standards of Title 19 do not apply to the Project, as the proposed buildings are located more than 800 feet from residential uses. As outlined in Section 5.1 Aesthetics, extensive design considerations are included in the Project, as well as Mitigation Measure MM AES-2, to minimize visual impacts from the Project on nearby sensitive receptors.

Although the Project is not required to comply with the updated Title 19 development standards or the updated GNGs, the project is consistent with all new requirements related to warehouse uses.

Thus, as outlined above, the Project is consistent with and would not conflict with the implementation of the applicable 2008 Good Neighbor Guidelines and recommended strategies; potential impacts would be **less than significant with implementation of Mitigation Measure MM AIR-1**, as outlined below.

MM AIR-1: The project applicant is required to record a covenant on the property (Parcels 1 and 2) that prohibit manufacturing use. Proof of the record of covenant shall be submitted to the City of Riverside Planning Department prior to issuance of Building Permits.

Climate Change Scoping Plan

As discussed in Section 5.7.2.2, State Climate Change Regulations, EO S-3-05 established GHG emission reduction targets for the State, and AB 32 launched the CARB Climate Change Scoping Plan that outlined the reduction measures needed to reach the 2020 target.

As discussed above, the Project emissions would be below the screening level of 10,000 MT CO₂E for industrial uses. This threshold is based on the concept of establishing a 90 percent GHG emission capture rate. A 90 percent emission capture rate means that 90 percent of total emissions from all new or modified stationary source projects would be subject to a CEQA analysis, which includes analyzing feasible alternatives and imposing feasible mitigation measures. The market capture rate is based on guidance from the California Air Pollution Control Officers Association (CAPCOA) report CEQA & Climate Change, dated January 2008, which identifies several potential approaches for assessing a project's GHG emissions.

Following the market capture rate approach, a lead agency defines an acceptable capture rate and identifies the corresponding emissions level. Following rationale presented in the CAPCOA Guidance, the aggregate emissions from all projects with individual annual emissions that are equal to or less than the identified market capture rate would not impede achievement of the state GHG emissions reduction targets codified by AB 32 (2006) and SB 32 (2016) and impacts under CEQA would therefore be less than cumulatively considerable. A 90 percent emission capture rate sets the emission threshold low enough to capture a substantial fraction of future stationary source projects that will be constructed to accommodate future statewide population and economic growth, while setting the emission threshold high enough to exclude small projects that will in aggregate contribute a relatively small fraction of the cumulative statewide GHG emissions.

Project GHG emissions would be less than the applicable SCAQMD screening level of 10,000 MT CO₂E for industrial uses. Further, Project emissions would decline beyond the buildout year of the Project, 2023, as a result of continued implementation of federal, state, and local reduction measures such as increased federal and state vehicle efficiency standards, and Riverside Public Utilities' increased renewable sources of energy in accordance with RPS goals. Based on currently available models and regulatory forecasting, Project emissions would continue to decline through at least 2050. Given the reasonably anticipated decline in Project emissions, once fully constructed and operational, the Project is in line with the GHG reductions needed to achieve the 2050 GHG emission reduction targets identified by EO S-3-05.

As noted in Section 3.2.2.3, the 2017 Scoping Plan identifies state strategies for achieving the state's 2030 interim GHG emissions reduction target codified by SB 32. Measures under the 2017 Scoping Plan scenario build on existing programs such as the Low Carbon Fuel Standard, Advanced Clean Cars Program, RPS, Sustainable Communities Strategy, Short-Lived Climate Pollutant Reduction Strategy, and the Cap-and-Trade Program. The project would comply with all

applicable provisions contained in the 2017 Scoping Plan since the adopted regulations would apply to new development or the emission sectors associated with new development.

- **Transportation** – State regulations and 2017 Scoping Plan measures that would reduce the project’s mobile source emissions include the California Light-Duty Vehicle GHG Standards (AB 1493/Pavley I and II), the Low Carbon Fuel Standard, and the heavy-duty truck regulations discussed in Section 3.2.2.8. These measures are implemented at the state level and would result in reducing project-related mobile source GHG emissions.
- **Energy** – State regulations and 2017 Scoping Plan measures that would reduce the project’s energy-related GHG emissions include RPS (see Section 3.2.2.5), Title 24 Energy Efficiency Standards (see Section 3.2.2.7a), and CALGreen (see Section 3.2.2.7b). The project would be served by Riverside Public Utilities, which has achieved 36 percent renewables as of 2017. The project’s energy related GHG emissions would decrease as Riverside Public Utilities increases its renewables procurement beyond 2020 towards the 2030 goal of 50 percent. Additionally, the project would be constructed in accordance with energy efficiency standards effective at the time building permits are issued. The current 2019 Energy Code is estimated to decrease energy consumption by 30 percent for non-residential buildings when compared to the 2016 Title 24 Energy Code.
- **Water** – State regulations and 2017 Scoping Plan measures that would reduce the project’s electricity consumption associated with water supply, treatment, and distribution, and wastewater treatment include RPS, CALGreen, and the Model Water Efficient Landscape Ordinance. The project would be required to reduce indoor water consumption by 20 percent in accordance with CALGreen. Additionally, the project would be subject to all City landscaping ordinance requirements.
- **Waste** – State regulations and 2017 Scoping Plan measures that would reduce the project’s solid waste-related GHG emissions are related to landfill methane control, increases in efficiency of landfill methane capture, and high recycling/zero waste. The project would be subject to CALGreen, which requires a diversion of construction and demolition waste from landfills. Additionally, the project would include recycling storage and would divert waste from landfills in accordance with AB 341.

Riverside Restorative Growthprint and Climate Action Plan (RRG-CAP)

In addition to meeting the SCAQMD screening thresholds, the Project was evaluated for consistency with the strategies and actions contained in the RRG-CAP (see Section 5.4.2.4). To achieve the City’s GHG emission reductions, the City’s RRG-CAP includes reduction measures for each category of GHG emissions: transportation, energy, water, and solid waste. The RRG-CAP reduction measures further support the goals of SB 32 and the measures in the 2017 Scoping Plan. Table 5.7-8 summarizes the Project’s consistency with RRG-CAP measures.

Table 5.7-8 – Project Consistency with RRG-CAP GHG Reduction Measures

Number	Strategy/Goal	Project Consistency
State and Regional Energy Measures		
<i>The following are state and regional measures that are expected to reduce GHG emissions associated with the energy sector.</i>		
SR-1	Renewable Portfolio Standard (RPS) Utilities must secure 33 percent of their power from renewable sources by 2020.	The Project would be served by Riverside Public Utilities, which has achieved 36 percent renewables as of 2017. The Project's energy-related GHG emissions would decrease as Riverside Public Utilities increases its renewables procurement beyond 2020 towards the 2030 goal of 50 percent. The Project would not conflict or interfere with RPS.
SR-2	2013 California Building Energy Efficiency Standards (Title 24, Part 6) Mandatory energy efficiency standards for buildings.	The Project would be constructed in accordance with energy efficiency standards effective at the time building permits are issued. The current 2019 Energy Code is estimated to decrease energy consumption by 30 percent for non-residential buildings when compared to the 2016 Title 24 Energy Code.
SR-3	HERO Residential Program Financing for homeowners to make energy efficient, renewable energy, and water conservation improvements.	The Project is not a residential Project, and therefore, this measure does not apply to the Project.
SR-4	HERO Commercial Program Financing for business owners to make energy efficient, renewable energy, and water conservation improvements.	The HERO Commercial program is a public-private partnership administered by Western Riverside Council of Governments (WRCOG) and provides financing for energy and water improvements to business owners. As the Project is a new warehouse construction, this measure does not apply to the Project. The Project would not conflict with WRCOG's implementation of the HERO program.
State and Regional Transportation Measures		
<i>The following are state and regional measures that are expected to reduce GHG emissions associated with the transportation sector.</i>		
SR-6	Pavley and Low Carbon Fuel Standard Requirements for vehicles to use cleaner fuels.	This measure is implemented at the state level. Project mobile-source GHG emissions would be reduced through implementation of these measures. The Project would not conflict with implementation.
SR-7	Metrolink Expansion Additional Metrolink transit service provided to Western Riverside County.	Identified in SCAG's 2012 RTP/SCS, the Metrolink Perris Valley Line will be extended from Riverside to Perris in Western Riverside County. The General Plan identifies that the alignment would include a station east of the Project site at I-215 and Alessandro Boulevard. The Project would not interfere with Metrolink expansion. Future employees could use the expansion to commute to the Project site.
SR-8	Express Lanes	The Project would not interfere with construction of additional freeway express

Sycamore Hills Distribution Center Project

Greenhouse Gas Emissions

Number	Strategy/Goal	Project Consistency
	Additional express lanes added along major freeways in western Riverside County.	lanes. Project vehicle traffic would benefit from decreased freeway congestion.
SR-9	Congestion Pricing Expansion of the toll lanes along SR-91.	This measure does not apply directly to the Project. The Project would not interfere with the expansion of SR-91 toll lanes.
SR-10	Telecommuting Work arrangement in which employees do not commute to a central place to work.	The Project is a high-cube warehouse which would require employees to physically fulfill and transport goods. This measure does not apply to the Project.
SR-11	Goods Movement Efficiency movement of goods through inland southern California.	The Project would support the region’s role as a major hub for importing and exporting goods. To implement this measure, at the state level more standards are being implemented to increase vehicle efficiencies and the 2020 RTP/SCS and SCAQMD are supporting greater penetration of low-emission trucks in the region. The estimated GHG reductions associated with this measure account for the region’s “share” of SCAG and SCAQMD’s anticipated investments. The Project would benefit from reductions associated with regional investments. Further, by providing additional warehouse space in the region, the Project could reduce truck VMT by providing a hub closer to the region than further warehouses.
SR-12	Electric Vehicle Plan and Infrastructure Facilitate electric vehicle use by providing necessary infrastructure.	For the City of Riverside, this measure would be implemented by providing both public and private charging facilities, and by updating development codes to encourage or facilitate charging stations. The Project would install conduits for vehicle charging stations. The Project would not interfere with implementation of this measure and would be constructed in accordance with development codes in place at the time building permits are issued.

State Solid Waste Measures

The following state measure is expected to reduce GHG emissions associated with the solid waste sector.

SR-13	Construction & Demolition Waste Diversion Meet mandatory requirement to divert 50 percent of construction & demolition (C&D) waste from landfills by 2020 and exceed requirement by diverting 90 percent of C&D waste from landfills by 2035.	Project-related C&D waste would be sorted, recycled, and diverted from landfills in accordance with mandatory regulatory requirements.
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Local Energy Measures

The following are local measures that can be implemented to reduce GHG emissions associated with the energy sector.

E-1	Traffic and Street Lights	The Project would not interfere with implementation of this measure.
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Greenhouse Gas Emissions

Sycamore Hills Distribution Center Project

Number	Strategy/Goal	Project Consistency
	Replace traffic and streetlights with high-efficiency bulbs.	
E-2	Shade Trees Strategically plant trees at new residential developments to reduce the urban heat island effect.	This measure applies to residential development and does not apply to the Project.
E-3	Local Utility Programs – Electricity Financing and incentives for business and homeowners to make energy efficient, renewable energy, and water conservation improvements.	To implement this measure, Riverside Public Utilities offers a selection of rebates and other incentives to assist property owners (residential and commercial) with the installation of energy- and water-saving products. This measure does not directly apply to the Project. However, the Project would be constructed in accordance with the Energy Code in place at the time building permits are issued, which would require the Project to be more energy efficient than existing development. The Project would also reduce water consumption in accordance with CalGreen.
E-4	Renewable Energy Production on Public Property Large-scale renewable energy installation on publicly owned property and in public rights-of-way.	This measure encourages the City to seek opportunities to install renewable energy projects on public property, public facilities and in public rights of way. This measure does not apply to the Project.
E-5	UC Riverside Carbon Neutral Program Collaborate with UC Riverside to achieve a carbon neutral campus.	The Project is not associated with UC Riverside. This measure does not apply to the Project.
E-6	Riverside Public Utilities Technology Grants Riverside Public Utilities grant programs to foster research, development and demonstration of innovative solutions to energy problems.	Riverside Public Utilities offers energy technology grant programs to help foster the development of innovative solutions to energy problems. This measure does not apply to the Project.
Local Transportation Measures		
<i>The following are local measures that can be implemented to reduce GHG emissions associated with the transportation sector.</i>		
T-1	Bicycle Infrastructure Improvements Expand on-street and off-street bicycle infrastructure, including bicycle lanes and bicycle trails.	Adjacent to the project site, Alessandro Boulevard is a Class 2 bicycle facility. The Project driveway would connect to Alessandro Boulevard and the existing bicycle lanes to provide access to the Project site. Additionally, the project would include the construction of a new parking lot to provide access to the Sycamore Canyon Wilderness Park trails with bicycle racks. Additionally, the project would include secure bicycle parking at each building.
T-2	Bicycle Parking Provide additional options for bicycle parking.	The Project would include secure bicycle parking at each building (at the northwest corner and entrance of Building B and at the southeast corner and entrance of Building A).

Sycamore Hills Distribution Center Project

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Number	Strategy/Goal	Project Consistency
T-3	<p>End of Trip Facilities Encourage use of non-motorized transportation modes by providing appropriate facilities and amenities for commuters.</p>	<p>The Project would include secure bicycle parking at each building (at the northwest corner and entrance of Building B and at the southeast corner and entrance of Building A). Additionally, Building A would have eight (8) clean air/van pool parking spaces and 24 electric vehicle parking stalls, and Building B would have five (5) clean air/van pool parking spaces and 15 electric vehicle parking stalls. The charging stations for the electric vehicle parking stalls would be provided by the future tenant.</p>
T-4	<p>Promotional Transportation Demand Management Encourage Transportation Demand Management strategies.</p>	<p>The Project site is served by two existing bus routes and is also required to construct sidewalk capable of accommodating an ADA-compliant bench and pole bus stop as a condition of approval. Route 20 runs along Alessandro Boulevard adjacent to the Project site, providing service from Magnolia Center to Moreno Valley. Route 208 is a CommuterLink Express Route providing service from Temecula to the Riverside Metrolink. Consistent with Transportation Demand Management strategies, future employees would be encouraged to use these routes as an alternative form of transportation. The Project would also provide secure bicycle parking.</p>
T-5	<p>Traffic Signal Coordination Incorporate technology to synchronize and coordinate traffic signals along local arterials.</p>	<p>This measure is the responsibility of the Public Works Department and is currently in progress. The measure does not apply to the Project. The Project would not interfere with implementation of this measure.</p>
T-6	<p>Density Improve jobs-housing balance and reduce vehicle miles traveled by increasing household and employment densities.</p>	<p>Single and multi-family residential neighborhoods are located south and west of the Project site. The Project would create new employment opportunities for nearby residents. In Riverside County, the 2014 jobs-housing balance was 1.28 jobs to household, which exceeds the 2040 projection of 1.10 jobs to household..</p>
T-7	<p>Mixed-Use Development Provide for a variety of development types and uses.</p>	<p>The Project is not a mixed-use development. Nonetheless, the Project would create new employment opportunities for near-by residents, and future employees could utilize near-by commercial and retail business, in support of this measure.</p>
T-8	<p>Pedestrian Only Areas Encourage walking by providing pedestrian-only community areas.</p>	<p>This measure refers to urban, nonmotorized pedestrian use areas within central business districts and major activity centers. Nonetheless, the Project would include a donation of land for a trailhead parking lot with</p>

Number	Strategy/Goal	Project Consistency
		improvements such as a shade structure with benches, bike rack, and drinking fountain. Trail fencing, gates, and signage would also be installed to direct access, circulation, and connection to existing trails. Thus, the Project would encourage walking/pedestrian use and would support this measure.
T-9	<p>Limited Parking Requirements for New Development Reduce requirements for vehicle parking in new development projects.</p>	Limiting parking requirements would encourage modes of transportation other than single-occupancy vehicles, thereby reducing VMT and GHG emissions. The City's current Zoning Code authorizes a reduction in the number of required parking spaces for mixed-use development and/or stand-alone uses in mixed-use zones subject to the approval of a shared parking arrangement. The Project is not a mixed-use development; however, the applicant is requesting a variance to reduce the number of parking spaces based on the operational characteristics of the uses.
T-10	<p>Bus Rapid Transit Service Implement bus rapid transit service in the subregion to provide alternative transportation options.</p>	The Project site is served by two existing bus routes. Route 20 runs along Alessandro Boulevard adjacent to the Project site, providing service from Magnolia Center to Moreno Valley. Two Route 20 bus stops are located immediately adjacent to the Project site along the southern boundary on Alessandro Boulevard. Route 208 is a CommuterLink Express Route providing service from Temecula to the Riverside Metrolink. Additionally, the Project would be required to construct a sidewalk capable of accommodating an ADA-compliant bench and pole bus stop as a condition of approval. Future employees could use the above-described routes as an alternative form of transportation. The Project would not interfere with the City's efforts to implement additional bus rapid transit.
T-11	<p>Voluntary Transportation Demand Management (TDM) Encourage employers to create TDM programs for their employers.</p>	Future employees would be encouraged to use existing public transit routes as an alternative form of transportation.
T-12	<p>Accelerated Bike Plan Implementation Accelerate the implementation of all or specified components of a jurisdiction's adopted bike plan.</p>	The City adopted a Bicycle Master Plan in 2007. Alessandro Boulevard is a Class 2 bicycle facility. The project driveway would connect to Alessandro Boulevard and the existing bicycle lanes to provide access to the Project site. Additionally, the northerly terminus of Barton Street that is identified as a "minor trailhead" would be developed with a trailhead parking lot, and improvements would include a

Sycamore Hills Distribution Center Project

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Number	Strategy/Goal	Project Consistency
		bike rack. Thus, the Project would provide secure bicycle parking and would not interfere with implementation of the City's Bicycle Master Plan.
T-13	Fixed Guideway Transit By 2020, complete feasibility study and by 2025 Introduce a fixed route transit service in the jurisdiction.	This measure applies specifically to the City's efforts on the "Riverside Reconnects" Streetcar feasibility study. The measure does not apply to the Project.
T-14	Neighborhood Electric Vehicle Programs Implement development requirements to accommodate Neighborhood Electric Vehicles and supporting infrastructure.	This measure does not apply to the Project. However, the Project would install conduits for vehicle charging stations.
T-15	Subsidized Transit Increase access to transit by providing free or reduced passes.	The tenants are unknown at this stage of Project design and, therefore, a commitment cannot be made that the future tenants would provide free or reduced transit passes to their employees. However, the Project would not interfere with the ability for future tenants to provide transit passes.
T-16	Bike Share Program Create nodes offering bike sharing at key locations throughout the City.	This measure encourages bike sharing implemented by third-party vendors. The measure does not apply to the Project. However, the Project would include secure bicycle parking, and would not interfere with bike sharing in the region.
T-17	Car Share Program Offer Riverside residents the opportunity to use car sharing to satisfy short-term mobility needs.	Similar to bike sharing, car sharing is offered by third-party vendors. This measure does not apply to the Project, and the Project would not interfere with car sharing programs in the region.
T-18	SB 743 as Alternative to LOS Use SB 743 to incentivize development in the downtown and other areas served by transit.	The Project is not located in the downtown; therefore, this measure does not apply to the Project. The Project would be served by RTA Routes 20 and 26 currently operating along Alessandro Boulevard as the Project would be required to construct a sidewalk capable of accommodating an ADA-compliant bench and pole bus stop as a condition of approval. Therefore, the Project would be consistent with this strategy/ goal.
T-19	Alternative Fuel and Vehicle Technology Infrastructure Promote the use of alternative fueled vehicles such as those powered by electric, natural gas, biodiesel, and fuel cells by Riverside residents and workers.	The Project would install conduits for vehicle charging stations.
T-20	Eco-Corridor Create a geographically defined area(s) featuring best practices in sustainable urban design and green building focused	The Project is not located in a potential Eco-Corridor as identified in the RRG-CAP Measure T-20: Eco-Corridor/Green Enterprise Zone section. This measure does not apply to the Project.

Number	Strategy/Goal	Project Consistency
	on supporting both clean-tech and green businesses.	
Local Water Measures		
<i>The following local measure is expected to reduce GHG emissions associated with the water sector.</i>		
W-1	Water Conservation and Efficiency Reduce per capita water use by 20 percent by 2020.	As discussed, in previous sections, the project would be required to reduce indoor water consumption by 20 percent in accordance with CalGreen.
Local Solid Waste Measures		
<i>The following are local measures that can be implemented to reduce GHG emissions associated with the solid waste sector.</i>		
SW-1	Yard Waste Collection Provide green waste collection bins community-wide.	This measure applies to residential uses; therefore, the measure does not apply to the Project.
SW-2	Food Scrap and Paper Diversion Divert food and paper waste from landfills by implementing commercial and residential collection program.	This measure applies to residential and commercial uses; therefore, the measure does not apply to the Project. However, the Project would include recycling storage and would divert waste from landfills in accordance with AB 341.
Local Agriculture Measures		
<i>The following are local measures that can be implemented to reduce GHG emissions associated with the urban forest and the local food and agricultural sectors.</i>		
A-1	Local Food and Agriculture Promote local food and agricultural programs.	The Project is not associated with food or agricultural uses; therefore, this measure does not apply to the Project.

As discussed in Table 5.7-8 above, the Project would be consistent with applicable RRG-CAP measures. The Project would be required to comply with the regulations discussed above that have been adopted to implement the Scoping Plan and to achieve the SB 32 2030 target. As a result, the Project would not conflict with applicable plans, policies, or regulations adopted for the purpose of reducing GHG emissions. Impacts would be **less than significant with Mitigation Measure MM AIR-1**. MM AIR-1 is as follows:

MM AIR-1: The project applicant is required to record a covenant on the property (Parcels 1 and 2) that prohibit manufacturing use. Proof of the record of covenant shall be submitted to the City of Riverside Planning Department prior to issuance of Building Permits.

5.7.6 Proposed Mitigation Measures

As the Project does not exceed any of the significance thresholds and potential impacts are expected to be less than significant, no mitigation measures are required to reduce potential impacts from the proposed Project as described in Section 3.0 Project Description. However, **Mitigation Measure MM AIR-1** is required to ensure that the actual use of the site is consistent with the use described in the Project Description and analyzed in the project specific greenhouse gas analysis.

MM AIR-1: The project applicant is required to record a covenant on the property (Parcels 1 and 2) that prohibit manufacturing use. Proof of the record of covenant shall be submitted to the City of Riverside Planning Department prior to issuance of Building Permits.

5.7.7 Cumulative Environmental Effects

GHG emissions would result from construction and operation of the Project. Construction activities emit GHGs primarily through the combustion of fuels in on- and off-road equipment and vehicles. Operational emissions include mobile, energy (electricity and natural gas), area (landscape maintenance equipment), water and wastewater, and solid waste sources.

GHG emission associated with construction and operation of the Project were calculated and compared to the SCAQMD annual screening threshold of 10,000 MT CO₂E for industrial uses. This threshold is based on the concept of establishing a GHG emission market capture rate. Following rationale presented in the CAPCOA Guidance, the aggregate emissions from all projects with individual annual emissions that are equal to or less than the identified market capture rate would not impede achievement of the state GHG emissions reduction targets codified by AB 32 (2006) and SB 32 (2016). Therefore, impacts under CEQA would be less than significant cumulatively **with Mitigation Measure MM AIR-1**.

As shown in Table 5.7-7, the Project would result in a net increase of 7,405 MT CO₂E per year, which would be less than the 10,000 MT CO₂E screening level. Additionally, the Project would be consistent with applicable RRG-CAP measures and is in line with the GHG reductions needed to achieve the 2050 GHG emission reduction targets identified by EO S-3-05. Therefore, the Project would not generate GHG emissions that would cause a significant impact on the environment and the impacts are **less than significant with Mitigation Measure MM AIR-1**.

Additional cumulative development projects will also be subject to consistency analysis with the City's CAP as well as state and sub-regional policies that restrict GHG production. As these buildings, roads, or other cumulative developments are updated or replaced over time, they will be subject to the then-existing requirements for GHG emissions reductions, including those set forth to ensure compliance with Executive Orders S-3-05 and B-30-15, as described in Section 5.4.2.3, as well as then-existing technologies employed to achieve deep reductions in GHG emissions. Therefore, cumulative impacts to GHG emissions will be **less than significant with Mitigation Measure MM AIR-1** from the Project and other cumulative development projects within the City of Riverside.

5.7.8 References

The following references were used in the preparation of this section of the DEIR:

GAP 2012	City of Riverside, <i>Green Action Plan</i> Accessed October 2020. (Available at http://greenriverside.com/pdf/Green_Action_Plan%202012.pdf)
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RECON 2020	RECON, <i>Greenhouse Gas Analysis for the Sycamore Hills Distribution Project</i> , October 2020. (Appendix H)
RRG-CAP	Riverside Restorative Growthprint, Economic Prosperity Action Plan and Climate Action Plan, January 2016. (Available at https://riversideca.gov/cedd/sites/riversideca.gov/cedd/files/pdf/planning/other-plans/2016%20Riverside%20Restorative%20Growthprint%20Economic%20Proposerity%20Action%20Plan%20and%20Climate%20Action%20Plan.pdf)
Urban Crossroads 2019	Urban Crossroads, Sycamore Hills Distribution Center Vehicles Miles Traveled (VMT)/ Trip Length Analysis

5.8 Hazards & Hazardous Materials

Based on Appendix G of the *State CEQA Guidelines*, the analysis in the Initial Study (IS/NOP) prepared for this Project (Appendix A), and comments received during the NOP public comment period, this section evaluates potential impacts related to hazards & hazardous materials.

The following discussion is based, in part, on the *Phase I Environmental Site Assessment (ESA)* was prepared by Environmental & Regulatory Specialists, Inc. (EARSi) in June 2020 (Appendix I). The purpose of the ESA was to identify, to the extent feasible, recognized environmental conditions (RECs) in connection with the Project site, via records review, site reconnaissance, interviews and through evaluation and report preparation.

5.8.1 Setting

The Project site is currently undeveloped and vacant but has been used historically as open space. The topography consists of natural rolling terrain descending gradually from a west to east direction. There are granitic rock outcroppings throughout the property. The Project site contains two drainages, Drainage A and Drainage B. Drainage A enters the site near the northern portion of the western boundary and flows for approximately 1,183 feet before exiting the site near the middle of the northern boundary. Drainage B enters the site near the middle of the southern boundary and flows for approximately 981 feet before exiting the site near the middle of the northern boundary. The Project site contains low to moderate vegetation primarily consisting of non-native grasslands and weeds as well as some riparian woodland.

Based on records searches, interviews, aerial photos and site reconnaissance, this assessment revealed no evidence of RECs on the surface or in the groundwater below the Project site, nor is vapor encroachment likely from off-site sources. There is no evidence that hazardous substances or petroleum products above *de minimus* quantities existed on the Project site.

Historical Use of Project Site

Historic aerial photos dated 1938 show the Project site as open space with dirt roads/paths crisscrossing the area. Aerial photos show the Project site initially as disturbed open space with the current uses of neighboring parcels gradually filling in with development. The dominant use of the general Project area was the former March AFB, located southeast of the Project site.

The objective of consulting historical sources is to develop a history of the previous uses of the Project site and surrounding area to help identify the likelihood of past uses that might have led to RECs in connection with the Project site. Changes observed from historic aerial photos are listed below. Appendix IV of the Project's ESA (Appendix I) contains the 13 Historic Aerial Photos used.

1938 - Alessandro Boulevard is a dirt road that veers north off its future path as it moves east. The Project site is open space. The northwest, southwest and southeast corners of the future intersection of Alessandro Boulevard and Barton Street have been disked.

1953 - The Project site appears disked. There is an oval dirt track near the center of the Project site. Alessandro Boulevard has been widened.

1967 - The Project site has many dirt paths. The street pattern for the first phase of the residential development on the southeast corner of Alessandro Boulevard and Barton Street is in place.

1978 - The first phase of the residential development on the southeast corner of Alessandro Boulevard and Barton Street has been built. Alessandro Boulevard now has four lanes.

1985 - No significant change.

1989 - No significant change. Two objects appear near the center of the Project site.

1994 - The grading for the “ponds” and the two buildings west of Barton Street and north of Alessandro Boulevard has occurred. The two objects on the Project site have disappeared. Grading for the building on the northeast corner of Alessandro Boulevard and Barton Street that will become Citywide Self Storage has been done.

2006 - The residential development west of Barton Street and south of Alessandro Boulevard, the “ponds” west of Barton Street and northwest of the Project site, and the two buildings west of Barton Street and southwest of the Project site are in place. More of the residential development south of the Project site across Alessandro Boulevard has filled in. The Citywide Self Storage building has been constructed.

2009 - No significant change.

2012 - No significant change.

2016 - No significant change.

Historical Use on Adjacent and Surrounding Properties

Beginning around World War II, March AFB (southeast area of the aerial photos) controlled the use of the area. Surrounding areas have been developed with residential uses to the south of the Project site across Alessandro Boulevard, first to the east of Barton Street, then to the west; the Metropolitan Water District Facility is located west of the Project site across Barton Street; a self-storage facility is located southwest from the Project site. The properties to the north and east of the Project site remain open space. Historic aerial photographs are included in the Phase I ESA Report's Appendix IV (pages 224-237 of the pdf file).

Records Review – Regulatory Agency Record Search

Overview

The purpose of the records review was to obtain and examine records to help identify RECs in connection with the Project site. A computer search of regulatory agency databases was performed by Environmental Data Resources (EDR) to locate properties reported as hazardous material generators, known sites with above or below ground storage tanks, sites having leaking storage tanks, sites where hazardous material spills have occurred or for other criteria in accord with American Society for Testing and Materials (ASTM) Standard Practices for Environmental Site Assessments, E-1527-13.

Regulatory records contain considerable information about various environmental concerns. In some instances, there may be no REC or impairment regarding the subject property arising from these listings because A) the flagged sites are sufficiently distant from the subject property, B) the flagged sites are down-gradient from the subject property so groundwater contamination below these locations would be carried away from the property given the direction of groundwater flow, C) the concern has been remediated to “case closed” status as determined by relevant governmental review agencies indicating minimal remaining contamination, or D) for other reasons.

Information such as depth and gradient of groundwater, direction and distance from a subject property, and current status of the listed property are considered when determining potential environmental impacts to a subject property.

Some potential environmentally impacted locations identified by the database search are counted on more than one list. Some databases searched are indexes into other databases, which inflates the number of reports flagged. In addition, some listed properties appear under different names or ownerships, or the addresses were specified differently such that the searching software is unable to determine that an entry was for an already found location. Moreover, the same location is often listed multiple times for the same concern. Thus, the actual number of distinct physical locations with potentially environmentally impacted soils or groundwater is less than initially indicated.

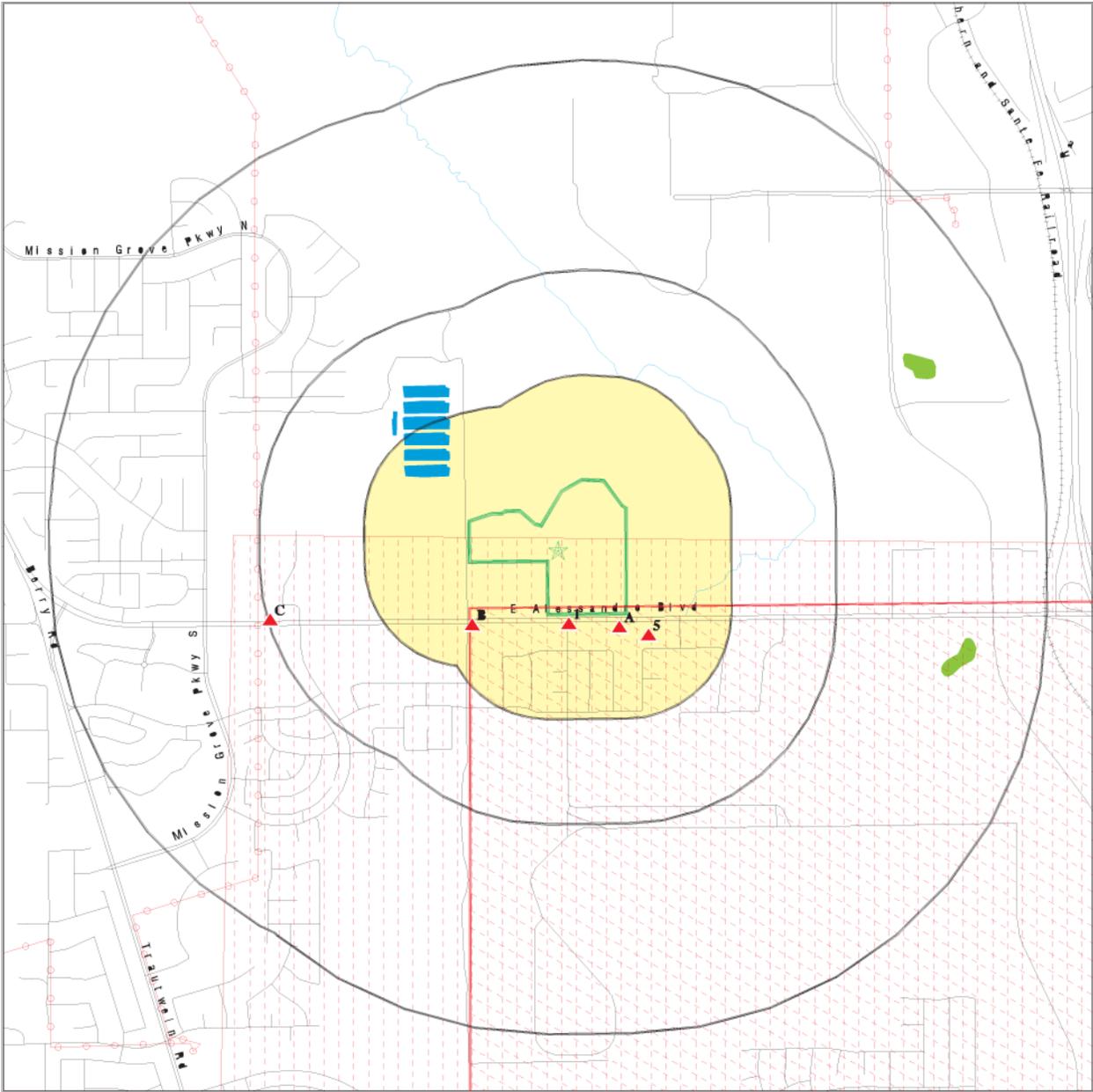
EDR Search Results

Figures 5.8-1 and 5.8-2 provide the One-Mile and 1/4-Mile Radius Maps, respectively, generated for the Project site during the regulatory database search. No reports were found by the EDR search for the Project site, while the EDR search found 23 reports for nearby sites. The EDR reports map to six (6) unique addresses, these sites are listed in Table 5.8-1 below and identified in Figures 5.8-1 and 5.8-2 provide the One-Mile and 1/4-Mile Radius Maps. The EDR report provides links to the California Water Boards GeoTracker website, which is the main repository for leaking underground storage tank (LUST) reports. Eight of the Geotracker reports are for registered storage tanks, and no indication of problems or violations were noted for these sites. Additionally, six reports were for LUSTs; all six of these LUST reports are listed as “Completed – Case Closed” indicating satisfactory cleanup of the spill. None of the reports found by the EDR or Geotracker searches raise an environmental concern for the Project site.

Table 5.8-1 – Surrounding Sites Search Results Locations

Site Name	Map ID	Database Site was Flagged
March AFB	Regional	NPL ¹ , CERCLIS (SEMS) ² , RCRA LQG ³ , US ENG Control ⁴ , DOD ⁵ , ROD ⁶ , PRP ⁷
Eagle Gas, Adira Inc.	1, A	UST ⁸ , SWEEPS UST ⁹ , EDR Hist Auto ¹⁰ , CA FID UST ¹¹ , HAZNET ¹²
KJ Auto Trans Inc.	5	EDR Hist Auto
Victoria Cleaner, Flamingo Cleaner	B, B6	Dry Cleaners
Eastern Municipal, Mills Pumping Plant	C	LUST ¹³ , SWEEPS UST, CA FID UST, EMI ¹⁴ , HIST UST ¹⁵
MWD Mills Filtration	C	LUST, CHMIRS ¹⁶ , NPDES ¹⁷ , HIST CHMIRS

¹National Priority List (Superfund): identifies over 1,200 sites for priority cleanup under the Superfund Program.
²Compensation and Liability Information System: database where EPA Federal Facilities Restoration and Reuse Office is involved in cleanup activities; Superfund Enterprise Management System: tracks hazardous waste sites, potentially hazardous waste sites, and remedial activities performed in support of the Superfund Program.
³Resource Conservation and Recovery Act – Large Quantity Generators: LQGs generate over 1,000 kilograms (kg) of hazardous waste, or over 1 kg of acutely hazardous waste per month.
⁴Engineering Controls Sites List: a listing of sites with engineering controls in place; engineering controls involve various forms of caps, building foundations, liners, and treatment methods to create pathway elimination for regulated substances to enter environmental media or affect human health.
⁵Department of Defense Sites: data set consists of federally owned or administered lands, administered by the DOD, that have any area equal to or greater than 640 acres of the U.S., Puerto Rico, and the U.S. Virgin Islands.
⁶Records of Decision: ROD documents mandate a permanent remedy at an NPL (Superfund) site containing technical and health information to aid in the cleanup.
⁷Potentially Responsible Parties: listing of potentially responsible parties.
⁸Underground Storage Tanks listing.
⁹Statewide Environmental Evaluation and Planning System: underground storage tank listing; no longer updated and maintained.
¹⁰EDR Exclusive Historical Auto Stations: listings of potential gas station/filling station sites available to EDR researchers.
¹¹Facility Inventory Database: contains a historical listing of active and inactive underground storage tank locations from the State Water Resource Control Board.
¹²Facility Manifest Data: data extracted from copies of hazardous waste manifests received each year by the Department of Toxic Substances Controls (DTSC).
¹³Leaking Underground Storage Tank Sites included in GeoTracker, which is the Water Boards data management system for sites that impact, or have the potential to impact, water quality in California, with an emphasis on groundwater.
¹⁴Emissions Inventory Data: toxics and criteria pollutant emissions data collected by the Air Resources Board and local pollution agencies.
¹⁵Hazardous Substance Storage Container Database: a historical listing of underground storage tank sites.
¹⁶California Hazardous Materials Incident Report System: contains information on reported hazardous material incidents (accidental releases or spills).
¹⁷National Pollutant Discharge Elimination System.



- Target Property
- Sites at elevations higher than or equal to the target property
- Sites at elevations lower than the target property
- Manufactured Gas Plants
- National Priority List Sites
- Dept. Defense Sites
- Indian Reservations BIA
- Power transmission lines
- 100-year flood zone
- 500-year flood zone
- National Wetland Inventory
- State Wetlands
- Upgradient Area
- Areas of Concern

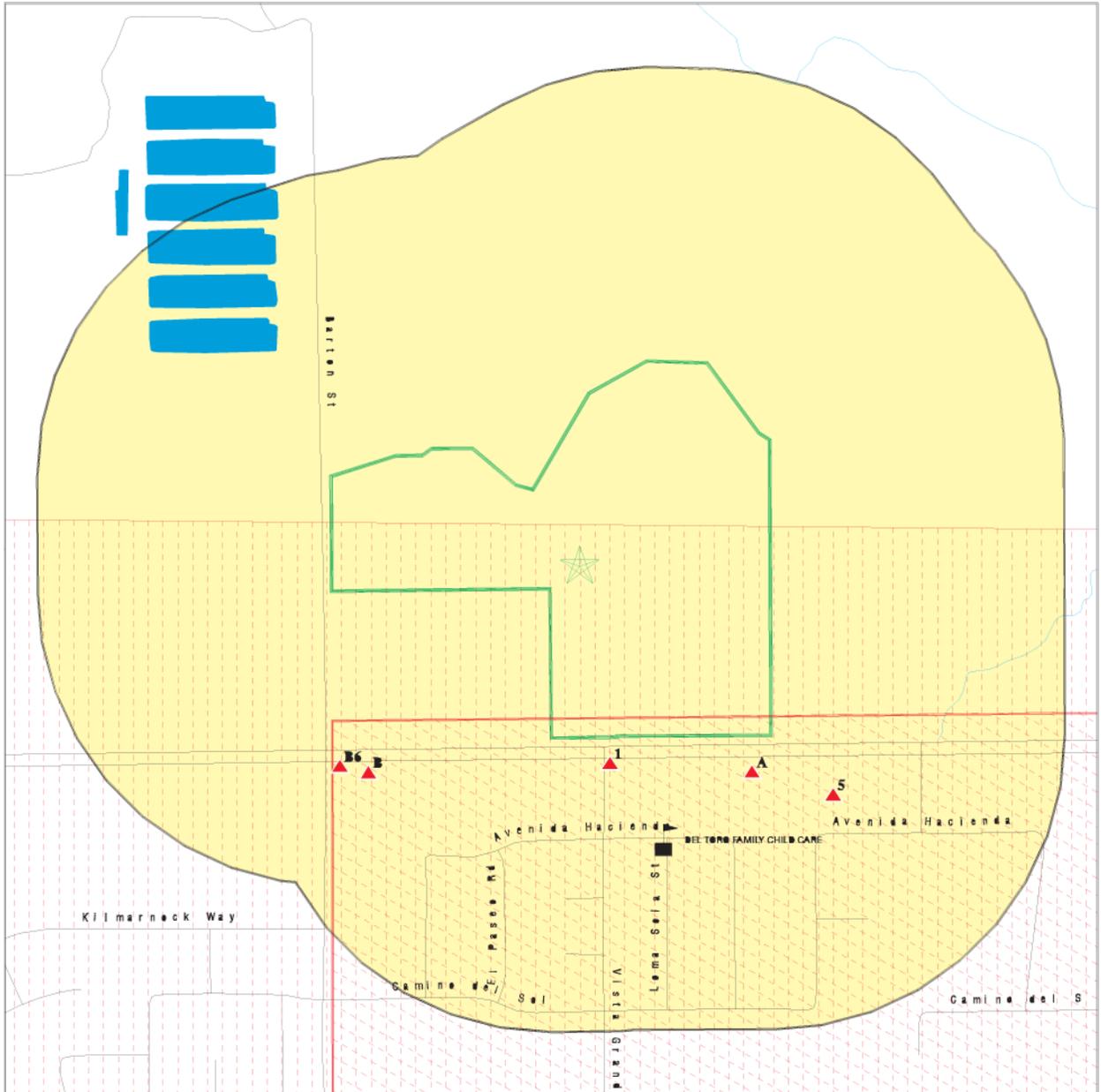
SYCAMORE HILLS DISTRIBUTION CENTER



EARSI

EDR 1 - Mile Radius From Project Site Map

Figure 5.8-1



- Target Property
- Sites at elevations higher than or equal to the target property
- Sites at elevations lower than the target property
- Manufactured Gas Plants
- Sensitive Receptors
- National Priority List Sites
- Dept. Defense Sites

- Indian Reservations BIA
- 100-year flood zone
- 500-year flood zone
- Areas of Concern

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EARS I

EDR 1/4 - Mile Radius From Project Site Map

Figure 5.8-2

Existing Environmental Conditions

EARSI conducted reconnaissance of the Project site and adjacent properties on October 4, 2018 with an update on June 29, 2020. The purpose of the site reconnaissance was to ascertain visual evidence used to identify RECs in connection with the Project site such as evidence of the use, storage, generation, release, or disposal of hazardous materials or petroleum products based on current conditions. The Project site was traversed on foot while searching for signs of RECs.

Storage Tanks: During the reconnaissance, there was no visual evidence of above or belowground tanks.

Odors: During the reconnaissance, no noxious odors were detected.

Hazardous Substances and Petroleum Products Containers: During the reconnaissance, there was no visual evidence of potentially hazardous substances or industrial hazardous waste impacts, electrical transformers, hazardous substances, or petroleum products.

Polychlorinated Biphenyls (PCBs): Records search indicates there is no evidence of PCBs present on or near the site.

Stained Soil or Pavements: During the reconnaissance, no signs of soil staining, grading, debris, or other indicators of REC were found.

Distressed Vegetation: During the reconnaissance, no distressed vegetation were found.

Wastewater: Records search indicates there is no evidence of wastewater pits.

Groundwater Wells: No groundwater wells were observed on property.

Oil and Gas Well Records

No oil wells were mapped by the EDR Search.

Soils

Ten soil types were mapped in the vicinity of the Project site with four mapped as likely present on the Project site. All are characterized as variants of well-drained sandy loam with slow infiltration rates. Detailed information on the area soil map and soil types appears in the EDR Radius Map report that is included in the ESA.

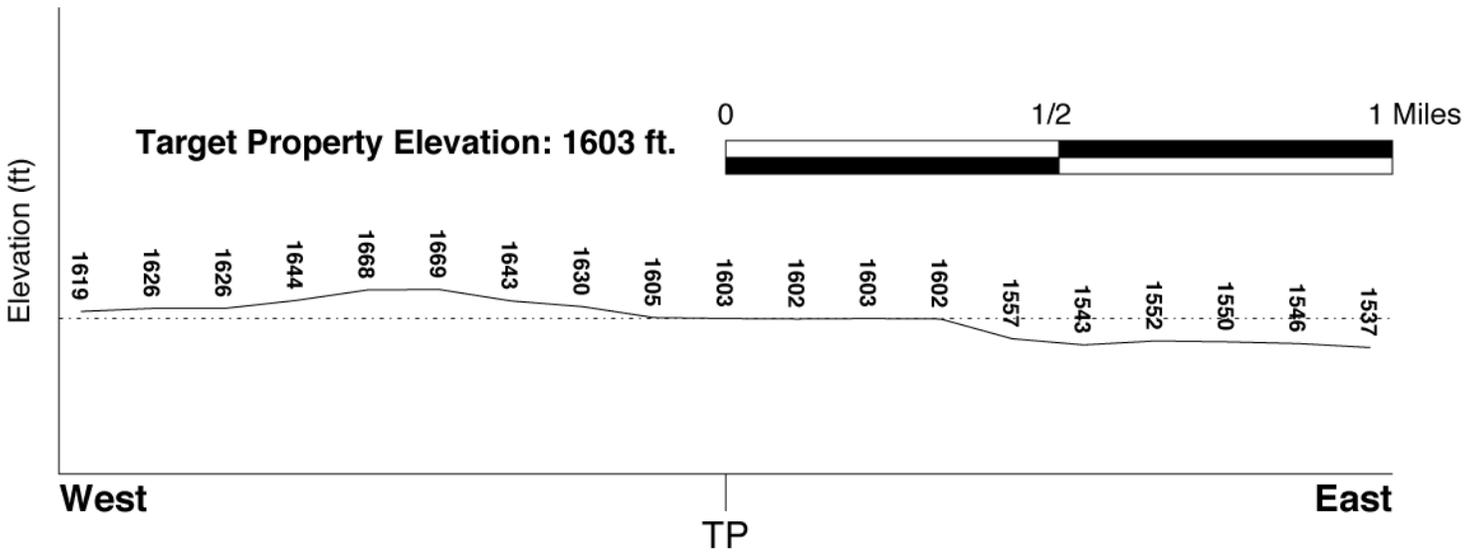
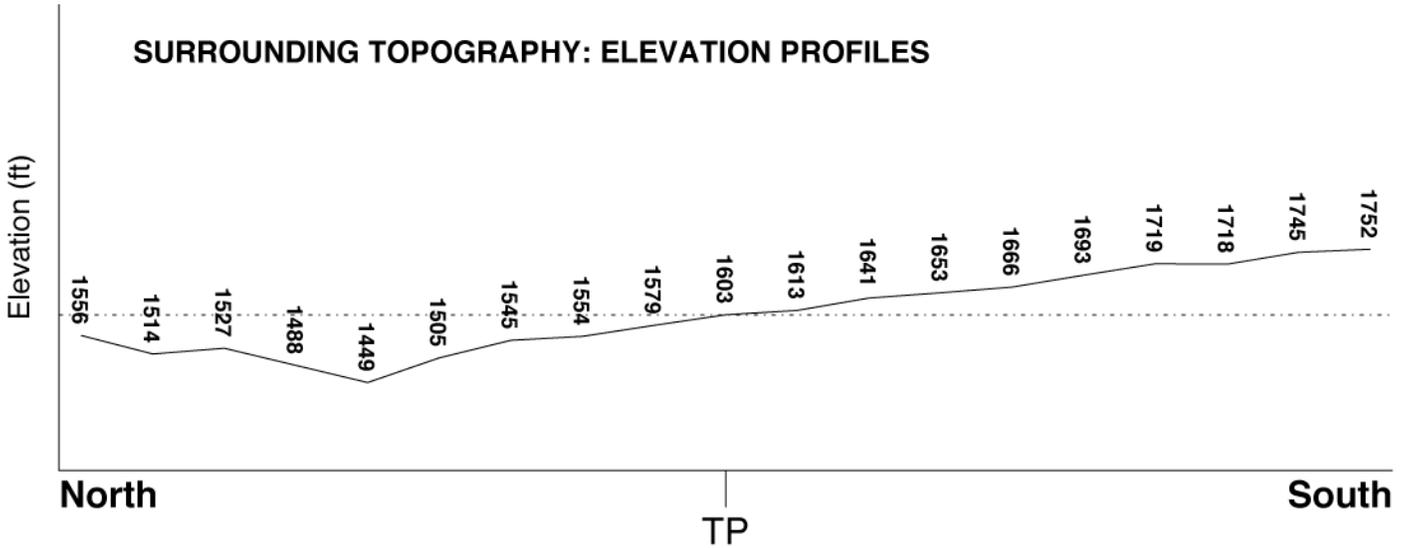
Radon Records

The EDR Report listed 22 Radon tests for the Project area in the California Radon database with only one test indicating more than 4 pCi/L. Federal Radon Information lists one site with results less than 4 pCi/L. The EPA maps Riverside County (County) as Zone 2 with indoor average level between 2 and 4 pCi/L.

Vapor Encroachment

There is no evidence that vapor encroachment is likely to impact the Project site. On the day of the site reconnaissance, no noticeable odor was reported.

SURROUNDING TOPOGRAPHY: ELEVATION PROFILES



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Surrounding Topography: Elevation Profiles

Figure 5.8-3

Emergency Response

Any potential hazard in the City resulting from a manmade or natural disaster may result in the need for evacuation of few or thousands of citizens in the City. Homeland Security has brought disaster awareness to the forefront of the minds of the community, safety officials, and City staff. The Emergency Management Office (EMO) within the Riverside Fire Department (RFD) coordinates emergency response, disaster preparedness and disaster recovery by activating the Standardized Emergency Management System (SEMS) and National Incident Management System (NIMS). The EMO prepares an Emergency Operations Plan, essential to the coordination of efforts in response to a major disaster, whatever its origin. The SEMS creates a system where City, County, and State emergency services work jointly to respond to any disaster in a coordinated approach. (GP 2025 FPEIR, pp. 5.7-12 – 5.7-13) Moreover, the Emergency Operations Center (EOC) is a secure facility where designated City personnel congregate to work in response to a disaster. The EOC, serving at the center of all City emergency operations, is located at 3085 Saint Lawrence Street in the City's corporation yard (RFD DP).

Critical components of the Emergency Operations Plan include the establishment of multiple evacuation routes and the ability to provide emergency services in the swiftest manner possible. Figure PS 8.1 in the GP 2025 identifies the City's evacuation routes and existing infrastructure that can influence response times during a major disaster. According to GP 2025 Figure PS 8.1, no roadways that serve the Project site or within the Sycamore Canyon Business Park Specific Plan are identified for an evacuation route; however, Interstate 215 (I-215), located approximately 1.5 miles east of the Project site, and State Route 60, located approximately 1.6 miles east of the Project site, may be utilized for emergency evacuation.

Wildland Fires

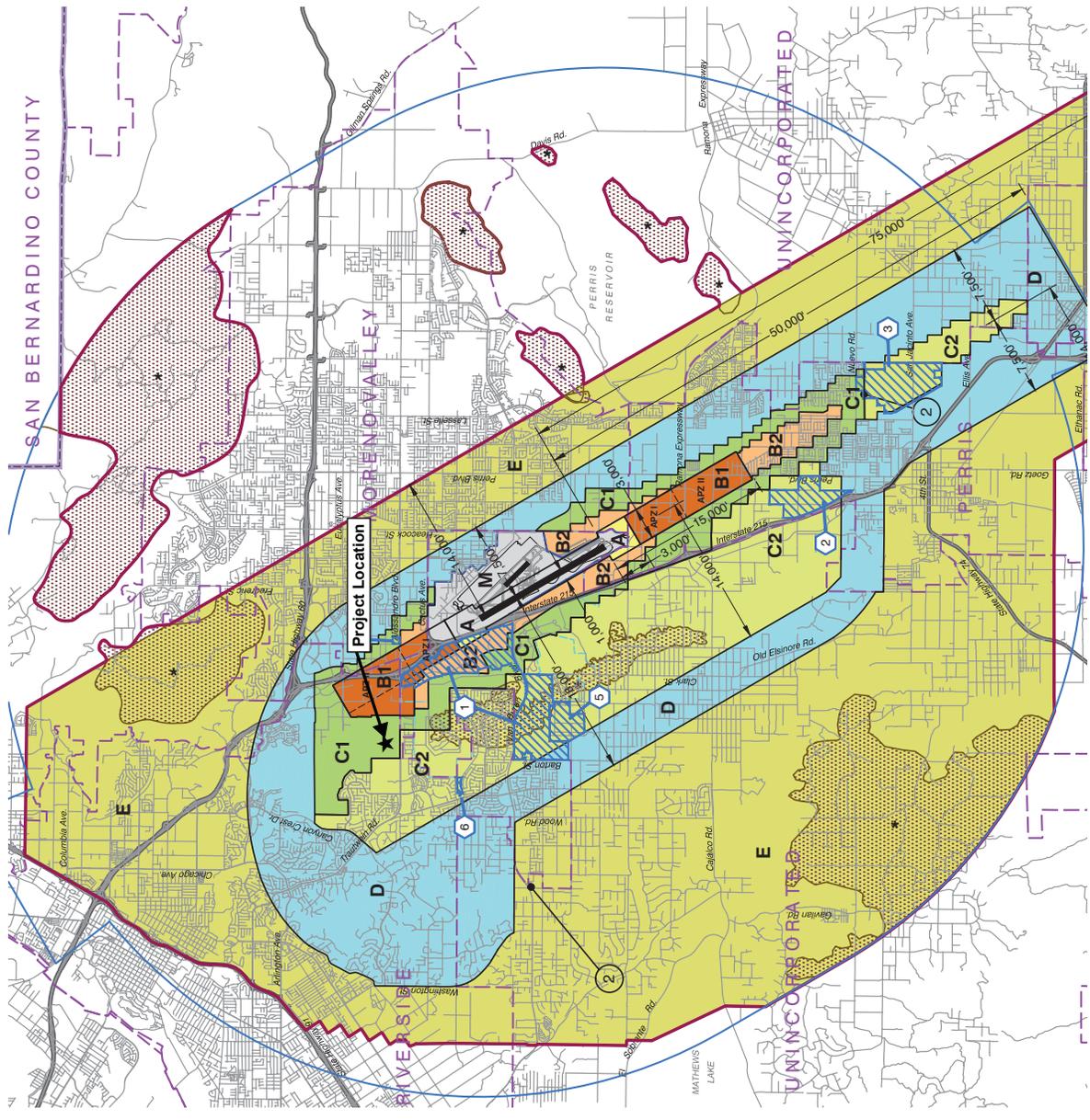
Due to its weather, topography and native vegetation, nearly all of Southern California is at some risk from wildland fires. The extended droughts characteristic of California's Mediterranean climate result in large areas of dry vegetation that provide fuel for wildland fires, which can spread into urban areas. Wildland-urban fires occur when a fire burning in wildland vegetation gets close enough to ignite urban structures. Areas of dense, dry vegetation, particularly in canyon areas and hillsides pose the greatest wildland fire potential. (GP 2025, FPEIR, p. 5.7-13)

The major urban/rural interface areas that are at risk of fire within the City of Riverside include Mount Rubidoux, the Santa Ana River basin, Lake Hills, Mockingbird Canyon/Monroe Hills, Sycamore Canyon, Box Springs Mountain and the La Sierra/Norco Hills (GP 2025, Figure PS-7). The Project site it is partially located within a *Hills and Canyons* area (generally coinciding with the Sycamore Canyon Wilderness Park) as identified in the GP 2025 Public Safety Element, Figure PS-7, Fire Hazard Areas. The Project site falls under the responsibility of RFD in the event of a fire (GP 2025 FPEIR, Figure 5.7-3A).

Airport Land Use Compatibility Zones

The Project site is located approximately 3.4 miles northwest from the March Air Reserve Base (MARB) and is located within MARB's airport influence area boundary. The Project site is located within Zone C1 of the March Air Reserve Base/Inland Port Airport (IPA) Land Use Compatibility Plan (LUCP), as reflected on Figure 5.8-4. Consistency with MARB's airport influence area is determined based on each criterion of the applicable compatibility zone, as shown on Table 5.8-2 – LUCP Compatibility Criteria for Zones C1.

Zone C1 encompasses most of the projected 60 dB CNEL contour plus immediately adjoining areas. The zone boundary follows geographic features. Accident potential risks are moderate because aircraft fly at low altitudes over or near the zone. Even though exposed to projected noise above 60 dB CNEL, the accident potential risks at this distance from the runway are reduced by the altitude at which aircraft fly over the area.



LEGEND

- Compatibility Zones**
- Airport Influence Area Boundary
 - Zone A
 - Zone B1
 - Zone B2
 - Zone C1
 - Zone C2
 - Zone D
 - Zone E
 - Zone M
 - High Terrain Zone
 - FAR Part 77 Military Outer Horizontal Surface Limits
 - FAR Part 77 Notification Area
- Boundary Lines**
- March Air Reserve Base / Air Force Property
 - March Joint Powers Authority Property Line
 - County Boundary
 - City Limits
 - Site-Specific Exceptions (existing local agency commitments to development projects)
- Numbered Callouts:**
- 1 March JPA: March Business Center/Meridian
 - 2 Perris: Harvest Landing
 - 3 Perris: Park West
 - 4 Moreno Valley: Affordable Housing
 - 5 March JPA: Ben Clark Training Center
 - 6 Riverside: Ridge Crest Subdivision
- Notes:**
- 1 Point at which aircraft on Runway 32 LS approach descend below 3,000 feet above runway end. Airport Elevation is 1,535 feet MSL.
 - 2 Point at which departing aircraft typically reach 3,000 feet above runway end.

**Riverside County
Airport Land Use Commission**

Note:
All dimensions are measured from runway ends and centerlines.



Base map source: County of Riverside 2013



SYCAMORE HILLS DISTRIBUTION CENTER
March Air Reserve Base/ Inland Port Airport Land Use Compatibility Plan Map

Figure 5.8-4

Prepared by Mead & Hunt, Inc. (June 2013)

Table 5.8-2 – LUCP Compatibility Criteria for Zone C1

Zone	Locations	Density/Intensity Standards			Req'd Open Land	Additional Criteria	
		Residential (du/ac)	Other Uses (people/acre) ¹			Prohibited Uses ⁴	Other Development Conditions
			Avg ²	Single ³			
C1	Primary Approach/Departure Zone	≤3.0	100	250	None required	<ul style="list-style-type: none"> • Children's schools, day care centers, libraries • Hospitals, congregate care facilities, places of assembly • Noise-sensitive outdoor nonresidential uses⁵ • Hazards to flight⁶ 	<ul style="list-style-type: none"> • Critical community infrastructure facilities discouraged⁷ • Aboveground bulk storage of hazardous materials discouraged⁸ • Sound attenuation as necessary to meet interior noise level criteria⁹ • Airspace review required for objects >70 feet tall¹⁰ • Electromagnetic radiation notification¹¹ • Deed notice and disclosure¹²

¹Usage intensity calculations shall include all people (e.g., employees, customers/visitors, etc.) who may be on the property at a single point in time, whether indoors or outside.

²Average acre density. The total number of people permitted on a project site at any time, except rare special events, must not exceed the indicated usage intensity times the gross acreage of the site. Rare special events are ones (such as an air show at the airport) for which a facility is not designed and normally not used and for which extra safety precautions can be taken as appropriate.

³Single acre density. Clustering of nonresidential development is permitted. However, no single acre of a project site shall exceed the indicated number of people per acre. See Countywide Policy 4.2.5 for details.

⁴The uses listed here are ones that are explicitly prohibited regardless of whether they meet the intensity criteria. In addition to these explicitly prohibited uses, other uses will normally not be permitted in the respective compatibility zones because they do not meet the usage intensity criteria. See Riverside County Airport Land Use Compatibility Plan, Volume 1, Appendix D for a full list of compatibility designations for specific land uses.

⁵Examples of noise-sensitive outdoor nonresidential uses that should be prohibited include major spectator-oriented sports stadiums, amphitheaters, concert halls and drive-in theaters. Caution should be exercised with respect to uses such as poultry farms and nature preserves.

⁶Hazards to flight include physical (e.g., tall objects), visual, and electronic forms of interference with the safety of aircraft operations. Land use development that may cause the attraction of birds to increase is also prohibited. Man-made features must be designed to avoid heightened attraction of birds. Additionally, certain farm crops and farming practices that tend to attract birds are strongly discouraged. Also see Countywide Policy 4.3.7.

⁷Critical community facilities include power plants, electrical substations, and public communications facilities. See Countywide Policy 4.2.3(d).

⁸In Zone C1, aboveground storage of more than 6,000 gallons of hazardous or flammable materials per tank is discouraged.

⁹Office space must have sound attenuation features sufficient to reduce the exterior aviation-related noise level to no more than CNEL 45 dB. To ensure compliance with these criteria, an acoustical study shall be required to be completed for any development proposed to be situated where the aviation-related noise exposure is more than 20 dB above the interior standard (e.g., within the CNEL 60 dB contour where the interior standard is CNEL 40 dB). Standard building construction is presumed to provide adequate sound attenuation where the difference between the exterior noise exposure and the interior standard is 20 dB or less.

¹⁰This height criterion is for general guidance. Airspace review requirements are determined on a site-specific basis in accordance with Part 77 of the Federal Aviation Regulations. Shorter objects normally will not be airspace obstructions unless situated at a ground elevation well above that of the airport. Taller objects may be acceptable if determined not to be obstructions. The FAA or Caltrans Division of Aeronautics may require marking and/or lighting of certain objects. See Countywide Policies 4.3.4 and 4.3.6 for additional information.

¹¹MARB must be notified of any land use having an electromagnetic radiation component to assess whether a potential conflict with MARB radio communications could result. Sources of electromagnetic radiation include microwave transmission in conjunction with a cellular tower, radio wave transmission in conjunction with remote equipment inclusive of irrigation controllers and other similar EMR emissions.

¹²Deed notice requirements indicated for specific compatibility zones apply only to new development and to reuse if discretionary approval is required.

5.8.2 Related Regulations

5.8.2.1 Federal Regulations

A variety of Federal laws and regulations governing the management and control of hazardous substances have been established at the Federal level to protect the environment. Primary Federal agencies with responsibility for hazardous materials management include the United States Environmental Protection Agency (USEPA), United States Department of Labor's Occupational Safety and Health Administration (OSHA), United States Department of Transportation (USDOT), and the Nuclear Regulatory Commission (NRC). Major Federal laws and issue areas include the following statutes and regulations:

Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA)

Discovery of environmental health damage from disposal sites prompted the United States Congress to pass CERCLA, also known as Superfund. The purpose of CERCLA is to identify and clean up chemically contaminated sites that pose a significant environmental health threat. The Hazard Ranking System is used to determine whether a site should be placed on the National Priorities List for cleanup activities.

Superfund Amendments and Reauthorization Act

The Superfund Amendments and Reauthorization Act (SARA) pertains primarily to emergency management of accidental releases. It requires formation of state and local emergency planning committees, which are responsible for collecting, material handling, and transportation data for use as a basis for planning. Chemical inventory data are made available to the community at large under the "right-to-know" provision of the law. Additionally, SARA also requires annual reporting of continuous emissions and accidental releases of specified compounds. These annual submissions are compiled into a nationwide Toxics Release Inventory (TRI).

Resource Conservation and Recovery Act

Resource Conservation and Recovery Act (RCRA) Subtitle C addresses hazardous waste generation, handling, transportation, storage, treatment, and disposal. It includes requirements for a system that uses hazardous waste manifests to track the movement of waste from its site of generation to its ultimate disposition. The 1984 amendments to RCRA created a national priority for waste minimization. Subtitle D establishes national minimum requirements for solid waste disposal sites and practices. It requires states to develop plans for the management of wastes within their jurisdictions. Subtitle I requires monitoring and contaminant systems for underground storage tanks that hold hazardous materials. Owners of tanks must demonstrate financial assurance for the cleanup of a potential leaking tank.

Hazardous Materials Transportation Act

The Hazardous Materials Transportation Act (HMTA) is the statutory basis for the extensive body of regulations aimed at ensuring the safe transport of hazardous materials on water, rail,

highways, in the sky, or in pipelines. It includes provisions for materials classification, packaging, marking, labeling, placarding, and shipping documentation.

Federal Aviation Regulations, Part 77

The Federal Aviation Regulations (FAR), Part 77, Objects Affecting Navigable Airspace, establishes standards for determining obstructions to navigable airspace and the effects of such obstructions on the safe and efficient use of that airspace. The regulations require that the Federal Aviation Administration (FAA) be notified of proposed construction or alteration of objects (whether permanent, temporary, or of natural growth) using FAA Form 7460-1 if those objects would be of a height that exceeds FAR Part 77 criteria. Further, FAR Part 77 regulations define a variety of imaginary surfaces at certain altitudes around airports. Surfaces include the primary surface, approach surface, transitional surface, horizontal surface, and conical surface. Collectively, the surfaces around an airport define a bowl-shaped area with ramps sloping up from each runway end. FAR Part 77 standards are not absolute height restrictions, but instead identify elevations at which structures may present a potential safety problem. Penetrations of the FAR Part 77 surface generally are reviewed on a case-by-case basis.

5.8.2.2 State Regulations

At the State level, California has developed hazardous waste regulations that are similar to the Federal laws, but that are more stringent in their application in some cases. The California Environmental Protection Agency (Cal/EPA) has broad jurisdiction over hazardous materials management in the State. Within Cal/EPA, the Department of Toxic Substances Control (DTSC) is the primary State agency with jurisdiction over hazardous chemical materials management. While DTSC has the primary responsibility for enforcement and implementation of hazardous waste control laws in the State, this responsibility is shared with other State and local government agencies, including the State Water Resources Control Board (SWRCB), Regional Water Quality Control Board (RWQCB), and City and County governments. Other State agencies involved in hazardous materials management are the California Department of Industrial Relations' Division of Occupational Safety and Health (Cal/OSHA), California Emergency Management Agency's Accidental Release Prevention (Cal/ARP), California Department of Fish and Wildlife (CDFW), California Air Resources Board (CARB), California Department of Transportation (Caltrans), California Office of Environmental Health Hazard Assessment (OEHHA), and the California Department of Resources Recycling and Recovery (CalRecycle). Hazardous chemical and bio-hazardous materials management laws in California include the following statutes and regulations:

California Code of Regulations

Most State and Federal regulations and requirements that apply to generators of hazardous waste are spelled out in the California Code of Regulations (CCR), Title 22, Division 4.5. Title 22 contains the detailed compliance requirements for hazardous waste generators, transporters, treatment, storage, and disposal facilities. As California is a fully authorized State according to RCRA, most RCRA regulations, such as those contained in 40 Code of Federal Regulations (CFR) 260, et seq., have been duplicated and integrated into Title 22. However, since DTSC regulates

hazardous waste more stringently than USEPA, the integration of State and Federal hazardous waste regulations that make up Title 22 do not contain as many exemptions or exclusions as RCRA. As with the California Health and Safety Code, Title 22 also regulates a wider range of waste types and waste management activities than do RCRA regulations in 40 CFR 260. To aid the regulated community, California compiled the hazardous materials, waste, and toxics-related regulations contained in CCR Titles 3, 8, 13, 17, 19, 22, 23, 24, and 27, into one consolidated CCR Title 26 “Toxics.” However, the California hazardous waste regulations are still commonly referred to as Title 22.

California Hazardous Material Management Act

The California Hazardous Material Management Act (HMMA) requires that businesses handling or storing certain amounts of hazardous materials prepare a Hazardous Materials Business Plan (HMBP), which includes an inventory of hazardous materials stored on site above specified quantities, an emergency response plan, and an employee training program. Businesses that use, store, or handle 55 gallons of liquid, 500 pounds of a solid, or 200 cubic feet of a compressed gas at standard temperature and pressure require HMBPs. Plans must be prepared prior to facility operation and are reviewed/updated biennially or within 30 days of a change.

California Hazardous Waste Control Law

California Hazardous Waste Control Law (HWCL). HWCL is the primary hazardous waste statute in the State. HWCL requires a hazardous waste generator, which stores or accumulates hazardous waste for periods greater than 90 days at an on-site facility or for periods greater than 144 hours at an off-site or transfer facility that treats or transports hazardous waste, to obtain a permit to conduct such activities. HWCL implements RCRA as a “cradle-to-grave” waste management system in the State. HWCL specifies that generators have the primary duty to determine whether their wastes are hazardous and to ensure their proper management. HWCL also establishes criteria for the reuse and recycling of hazardous wastes used or reused as raw materials. HWCL exceeds Federal requirements by mandating source reduction planning and a much broader requirement for permitting facilities that treat hazardous waste. It also regulates the number of types of wastes and waste management activities that are not covered under Federal law with RCRA.

State Aeronautics Act

The State Aeronautics Act, which is codified in Public Utilities Code Section 21670, et seq., establishes the requirement for the creation of airport land use commissions for every county in which an airport is located that is served by a scheduled airline. Additionally, these sections of the Public Utilities Code mandate the preparation of Comprehensive Land Use Plans (CLUP) to provide for the orderly growth of each public airport and the area surrounding the airport. The purpose of CLUPs includes the protection of the general welfare of inhabitants within the vicinity of the airport and the general public.

California Emergency Services Act

California Government Code 8550-8692 provides for the assignment of functions to be performed by various agencies during an emergency so that the most effective use may be made of all manpower, resources, and facilities for dealing with any emergency that may occur. The coordination of all emergency services is recognized by the State to mitigate the effects of natural, manmade, or war-caused emergencies that result in conditions of disaster or extreme peril to life, property, and the resources of the State. The general purpose is to protect the health and safety and preserve the lives and property of the people of the State.

California Division of Occupational Safety and Health

Occupational safety standards exist in Federal and State laws to minimize worker safety risks from both physical and chemical hazards in the workplace. The California Division of Occupational Safety and Health (Cal/OSHA) is responsible for developing and enforcing workplace safety standards and assuring worker safety in the handling and use of hazardous materials. Among other requirements, Cal/OSHA obligates many businesses to prepare Injury and Illness Prevention Plans and Chemical Hygiene Plans. The Hazard Communication Standard requires that workers be informed of the hazards associated with the materials they handle.

California Building Code

The California Building Standards Code (CBC), in Part 2 of Title 24 of the California Code of Regulations (CCR), identifies building design standards, including those for fire safety. The CBC is based on the International Building Code but has been amended for California conditions. The CBC is updated every three years, and the current 2019 CBC went into effect January 1, 2020. It is effective statewide, but a local jurisdiction may adopt more restrictive standards based on local conditions under specific amendment rules prescribed by the State Building Standards Commission. Commercial and residential buildings are plan-checked by local city and county building officials for compliance with the CBC. Typical fire safety requirements of the CBC include the installation of fire sprinklers in new construction (unless otherwise exempt or using alternative fire suppression systems); the establishment of fire resistance standards for fire doors, building materials, and particular types of construction; and clearance of debris and vegetation within a prescribed distance from occupied structures in wildfire hazard areas.

California Fire Code

The CFC, contained in Part 9 of CCR Title 24, incorporates by adoption the International Fire Code of the International Code Council, with California amendments. The CFC is updated every three years, and the current 2019 CFC went into effect January 1, 2020. It is effective statewide, but a local jurisdiction may adopt more restrictive standards based on local conditions under specific amendment rules prescribed by the State Building Standards Commission. The CFC regulates building standards in the CBC, fire department access, fire protection systems and devices, fire and explosion hazards safety, hazardous materials storage and use, and standards for building inspection.

5.8.2.3 Regional Regulations

Riverside County Hazardous Waste Management Plan

The Riverside County Hazardous Waste Management Plan (CHWMP) identifies current and projected future hazardous waste generation and management needs throughout the County. CHWMP also provides a framework for the development of facilities to manage hazardous wastes, i.e., facility siting criteria, and includes a Households Hazardous Waste Element that is designed to divert household hazardous wastes from County landfills. CHWMP addresses only those hazardous waste issues with which local governments have responsibilities, namely land use decisions. The County and cities are required to implement facility siting policies and criteria within local planning and permitting processes. Accordingly, the City of Riverside implements applicable portions of CHWMP.

March Air Reserve Base/Inland Port Airport Land Use Compatibility Plan

The Riverside County Airport Land Use Commission (ALUC) is the lead agency responsible for airport land use compatibility planning in Riverside County. The fundamental purpose of ALUC is to protect public health, safety, and welfare by ensuring the orderly expansion of airports and the adoption of land use measures that minimize the public's exposure to excessive noise and safety hazards within areas around public airports to the extent that these areas are not already devoted to incompatible uses. The basic function of the airport land use compatibility plans is to promote compatibility between airports and the land uses that surround them. Compatibility plans serve as a tool for use by airport land use commissions in fulfilling their duty to review proposed development plans for airports and surrounding land uses. Additionally, compatibility plans set compatibility criteria applicable to local agencies in their preparation or amendment of land use plans and ordinances and to landowners in their design of new development. On November 13, 2014, ALUC adopted the March Air Reserve Base (MARB)/Inland Port Airport (IPA) Land Use Compatibility Plan (LUCP). The compatibility zones and associated criteria set forth in the LUCP provide noise and safety compatibility protection.

5.8.2.4 Local Regulations

Riverside General Plan 2025

The GP 2025 contains objectives and policies to protect against public safety issues within the City in the Public Safety Element. Policies that may be applicable to the Project include:

Objective PS-3: Minimize risks associated with the storage, transport and disposal of hazardous materials.

Policy PS-3.1: Ensure that the hazardous materials used in business and industry are handled properly.

Policy PS-3.4: Reduce the risks associated with ground transportation hazards, where feasible.

Objective PS-4: Protect the community from hazards related to air and ground transportation.

Policy PS-4.1: Minimize the risk of potential hazards associated with aircraft operations at the Riverside Municipal Airport, March Air Reserve Base/ March Inland Port and Flabob Airport

through the adoption and implementation of the Airport Protection Overlay Zone, and the Riverside County Airport Land Use Compatibility Plan, which includes the March Air Reserve Base/Inland Port Airport Land Use Compatibility Plan.

Policy PS-4.2: When planning for development near airports, anticipate possible increases in airport activity and expansion of airport facilities and services and the effects these changes may have on public safety.

Policy PS-4.3: Encourage development in the vicinity of the Riverside Municipal Airport that would not cause land use conflicts, hazards to aviation or hazards to the public and that is in compliance with the Riverside County Airport Land Use Compatibility Plan for the airport.

Policy PS-4.6: Ensure that development within airport influence areas is consistent with the Airport Protection Overlay Zone development standards and the Riverside County Airport Land Use Compatibility Plan, which includes the March Air Reserve Base/Inland Port Airport Land Use Compatibility Plan.

Policy PS-4.7: Ensure compatible land uses near March Air Reserve Base/March Inland Port through implementation of the March Air Reserve Base/Inland Port Airport Land Use Compatibility Plan, adopted in November 2014.

Riverside Municipal Code

Section 9.48 of the Riverside Municipal Code requires that any person who uses or handles hazardous materials or mixtures containing hazardous materials in an amount equal to, or greater than: (i) five hundred pounds, (ii) fifty-five gallons, (iii) two hundred cubic feet at standard room temperature and pressure for compressed gas, (iv) ten pounds for organic peroxides, or (v) any known or suspected carcinogen, radioactive material, Class A poison, Class A or Class B explosive, shall, during the month of January prepare and submit a completed inventory form and file a hazardous materials business plan with the City Fire Department. Although Project is a speculative development and the tenants are unknown at this time, future tenants that plan to use or handle hazardous materials is required to prepare and submit a completed inventory form and file a hazardous materials business plan with the City Fire Department in accordance with Section 9.48 of the RMC.

Title 16 of the Riverside Municipal Code – Buildings and Construction provides minimum standards to safeguard life or limb, health, property and public welfare by regulating the design, construction, quality of materials, use and occupancy, location and maintenance of buildings, equipment, structures and grading within the City. The proposed warehouse buildings shall be constructed in accordance with Title 16 or the RMC. A permit may be withheld or denied if the Building Official finds there are existing on site violations of the provisions of Chapter 16.04 through 16.20 or any other ordinance of the City.

Title 17 of the Riverside Municipal Code sets forth rules and regulations which will further implement the goals, and objectives of the GP 2025 in order to control evacuation, grading, and earthwork construction. In addition, Title 17 establishes the administrative procedures for grading plan approval, issuance of permits, inspections, and penalties for unauthorized grading activity. With regard to blasting, Title 17 states that no person shall do any excavation blasting without a permit from the Fire Chief, and the conditions contained in the grading permit shall become

conditions of the excavation blasting permit As outlined in the Project Description (Section 3.2.2), it is anticipated that excavation of decomposed granite may be performed utilizing conventional earthmoving equipment. Blasting will not be required and is not proposed as part of the Project site preparation activities.

Sycamore Canyon Wilderness Park Stephens' Kangaroo Rat Management Plan and Updated Conceptual Development Plan (SCWP SKRMP)

The SCWP SKRMP was prepared with two purposes: update the park's conceptual development plan and provide a coordinated Maintenance/Management Plan for the endangered Stephens' kangaroo rat (SKR). Because the Sycamore Canyon Wilderness Park was designated as a core reserve in the Habitat Conservation Plan (HCP) for the SKR, the City was required to prepare a Maintenance/Management Plan for the core reserve. (SCWP SKRMP, p. 1). The SCWP SKRMP considers fire from two different perspectives: control of wildland fire and fire as a management tool. This plan also examines a variety of alternatives for trailheads, edge treatments, and interpretive day-use facilities that will avoid impacts to the SKR habitat. (SCWP SKRMP, p. 163). Refer to Section 5.15 Wildfire for additional details related to the SCWP SKRMP.

5.8.3 Project Design Considerations

Although the Project is not within a Moderate, High or Very High Fire Hazard Severity Zone it is partially located within a *Hills and Canyons* area (generally coinciding with the Sycamore Canyon Wilderness Park) as identified in the GP 2025 Public Safety Element, Figure PS-7, Fire Hazard Areas.

As part of the Project design features, the Project will provide for the safety of on-site employees, customers, and visitors, as well as RFD and will provide for the safe handling of any potential occurrences of hazardous materials that may be encountered during Project construction.

The Project will provide adequate fire access to ensure the safety of on-site building occupants as well as RFD. Building A fire access will be on the south side of the Project site located on Driveway 2/Vista Grande Drive and Alessandro Boulevard, and Building B fire access will be on the west side of the Project site located on Driveway 1 and Barton Street. Buildings A and B will both provide fire access and fire access lanes that will leave room for fire trucks to come in and out of the Project and will allow them to reach all areas of the Project site in the event of a fire. Building A and Building B will have a 26-foot-wide fire access lane (refer to Figure 3.0-9 – Site Plan), which would allow room for fire trucks to easily navigate through the planned development. The Project's buildings will be outfitted with sprinkler systems as a means of further protecting the structures from potential wildfire impacts. A fire truck access gate will be located on the east side of Building A, to provide access to the existing trail that extends east from the Project site. A fire department access gate will be provided at the terminus of Barton Street and the entrance to Sycamore Canyon Wilderness Park, as shown on the site plan (Figure 3.0-9). There is an existing gate at the current terminus of Barton Street to control vehicle access to the park and it will be removed and replaced with a new access gate at the new terminus of Barton Street constructed as part of this Project.

The edge treatment between Building A in Parcel 1 and the Sycamore Canyon Wilderness Park includes an 8-foot high concrete wall and landscaping with fire resistant groundcover, shrubs and columnar trees, consistent with the SCWP SKRMP. The edge treatment between Building B in Parcel 2 includes a 4-foot high wall with 4-foot high tubular steel fence on top along with landscaping that includes fire resistant groundcover, shrubs and columnar trees, also consistent with the SCWP SKRMP. The proposed trailhead parking lot (Parcel C, approximately 1.18 acres) provides an additional set back with landscaping and buffer from the Sycamore Canyon Wilderness Park boundary. The concrete walls, fire resistant landscaping, and set-backs between the wilderness park boundary and the buildings all reduce the risk of fires spreading to the park from the Project site or from the Project site to the park.

In addition, the Project will include risk-reduction design measures due to the Project site's proximity to MARB. Such risk-reduction design measures include:

- The project will not include:
 - Any use which would direct a steady light or flashing light of red, white, green, or amber colors associated with airport operations toward an aircraft engaged in an initial straight climb following takeoff or toward an aircraft engaged in a straight final approach toward a landing at an airport, other than an FAA-approved navigational signal light, visual approach slope indicator, or FAA-approved obstruction lighting;
 - Any use which would cause sunlight to be reflected towards an aircraft engaged in an initial straight climb following takeoff or towards an aircraft engaged in a straight final approach towards a landing at an airport;
 - Any use which would attract large concentrations of birds, or which may otherwise affect safe air navigation within the area;
 - Any use which would generate electrical interference that may be detrimental to the operation of aircraft and/or aircraft instrumentation; or
 - Children's schools, day care centers, libraries, hospitals, skilled nursing and care facilities, congregate care facilities, places of assembly, noise sensitive outdoor nonresidential uses and hazards to flight.
- The following deed notice and disclosure text will be provided to all potential purchasers of the Project site property and tenants of the buildings:

NOTICE OF AIRPORT IN VICINITY. This property is presently located in the vicinity of an airport, within what is known as an airport influence area. For that reason, the property may be subject to some of the annoyances or inconveniences associated with proximity to airport operations (for example: noise, vibration, or odors). Individual sensitivities to those annoyances can vary from person to person. You may wish to consider what airport annoyances, if any, are associated with the property before you complete your purchase

and determine whether they are acceptable to you. Business & Professions Code Section 11010(b)(13)A).

- Any outdoor lighting that is installed will be hooded or shielded so as to prevent either the spillage of lumens or reflection into the sky. All outdoor lighting will be downward facing:
- The applicant does not propose any uses prohibited or discouraged in Compatibility Zones C1.

5.8.4 Thresholds of Significance

The City's has not established local CEQA significance thresholds as described in Section 15064.7 of the State CEQA Guidelines. The City generally utilizes the CEQA significance thresholds in Appendix G ("Environmental Checklist") of the State CEQA Guidelines. The following threshold was determined to be less than significant and therefore scoped out from further analysis in this EIR: Would the project impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?

The Environmental Checklist prepared by the City of the Project (see Appendix A of this document) indicates that impacts related to the Sycamore Hills Distribution Center Project may be considered potentially significant if the proposed Project would:

- (Threshold A) create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials,
- (Threshold 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,
- (Threshold C) emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school,
- (Threshold D) be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment,
- (Threshold E) for a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area,
- (Threshold F) expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires.

5.8.5 Environmental Impacts

Threshold A: *Would the Project create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?*

Construction of the Project may involve the limited transport of fuels, lubricants, and various other liquids for operation of construction equipment. Deliveries to the Project site would likely come from the Ports of Long Beach and Los Angeles as well as other locations. Overall construction is anticipated to last approximately 15 months, so any hazardous materials used in construction would not be onsite for more than approximately 15 months. The construction contractor would be required to dispose of construction waste in accordance with all federal, state and local regulations. Due to the limited quantities used in construction and the limited timing or nature of construction, use of hazardous materials including fuels, lubricants, paint products and solvents during construction is not anticipated to create a significant hazard to the public or the environment through transport, use, or disposal of these materials.

There is potential that commonly used hazardous materials such as petroleum products, pesticides, fertilizer, and other household hazardous products such as paint products, solvents, and cleaning products may be stored, used, and transported in conjunction with the proposed warehouse uses. As outlined in the Project Description (Section 3.0), the Project proposes warehouse uses that are anticipated to be for short-term storage and/or consolidation of end products or goods, and to a lesser extent, raw materials. These goods are usually stored on pallet loads or larger handling products in the warehouses prior to their distribution to retail locations or other warehouses. Warehouse uses are not anticipated to store, use, or transport any commonly used hazardous materials in large quantities in which an accidental spill could not be quickly and efficiently cleaned up and therefore could be a hazard to the public or environment.

The proposed use of the Project's warehouses is not for manufacturing. Manufacturing uses could include the manufacturing of chemical products that due to either the nature of the chemical or in large quantities could be hazardous if accidentally spilled or released. A manufacturing use of the site, if the manufacturing was of chemical products, could increase the risk of potential hazards to the public or the environment due to the increased volumes on site, as compared to warehouse uses with minimal. As manufacturing uses are permitted under the provisions of the Zoning Code and Specific Plan, implementation of **Mitigation Measure MM AIR-1** would not allow this use and reduce the higher risk of hazardous materials associated with a manufacturing use. Mitigation Measure **MM AIR-1** states the project applicant is required to record a covenant on the property (Parcels 1 and 2) that prohibits manufacturing use and that proof of the record of covenant shall be submitted to the City of Riverside Planning Department prior to issuance of Building Permits.

Exposure of persons to hazardous materials could occur in the following manners: improper handling or use of hazardous materials or hazardous wastes during warehouse operations, particularly by untrained personnel; transportation accident; environmentally unsound disposal methods; or fire, explosion or other emergencies. The types and amounts of hazardous materials would vary according to the nature of the activity. In some cases, it is the type of hazardous material that is potentially hazardous; in others, it is the amount of hazardous material that could present a hazard.

Whether a person exposed to a hazardous substance would suffer adverse effects depends upon a complex interaction of factors that determine the effects of exposure to hazardous materials: the exposure pathway (the route by which a hazardous material enters the body); the amount of

material to which the person is exposed; the physical form (e.g., liquid, vapor) and characteristics (e.g., toxicity) of the material; the frequency and duration of exposure; and the individual's unique biological characteristics such as age, gender, weight, and general health.

Although the overall quantity of hazardous materials present and in use in the Project area may increase as a result of implementation of the proposed Project, all new development that will handle or use hazardous materials would be required to comply with the regulations, standards, and guidelines established by USEPA, the State, County and the City, related to storage, use, and disposal of hazardous materials.

Both the Federal and State governments require all businesses that handle more than a specified amount of hazardous materials to submit a hazardous material business plan (HMBP) for business operations to a regulating agency. HMBPs are designed to be used by responding agencies for a quick and accurate evaluation of each situation for an appropriate response and would include an inventory of the hazardous materials used in the facility as well as emergency response plans and procedures to be used in the event of a significant or threatened significant release of a hazardous material.

Specifically, the state requires an owner or operator of a facility to complete and submit a HMBP if the facility handles a hazardous material or mixture containing a hazardous material that has a quantity at any one time during the reporting year equal or greater than:

- 55 gallons, 500 pounds, or 200 cubic feet at standard temperature and pressure for a compressed gas;
- The applicable Federal threshold planning quantity (TPQ) for an extremely hazardous substance (EHS) listed in Appendix A, Part 355, Title 40, of the Code of Federal Regulations; or
- Amounts of radioactive materials requiring an emergency plan pursuant to Parts 30, 40, or 70 of Chapter 1 of Title 10 of the Code of Federal Regulations.

The Federal government requires owners and operators of a facility to complete and submit an emergency and hazardous chemical inventory form annually, known as the Tier II form, if the facility handles at a minimum or greater:

- 500 pounds (or 227 kilograms – approximately 55 gallons) or applicable Federal threshold quantities for extremely hazardous substances listed in 40 CFR Part 355, Appendix A and B and hazardous chemicals, whichever is lower;
- 10,000 pounds of a hazardous chemical that is not an extremely hazardous substance;
- 75,000 gallons of gasoline; or
- 100,000 gallons of diesel.

Any new business that meets the specified criteria would be required to submit a full hazardous materials disclosure report that would include an inventory of the hazardous materials generated, used, stored, handled, or emitted and emergency response plans and procedures to be used in

the event of a significant or threatened significant release of a hazardous material. The plan would need to identify the procedures to follow for immediate notification to all appropriate agencies and personnel in the event of a release, identification of local emergency medical assistance appropriate for potential accident scenarios, contact information for all company emergency coordinators of the business, a listing and location of emergency equipment at the business, an evacuation plan, and a training program for business personnel.

as a result of oversight by the appropriate Federal, State, and local agencies, and compliance with applicable regulations related to the handling and storage of hazardous materials by the proposed warehouses, the risk of the public's potential exposure to hazardous substances are **less than significant with mitigation**. In order to ensure that manufacturing uses are not permitted, because they have not been analyzed, **Mitigation Measure MM AIR-1** is required.

Threshold B: *Would the Project create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?*

The transportation of hazardous materials can result in accidental spills, leaks, toxic releases, fire, or explosion. It is possible that licensed vendors could bring some hazardous materials to and from the site as a result of the proposed Project. However, appropriate documentation for all hazardous waste that is transported in connection with specific Project-site activities would be provided in compliance with existing hazardous materials regulations codified in Titles 8, 22, and 26 of the CCR, and their enabling legislation set forth in Chapter 6.95 of the CHSC. In addition, future users would be required to comply with all applicable Federal, State, and local laws and regulations pertaining to the transport, use, disposal, handling, and storage of hazardous waste, including but not limited to the USDOT Office of Hazardous Materials Safety Title 49 of the CFR, and implemented by Title 13 of the CCR which prescribes strict regulations for the safe transportation of hazardous materials. Compliance with the applicable Federal and State laws related to the transportation of hazardous materials would reduce the likelihood and severity of accidents during transit; therefore, impacts would be less than significant.

Hazardous materials are required to be stored in designated areas designed to prevent accidental release to the environment. The CFC requirements prescribe safe accommodations for materials that present a moderate explosion hazard, high fire or physical hazard, or health hazards. Compliance with all applicable Federal and State laws related to the storage of hazardous materials would maximize containment and provide for prompt and effective clean-up if an accidental release occurs.

The Project's ESA found no potential hazardous substances or industrial hazardous waste impacts, nor was there any evidence that hazardous substances or petroleum products above *de minimus* quantities existed on the Project site. Further, the EDR report findings of LUSTs within the vicinity of the Project site found no indication of problems or violations at eight of the 14 sites, while the remaining six sites were listed as "Completed – Case Closed" indicating satisfactory cleanup of the spill. Regardless, these sites are not within the Project's property and none of the

reports found by the EDR or Geotracker searches raise an environmental concern for the Project site.

Thus, because future use will be subject to Federal, State, and local regulations, potential impacts related to the creation of a significant hazard to the public or the environment through reasonably foreseeable upset and accidental conditions involving the release of hazardous materials into the environment are **less than significant**.

Threshold C: *Would the Project emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?*

The Project site is not located within a quarter-mile of an existing or proposed school site. The schools nearest the Project site are: 1) Taft Elementary School, located at 959 Mission Grove Parkway North in the City of Riverside (approximately 1.2 miles northwest of the Project site); and 2) John F. Kennedy Elementary School, located at, 19125 Schoolhouse Lane, in the City of Riverside (approximately 1.9 miles southwest of the Project site). As both schools are located over one-quarter mile away from the Project site, potential impacts would be **less than significant**.

Threshold D: *Would the Project be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would create a significant hazard to the public or the environment?*

The Project site is not included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 (CalEPA 2020). Further, as discussed above, the EDR report findings of LUSTs within the vicinity of, but not within, the Project site found no indication of problems or violations at eight of the 14 sites, while the remaining six sites were listed as “Completed – Case Closed” indicating satisfactory cleanup of the spill. None of the reports found by the EDR or Geotracker searches raise an environmental concern for the Project site. Potential impacts would be **less than significant**.

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

Site Consistency

The Project site is located within the MARB/IPA LUCP. Consistency is determined by each criterion of the applicable compatibility zone. The Project site is located within Zone C1 of the LUCP, as reflected on Figure 5.8-4. The MARB/IPA LUCP identifies prohibited and discouraged uses within each land use compatibility zone as well as density/intensity standards, and open land requirements as reflected in Table 5.8-2 – LUCP Compatibility Criteria for Zone C1.

The Project will consist of light industrial activities, which are uses permitted within Zone C1. Zone C1 discourages above ground storage of more than 6,000 gallons of hazardous or flammable materials per tank. However, no above ground storage tanks are proposed as part of the Project.

Building Height

Zone C1 requires airspace review for structures over 70 feet in height (MARB/IPA LUCP, p. 10). FAR Part 77 establishes standards for determining obstructions to navigable airspace and the effects of such obstructions on the safe and efficient use of that airspace. Objects exceeding FAR Part 77 height limits require an FAA obstruction evaluation review. According to the MARB/IPA LUCP, objects over 70 feet tall within Zone C1 require airspace review in accordance with FAR Part 77. Both Building A and Building B would have maximum building heights of 45 feet, including parapets. Thus, the proposed buildings would not exceed the FAR Part 77 height limits of structures over 70 feet in height. In addition, the FAA staff has reviewed project information under the provisions of Title 14 of the Code of Federal Regulations, part 77 for Buildings A and B and issued determinations of *No Hazard to Air Navigation* based on the following building heights: Building A, with 1596 feet site elevation (SE), 45 feet above ground level (AGL) and 1641 feet above mean sea level (AMSL); and Building B, with 1609 feet SE, 45 feet AGL, and 1654 AMSL. Thus, potential impacts would be **less than significant**.

Building Occupancy

Building A and Building B will be subject to the intensity requirements of Zone C1 of ALUC Per Person Average Acre Maximum Occupancy of 100 and ALUC Per Person Single Acre Maximum Occupancy of 250 for warehouse use. Occupancy calculations for the proposed Project utilized Appendix C¹, *Methods for Determining Concentrations of People*, of the *Riverside County Airport Land Use Compatibility Plan Policy Document*, Table C1-Occupancy Levels, *California Building Code, adopted December 2004*, and are shown in Table 5.8-3 below. As shown on Table 5.8-3 – Proposed Project ALUC Occupancy Level Calculations, the maximum occupancy requirements of the C1 Zone will not be exceeded.

¹<http://www.rcaluc.org/Portals/13/PDFGeneral/plan/newplan/23-%20Appendix%20C.%20Determining%20Concentrations%20of%20People.pdf>

Table 5.8-3 – Proposed Project ALUC Occupancy Level Calculations

Building	ALUC Calculation for C1 Zone	ALUC Maximum Occupancy	Minimum Square Feet (SF) per Occupant ² Calculation	Proposed Project Persons
Building A	Per Person Average Acre	100 persons	Office SF: 10,000/100 = 100 people Warehouse SF: 390,000/500 = 780 people 880 total people/ 24.31 acres = 36	36
Building A	Per Single Acre	250 persons	(210 x 210) SF/ 200 = 221 people	221
Building A	Per Person Single Acre Parking Ratio	100 persons	388 auto stalls x 1.5 persons per stall = 935 persons / 34.63 acres = 24.31	24
Building B	Per Person Average Acre	100 persons	Office SF: 10,000/100 = 100 people Warehouse SF: 193,100/ 500 = 386 people 486 total people / 10.32 acres = 47	47
Building B	Per Single Acre	250 persons	(210 x 210) SF/ 200 = 221 people	221
Building B	Per Person Single Acre Parking Ratio	100 persons	235 auto stalls x 1.5 persons per stall = 353 persons / 10.32 acres = 34.21	34

Noise

Each airport has also established Community Noise Equivalent Level (CNEL) contours that reflect noise exposure in decibels (dB) to the surrounding area created by aircraft activity. MARB/IPA has three noise contours, which are 65 dB CNEL, 60 dB CNEL, and 55 dB CNEL, with 65 dB CNEL representing the highest noise exposure contour which is found closer to the airport runway. The MARB/IPA LUCP identifies compatibility criteria for noise as identified in Table 5.8-4 – MARB/IPA Compatibility Zone Factors for Zone C1 below.

Table 5.8-4 – MARB/IPA Compatibility Zone Factors for Zone C1

Zone	Location	Noise and Overflight Factors	Safety and Airspace Protection Factors
C1	Primary Approach / Departure Zone	Noise Impact: Moderate to High <ul style="list-style-type: none"> • Within or near 60-CNEL contour • Single-event noise may be disruptive to noise-sensitive land use activities; aircraft <2,000 feet above runway elevation on arrival and generally <3,000 feet above runway elevation on departure 	<i>Risk Level: Moderate</i> <ul style="list-style-type: none"> • Beneath or adjacent to low altitude overflight corridors

Building A and Building B are located within Zone C1, which is within or near the 60-CNEL contour. The Project is located within an airport land use plan and partially within the Community Noise Equivalent Level (CNEL) contour designation of 60 CNEL airport noise contour area of the March Air Reserve Base (ARB). The maximum threshold for the proposed industrial warehouse use is 70 dBA. Because the noise contour level for the Project site is found to be a normally acceptable level for the proposed use of the Noise Element of the General Plan 2025, impacts related to exposure of people working in an airport land use plan area to excessive noise is considered **less than significant**.

Plan Consistency

In general, a review from ALUC is required when a major project is located within the boundaries of an Airport Influence Area and the local jurisdiction's General Plan has not yet been found consistent with the appropriate Airport Land Use Compatibility Plan, or when a local jurisdiction processes a legislative action such as a General Plan Amendment, Specific Plan Amendment, or Zone Change . Since the Project is consistent with ALUC and the GP 2025, and the project does not require a General Plan Amendment, Specific Plan Amendment, or Zone Change , the Project does not require ALUC review. In response to receipt of the Notice of Preparation for this Project, ALUC staff indicated that ALUC review was not required. Therefore, potential impacts would be **less than significant**.

Threshold F: *Would the Project expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?*

As discussed, the Project site is not within a VHFHSZ although it is partially located within a *Hills and Canyons* area. Nonetheless, the Project would be required to comply with applicable CFC, GP 2025, and City Guideline requirements such as fire breaks, sprinklers, walls, emergency access roads, etc. The Project site will be landscaped with fire-resistant landscape, drought-tolerant and climate appropriate trees, shrubs, and ground cover that will meet or exceed the City's requirements. Additionally, the Project site is within approximately 2.5 miles of two fire stations, Fire Station 9 – Canyon Crest (6674 Alessandro Boulevard) and Fire Station 13 – Box Spring Station (6490 Sycamore Canyon Boulevard), which would provide adequate response times to the Project site.

Although the Project is allowing more accessibility to areas with the potential for fire risk/hazard, the Project will include necessary and adequate fire access for RFD to access the site and adjacent Sycamore Canyon Wilderness Park and for occupants (workers/employees) to leave the site in case of a fire. With the proposed development of Parcel 1 and associated fire lane and gate access along the parcel's eastern side, it would provide improved access for the Fire Department from Alessandro Boulevard to Sycamore Canyon Wilderness Park.

Additionally, the Project would comply with all CBC and CFC fire safety codes and regulations to further minimize the potential risk for a wildfire. The SCWP SKRMP also identifies appropriate edge treatments between the wilderness park and the Project site. Fencing and walls around the Project site have been designed to be compliant with requirements in the SCWP SKRMP. With

adherence to RFD practices, Project design considerations, and the Project compliance existing codes and policies, impacts involving wildland fires **would be less than significant**.

5.8.6 Proposed Mitigation Measures

MM AIR-1: The project applicant is required to record a covenant on the property (Parcels 1 and 2) that prohibit manufacturing. Proof of the record of covenant shall be submitted to the City of Riverside Planning Department prior to issuance of Building Permits.

5.8.7 Cumulative Environmental Effects

Hazardous Materials

The geographic context for cumulative impacts relative to the use of hazardous materials is considered to be the city limits and the surrounding areas, in the City of Moreno Valley and the County of Riverside, in which listed cumulative development projects are located. The Project, along with the cumulative development projects, may routinely transport, use, store, or dispose of hazardous materials and universal wastes. However, even though at this time no specific or known end user has been identified for the Project, Riverside Municipal Code, Chapter 9.48 requires businesses to disclose storage and handling of hazardous materials and hazardous waste, to establish and implement emergency response plans, and to cooperate in periodic reporting and inspections. Although the overall quantity of hazardous materials and waste generated in the City and the areas in which cumulative projects are located may increase as a result of implementation of the Project in combination with the cumulative development projects, all new development that will handle or use hazardous materials and all existing development that handles or uses hazardous materials are required to comply with the regulations, standards, and guidelines established by the EPA, the State of California, County of Riverside, and the City of Riverside related to storage, use, and disposal of hazardous materials.

Because the Project is in compliance with federal, State, and local regulations, standards, and guidelines, the Project would have less than significant impacts related to hazardous material, it would not contribute to cumulatively considerable impacts. With respect to the cumulative development projects (See Table 4.0-1 Summary of Cumulative Projects and Figure 4.0-1 Cumulative Development Location Map), each of these projects will be required to evaluate its own project-specific potential impacts and will also be required to comply with all applicable Federal, State, and local regulations governing the use, handling, storage and transport of hazardous materials and other hazards. Since hazardous materials and risk of upset conditions are largely site-specific, this would occur for each individual project affected, in conjunction with development proposals on these properties, and develop project specific mitigation measures to reduce potential impacts to less than significant levels, and as such would not contribute to cumulatively considerable impacts either. In light of the existing regulatory framework governing the storage and use of hazardous materials and waste, the Project's cumulative impact related to hazard and hazardous materials **is less than significant**, and the Project's contribution is not

considered cumulatively considerable. Therefore, cumulative impacts with regard to hazardous materials are **less than significant**.

Airport Land Use Compatibility

Cumulative development projects that do not meet all criteria set forth in the LUCP would be anticipated to contribute to a cumulative aviation hazard impact, and cumulative development projects within the Compatibility Zones, that do not meet all criteria set forth in the LUCP are subject to review by the Riverside County ALUC. ALUC may, as part of its review, impose height, use and lighting restrictions on development to reduce the potential impacts associated with aviation use the MARB/IPA from individual development projects to less than significant levels. Other cumulative projects (as listed in Table 4.0-1 and shown on Figure 4.0-1) proposed within the MARB/IPA LUCP would meet all criteria set forth in the LUCP, and if not, would be independently reviewed by ALUC and additional project design features or mitigation to ensure compliance with MARB/IPA LUCP policies would be imposed.

Because the Project is consistent with the MARB/IPA LUCP and would implement and additional safety design features to reduce project specific impacts to less than significant levels, implementation of the proposed Project would not contribute to cumulatively considerable impacts associated with operations at MARB and would not result in a safety hazard to people meeting or working in the Project area. The other cumulative projects would either meet the criteria set forth in the LUCP or be required to implement design features or mitigation measures for compliance with LUCP policies, and therefore, would not be anticipated to contribute to cumulatively considerable impacts either. For these reasons, the Project's contribution is not considered cumulatively considerable and cumulative impacts with regard to a safety hazard associated with an airport would be **less than significant**.

Wildfire

The Project site is not within a VHFHSZ, although it is partially located within a *Hills and Canyons* area. With compliance with applicable CBC and CFC standards and General Plan policies, implementation of the Project, combined with other development in the City and County, would not result in increased exposure to wildfire risks. Furthermore, cumulative projects would not result in permanent road closures, nor impede an established emergency or evacuation access route, or interfere with emergency response requirements, such as fire protection response time standards established by GP 2025. The Project is surrounded by mostly urban development and served by existing infrastructure. It would not contribute incrementally with other projects in the Cities of Riverside and Moreno Valley and Riverside County to create an environment that could exacerbate wildfire risks. Cumulative wildfire hazard impacts would be **less than significant**. (Additional analysis is provided in Section 5.15 Wildfire).

5.8.8 References

The following references were used in the preparation of this section of the DEIR:

ESA	EARSI, <i>Phase I Environmental Site Assessment (Updated Site Inspection)</i> , October 2018, June 2020.
GP 2025	City of Riverside, General Plan 2025, certified November 2007 with subsequent amendments to various elements. (Available at http://www.riversideca.gov/planning/gp2025program/general-plan.asp , accessed January 2020)
GP 2025 FPEIR	City of Riverside, General Plan 2025 Program Environmental Impact Report (SCH# 2004021108), certified November 2007. (Available at http://www.riversideca.gov/planning/gp2025program/ , accessed January 2020)
MARB/IPA DEIR	Riverside County Airport Land Use Commission, March Air Reserve Base / Inland Port Airport Land Use Compatibility Plan, adopted November 13, 2014. (Available at http://www.rcaluc.org/Portals/13/PDFGeneral/plan/2014/Draft%20EIR%20for%20March%20ALUCP.pdf , accessed February 2021)
MARB/IPA LUCP	Riverside County Airport Land Use Commission, March Air Reserve Base / Inland Port Airport Land Use Compatibility Plan, adopted November 13, 2014. (Available at http://www.rcaluc.org/Portals/13/PDFGeneral/plan/2014/17%20-%20Vol.%201%20March%20Air%20Reserve%20Base%20Final.pdf , accessed February 2021)
RFD PD	City of Riverside Fire Department, Emergency Management Disaster Preparedness, Web site. (Available at http://www.riversideca.gov/fire/disasterpreparedness.asp , accessed January 2020)

5.9 Hydrology and Water Quality

Based on Appendix G of the *State CEQA Guidelines*, the analysis in the Initial Study (IS/NOP) prepared for this Project (Appendix A), and comments received during the NOP public comment period, this section evaluates the Project's potential impacts related to hydrology and water quality.

The following discussion is based on the *Project Specific Water Quality Management Plan* (WQMP, Appendix J) prepared by REC Consultants, Inc. in July 2019 and updated in March 2020, the *Jurisdictional Delineation Report* prepared by Wood December 2020 (Appendix D), and the *Geotechnical Engineering Investigation* prepared by NorCal Engineering dated March 2019 and updated in September 2020 (Appendix G).

5.9.1 Setting

The following discussion describes the proximity of the Project to nearby waterbodies, provides background information on water quality issues related to surface and groundwater in the Project area, describes the existing drainage condition, floodplains, and dam inundation areas in order to evaluate potential Project-related impacts.

Surface Water Resources and Existing Drainage Condition

California is divided into nine major watersheds and a Regional Water Quality Control Board (RWQCB) regulates water quality for each watershed. The Project site is located within the Santa Ana River Watershed Region (Region 8), which is under the jurisdiction of the Santa Ana Regional Water Quality Control Board. The Santa Ana River flows from the San Bernardino Mountains to the Pacific Ocean for over 100 miles. The Santa Ana River is the "receiving water" for more than 2,700 square miles covering portions of San Bernardino, Riverside, and Orange counties (GP 2025 FPEIR, p. 5.8-4). The Santa Ana River Watershed is broken up into six reaches for management purposes, in which the Project is within Reach 3. The Project site is located approximately 5 miles southeast of the Santa Ana River which is the main drainage feature in this watershed (Figure 5.9-1 – Santa Ana River Watershed).

The average rainfall for the area is 9.86 inches per year (Western Regional Climate Center 2013). Weather data was recorded approximately 3.5 miles northwest of the Project site. After exiting the site, the on-site drainages flow north for one-half mile before converging with Sycamore Canyon Creek. Sycamore Canyon Creek flows for 2.5 miles northwest before converging with Tequesquito Arroyo. The Tequesquito Arroyo flows for 6.9 miles before reaching the Santa Ana River. The Santa Ana River flows southwest for 16 miles before reaching Prado Basin. As shown in Figure 5.9-2 – Project Connectivity to Santa Ana River, the Santa Ana River continues for 30 miles before reaching the Pacific Ocean.

As discussed in Section 5.3 Biological Resources, the Project site contains two drainages, Drainage A and Drainage B as identified in the Jurisdictional Delineation (Appendix D) and in Figure 5.3-5 Drainages Map. Drainage A enters the Project site along the western boundary and flows for approximately 1,183 feet before exiting the site near the middle of the northern boundary. Drainage A consists of a total of 0.08 acres of Non-Wetland "waters of the U.S." (WUS) and

“waters of the State” (WoS), and 0.35 acres under California Department of Fish and Wildlife (CDFW) jurisdiction (Wood). Additionally, Drainage B enters the study area near the middle of the southern boundary and flows in a northern direction for approximately 981 feet before exiting the site near the middle of the northern boundary. Drainage B consists of a total of 0.11 acres of Non-Wetland WUS and WoS, and 1.36 acres under CDFW jurisdiction (Wood). Drainages A and B converge just north of the Project’s northern boundary within the Sycamore Canyon Wilderness Park.

The existing hydrology of the Project site is shaped by the existing topography of the site as well as the size of tributary area (areas that are at a higher elevation or upland to and drain to the site) and how stormwater runoff is conveyed from the tributary area to the site (i.e. via sheet flow or in stormwater drainage pipes or channels). As outlined in the Hydrology Memo (REC (b)), the existing Project site is comprised of five (5) drainage management areas (DMAs), which each drain to their respective points of discharge (POD). The existing DMAs are described as follows and shown in Figures 5.9-3A and 5.9-3B – Existing Condition Hydrology Maps:

- Runoff from DMA-1 overland flows to POD-1.
- Runoff from DMA-2 flows to POD-2. Note that POD-2 receives off-site run-on from the area west of Barton Street and the northwest corner of the storage facility to the south of the Project site and also via concentrated flow from concentration point 2-1, which collects the runoff of an undetermined area west of Barton Street and discharges such runoff to the Project site through a 48-inch storm drain pipe.
- Runoff from DMA-3 flows to POD-3. Note that POD-3 receives offsite run-on, via storm drain, from the residential/commercial developments to the south of Alessandro Boulevard and the surface flow run-on from the adjacent abandoned developed lot.
- Runoff from DMA-4 flows to POD-4. Note that POD-4 receives offsite run-on from the area east of the property boundary, mainly as sheet flow.
- Runoff from DMA-5 flows to POD-5. Note that POD-5 receives off-site run-on, via multiple storm drains, from residential areas south of Alessandro Boulevard and from Alessandro Boulevard itself.

