

IV. Environmental Impact Analysis

B. Air Quality

1. Introduction

This section evaluates the Project’s potential impacts on air quality. This section estimates the air pollutant emissions generated by construction and operation of the Project and evaluates whether Project emissions would conflict with or obstruct implementation of the applicable air quality plan; result in a cumulatively considerable net increase of any criteria pollutant for which the region is in non-attainment under an applicable federal or state ambient air quality standard; expose sensitive receptors to substantial pollutant concentrations; or result in other emissions, such as those leading to odors, affecting a substantial number of people. This section relies on information included in Appendix C, Beatrice Street Project Air Quality and Greenhouse Gas Appendix, of this Draft EIR.

2. Environmental Setting

a. Air Quality Background

(1) Air Quality and Public Health

Certain air pollutants have been recognized to cause notable health problems and consequential damage to the environment either directly or in reaction with other pollutants, due to their presence in elevated concentrations in the atmosphere. Such pollutants have been identified and regulated as part of an overall endeavor to prevent further deterioration and to facilitate improvement in air quality. The National Ambient Air Quality Standards (NAAQS) and California Ambient Air Quality Standards (CAAQS) have been set at levels considered safe to protect public health, including the health of sensitive populations such as asthmatics, children, and the elderly with a margin of safety, and to protect public welfare, including protection against decreased visibility and damage to animals, crops, vegetation, and buildings.¹ As the scientific methods for the study of air pollution health effects have progressed over the past decades, adverse effects have been shown to occur at lower levels of exposure. For some pollutants, no clear thresholds for effects have been

¹ *United States Environmental Protection Agency, NAAQS Table, www.epa.gov/criteria-air-pollutants/naaqs-table, accessed October 3, 2023.*

demonstrated. New findings over time have, in turn, led to the revision and lowering of NAAQS which, in the judgment of the U.S. Environmental Protection Agency (USEPA), are necessary to protect public health. Ongoing assessments of the scientific evidence from health studies continue to be an important part of setting and informing revisions to federal and state air quality standards.² The national and state criteria pollutants and the applicable ambient air quality standards are listed in Table IV.B-1 on page IV.B-3.

At the regional level, the South Coast Air Quality Management District (SCAQMD) is the regulatory agency responsible for improving air quality for large areas of Los Angeles, Orange County, Riverside, and San Bernardino Counties, including the Coachella Valley.³ The City of Los Angeles is located within the South Coast Air Basin (Air Basin), which is a distinct geographic subarea within the SCAQMD's jurisdiction. The SCAQMD, together with the Southern California Association of Governments (SCAG), has the responsibility for ensuring that national and state ambient air quality standards are achieved and maintained for the Air Basin. Failure to comply with these standards puts state and local agencies at risk for penalties in the form of lawsuits, fines, a federal takeover of state implementation plans, and a loss of funds from federal agencies, such as the Federal Highway Administration and Federal Transit Administration.

To meet the air quality standards, regional plans are developed, including the SCAQMD's Air Quality Management Plan (AQMP), which incorporates regional demographic projections and integrated regional land use and transportation strategies from SCAG's Regional Transportation Plan/Sustainable Communities Strategy (RTP/SCS). These plans work together to examine multiple pollutants, cumulative effects, and transport issues related to attaining healthful air quality in the region. In addition, a host of regulatory standards at the federal, state, regional, and local level function to identify and limit exposure of air pollutants and toxic air contaminants (TACs).

(2) Local Air Quality and Air Pollution Sources

As mentioned above, the City of Los Angeles is located within the South Coast Air Basin, which is an approximately 6,745-square-mile area bounded by the Pacific Ocean to the west; the San Gabriel, San Bernardino, and San Jacinto Mountains to the north and east; and San Diego County to the south. The Air Basin includes all of Orange County and the non-desert portions of Los Angeles, Riverside, and San Bernardino Counties, in addition to the Coachella Valley area in Riverside County. The regional climate within the Air Basin is considered semi-arid and is characterized by warm summers, mild winters,

² SCAQMD, *Final 2016 AQMP, 2017, Appendix I, Health Effects, p I-69.*

³ SCAQMD, *Map of Jurisdiction, 1999.*

**Table IV.B-1
Ambient Air Quality Standards**

Pollutant	Averaging Period	California Standard ^a	Federal Standard ^a	SCAQMD Attainment Status ^b	
				California Standard ^c	Federal Standard ^c
Ozone (O ₃)	1 hour	0.09 ppm (180 µg/m ³)	—	Non-Attainment	—
	8 hour	0.07 ppm (137 µg/m ³)	0.070 ppm (137 µg/m ³)	Non-Attainment	Non-Attainment (Extreme)
Respirable Particulate Matter (PM ₁₀)	24 hour	50 µg/m ³	150 µg/m ³	Non-Attainment	Attainment
	Annual	20 µg/m ³	—		
Fine Particulate Matter (PM _{2.5})	24 hour	—	35 µg/m ³	Non-Attainment	Non-Attainment (Serious)
	Annual	12 µg/m ³	12 µg/m ³		
Carbon Monoxide (CO)	1 hour	20 ppm (23 mg/m ³)	35 ppm (40 mg/m ³)	Attainment	Attainment
	8 hour	9.0 ppm (10 mg/m ³)	9 ppm (10 mg/m ³)		
Nitrogen Dioxide (NO ₂)	1 hour	0.18 ppm (339 µg/m ³)	0.10 ppm (188 µg/m ³)	Attainment	Unclassified/ Attainment
	Annual	0.030 ppm (57 µg/m ³)	0.053 ppm (100 µg/m ³)		
Sulfur Dioxide (SO ₂)	1 hour	0.25 ppm (655 µg/m ³)	0.075 ppm (196 µg/m ³)	Attainment	Unclassified/ Attainment
	3 hour	—	0.5 ppm (1,300 µg/m ³)		
	24 hour	0.04 ppm (105 µg/m ³)	0.14 ppm (365 µg/m ³)		
	Annual	—	0.03 ppm (80 µg/m ³)		
Lead (Pb)	30-day average	1.5 µg/m ³	—	Attainment	Partial Non- Attainment ^d
	Rolling 3-month average	—	0.15 µg/m ³		
Sulfates	24 hour	25 µg/m ³	—	Attainment	—
Hydrogen Sulfide (H ₂ S)	1 hour	0.03 ppm (42 µg/m ³)	—	Unclassified	—

ppm = parts per million by volume

µg/m³ = micrograms per cubic meter

^a *An ambient air quality standard is a concentration level expressed in either parts per million or micrograms per cubic meter and averaged over a specific time period (e.g., 1 hour). The different averaging times and concentrations are meant to protect against different exposure effects. Some ambient air quality standards are expressed as a concentration that is not to be exceeded. Others are*

Table IV.B-1 (Continued)
Ambient Air Quality Standards

Pollutant	Averaging Period	California Standard ^a	Federal Standard ^a	SCAQMD Attainment Status ^b	
				California Standard ^c	Federal Standard ^c
<p><i>expressed as a concentration that is not to be equaled or exceeded.</i></p> <p>^b “Attainment” means that the regulatory agency has determined based on established criteria, that the Air Basin meets the identified standard. “Non-attainment” means that the regulatory agency has determined that the Air Basin does not meet the standard. “Unclassified” means there is insufficient data to designate an area, or designations have yet to be made.</p> <p>^c California and Federal standard attainment status as provided in CARB, ww2.arb.ca.gov/resources/documents/maps-state-and-federal-area-designations.</p> <p>^d An attainment re-designation request is pending.</p> <p>Source: USEPA, NAAQS Table, www.epa.gov/criteria-air-pollutants/naaqs-table, accessed October 3, 2023; CARB, Ambient Air Quality Standards May 4, 2016.</p>					

infrequent seasonal rainfall, moderate daytime onshore breezes, and moderate humidity. The air quality within the Air Basin is primarily influenced by meteorology and a wide range of emissions sources, such as dense population centers, heavy vehicular traffic, and industry.

The Air Basin experiences a persistent temperature inversion (increasing temperature with increasing altitude) as a result of the Pacific high. This inversion limits the vertical dispersion of air contaminants, holding them relatively near the ground. As the sun warms the ground and the lower air layer, the temperature of the lower air layer approaches the temperature of the base of the inversion (upper) layer until the inversion layer finally breaks, allowing vertical mixing with the lower layer. This phenomenon is observed in mid to late afternoons on hot summer days. Winter inversions frequently break by midmorning.

The combination of stagnant wind conditions and low inversions produces the greatest pollutant concentrations. On days of no inversion or high wind speeds, ambient air pollutant concentrations are lowest. During periods of low inversions and low wind speeds, air pollutants generated in urbanized areas are transported predominantly onshore into Riverside and San Bernardino counties. In the winter, the greatest pollution problem is the accumulation of carbon monoxide (CO) and nitrogen oxides (NO_x) due to low inversions and air stagnation during the night and early morning hours. In the summer, the longer daylight hours and the brighter sunshine combine to cause a reaction between hydrocarbons and NO_x to form photochemical smog.

Air pollutant emissions within the Air Basin are generated primarily by stationary and mobile sources. Stationary sources can be divided into two major subcategories: point

and area sources. Point sources occur at a specific location and are often identified by an exhaust vent or stack. Examples include boilers or combustion equipment that produce electricity or generate heat. Area sources are widely distributed and include such sources as residential and commercial water heaters, painting operations, lawn mowers, agricultural fields, landfills, and some consumer products. Mobile sources refer to emissions from motor vehicles, including tailpipe and evaporative emissions, and are classified as either on-road or off-road. On-road sources may be legally operated on roadways and highways. Off-road sources include aircraft, ships, trains, and self-propelled construction equipment. Air pollutants can also be generated by the natural environment, such as when high winds suspend fine dust particles.

(3) Air Pollutant Types

(a) Criteria Pollutants

The six principal pollutants for which national and state criteria and standards have been promulgated, known as “criteria pollutants,” and which are most relevant to current air quality planning and regulation in the Air Basin include: ozone (O₃), respirable and fine particulate matter (PM₁₀ and PM_{2.5}, respectively), carbon monoxide (CO), nitrogen dioxide (NO₂), sulfur dioxide (SO₂), and lead (Pb). These pollutants are referred to as “criteria air pollutants” as a result of the specific standards, or criteria, which have been adopted for them.

(i) Ozone (O₃)

O₃ is a gas that is formed when VOCs and nitrogen oxides (NO_x)—both byproducts of internal combustion engine exhaust—undergo slow photochemical reactions in the presence of sunlight. O₃ concentrations are generally highest during the summer months when direct sunlight, light wind, and warm temperature conditions are favorable. An elevated level of O₃ irritates the lungs and breathing passages, causing coughing and pain in the chest and throat, thereby increasing susceptibility to respiratory infections and reducing the ability to exercise. Effects are more severe in people with asthma and other respiratory ailments. Long-term exposure may lead to scarring of lung tissue and may lower lung efficiency.

(ii) Particulate Matter (PM₁₀ and PM_{2.5})

Particulate matter pollution consists of very small liquid and solid particles floating in the air, which can include smoke, soot, dust, salts, acids, and metals. Particulate matter can form when gases emitted from industries and motor vehicles undergo chemical reactions in the atmosphere. Respirable and fine particulate matter, PM₁₀ and PM_{2.5}, consist of extremely small, suspended particles or droplets 10 microns and 2.5 microns or smaller in diameter, respectively. Some sources of particulate matter, like pollen and

windstorms, are naturally occurring. However, in urban areas, such as the City of Los Angeles, most particulate matter is caused by road dust, diesel soot, combustion products, abrasion of tires and brakes, and construction activities. The human body naturally prevents the entry of larger particles into the body. However, small particles can enter the body and become trapped in the nose, throat, and upper respiratory tract. These small particulates can potentially aggravate existing heart and lung diseases, change the body's defenses against inhaled materials, and damage lung tissue. The elderly, children, and those with chronic lung or heart disease are most sensitive to PM₁₀ and PM_{2.5}. Lung impairment can persist for two to three weeks after exposure to high levels of particulate matter. Some types of particulates can become toxic after inhalation due to the presence of certain chemicals and their reaction with internal body fluids.

(iii) Carbon Monoxide (CO)

CO is a colorless, odorless gas primarily emitted from combustion processes and motor vehicles due to incomplete combustion of carbon-containing fuels, such as gasoline or wood. In urban areas, such as the City of Los Angeles, automobile exhaust accounts for the majority of CO emissions. CO concentrations tend to be the highest during the winter morning, when little to no wind and surface-based inversions trap the pollutant at ground levels. Because CO is emitted directly from internal combustion engines, unlike O₃, motor vehicles operating at slow speeds are the primary source of CO in the Air Basin. The highest ambient CO concentrations are generally found near congested transportation corridors and intersections. Elevated concentrations of CO weaken the heart's contractions and lower the amount of oxygen carried by the blood. It is especially dangerous for people with chronic heart disease. Inhalation of CO can cause nausea, dizziness, and headaches at moderate concentrations and can be fatal at high concentrations.

(iv) Nitrogen Dioxide (NO₂)

Nitrogen dioxide is a nitrogen oxide compound that is produced by the combustion of fossil fuels, such as in internal combustion engines (both gasoline and diesel powered), as well as point sources, especially power plants. Of the seven types of NO_x compounds, NO₂ is the most abundant in the atmosphere. As ambient concentrations of NO₂ are related to traffic density, commuters in heavy traffic areas, particularly in urban areas, such as the City of Los Angeles, may be exposed to higher concentrations of NO₂ than those indicated by regional monitors. NO₂ absorbs blue light and results in a brownish-red cast to the atmosphere and reduced visibility. NO₂ also contributes to the formation of PM₁₀. Nitrogen oxides irritate the nose and throat, and increase one's susceptibility to respiratory infections, especially in people with asthma. The principal concern of NO_x is as a precursor to the formation of O₃.

(v) Sulfur Dioxide (SO₂)

Sulfur oxides (SOX) are compounds of sulfur and oxygen molecules. SO₂ is the predominant form found in the lower atmosphere and is a product of burning sulfur or burning materials that contain sulfur. Major sources of SO₂ include power plants, large industrial facilities, diesel vehicles, and oil-burning residential heaters. Generally, the highest levels of SO₂ are found near large industrial complexes. In recent years, SO₂ concentrations have been reduced by the increasingly stringent controls placed on stationary source emissions of SO₂ and limits on the sulfur content of fuels. Emissions of SO₂ aggravate lung diseases, especially bronchitis. It also constricts the breathing passages, especially in asthmatics and people involved in moderate to heavy exercise. SO₂ potentially causes wheezing, shortness of breath, and coughing. High levels of particulates appear to worsen the effect of SO₂, and long-term exposures to both pollutants leads to higher rates of respiratory illness.

(vi) Lead (Pb)

Pb is a metal found naturally in the environment, as well as in manufactured products. The highest levels of Pb in the air are usually found near lead smelters. The major sources of Pb emissions in the air are ore and metals processing and piston-engine aircraft operating on leaded aviation gasoline. Pb is also emitted from the sanding or removal of old lead-based paint. Pb emissions are primarily a regional pollutant. Pb affects the brain and other parts of the body's nervous system. Exposure to Pb in very young children impairs the development of the nervous system, kidneys, and blood forming processes in the body.

(b) Additional Criteria Pollutants (California Only)

In addition to the national standards, the State of California regulates State-identified criteria pollutants, including sulfates, hydrogen sulfide, visibility-reducing particles, and vinyl chloride. With respect to the State-identified criteria pollutants, most land use development projects either do not emit them (i.e., hydrogen sulfide (nuisance odor) and vinyl chloride), or otherwise account for these pollutants (i.e., sulfates and visibility reducing particles) through other criteria pollutants. For example, sulfates are associated with SOX emissions, and visibility-reducing particles are associated with particulate matter emissions. A description of the health effects of the State-identified criteria air pollutants is provided below.

(i) Sulfates (SO₄²⁻)

SO₄²⁻ are the fully oxidized ionic form of sulfur. SO₄²⁻ occur in combination with metal and/or hydrogen ions. In California, emissions of sulfur compounds occur primarily from the combustion of petroleum-derived fuels (e.g., gasoline and diesel fuel) that contain

sulfur. This sulfur is oxidized during the combustion process and subsequently converted to SO_4^{2-} in the atmosphere. Effects of sulfate exposure at levels above the standard include a decrease in ventilatory function, aggravation of asthmatic symptoms, and an increased risk of cardio-pulmonary disease. SO_4^{2-} are particularly effective in degrading visibility and, due to fact that they are usually acidic, can harm ecosystems and damage materials and property.

(ii) Hydrogen Sulfide (H_2S)

H_2S is a colorless gas with the odor of rotten eggs. The most common sources of H_2S emissions are oil and natural gas extraction and processing and natural emissions from geothermal fields. Industrial sources of H_2S include petrochemical plants and kraft paper mills. H_2S is also formed during bacterial decomposition of human and animal wastes and is present in emissions from sewage treatment facilities and landfills.⁴ Exposure to H_2S can induce tearing of the eyes and symptoms related to overstimulation of the sense of smell, including headache, nausea, or vomiting; additional health effects of eye irritation have only been reported with exposures greater than 50 parts per million (ppm), which is considerably higher than the odor threshold.⁵ H_2S is regulated as a nuisance based on its odor detection level; if the standard were based on adverse health effects, it would be set at a much higher level.⁶

(iii) Visibility-Reducing Particles

Visibility-reducing particles come from a variety of natural and manmade sources and can vary greatly in shape, size, and chemical composition. Visibility reduction is caused by the absorption and scattering of light by the particles in the atmosphere before it reaches the observer. Certain visibility-reducing particles are directly emitted to the air, such as windblown dust and soot, while others are formed in the atmosphere through chemical transformations of gaseous pollutants (e.g., sulfates, nitrates, organic carbon particles), which are the major constituents of particulate matter. As the number of visibility-reducing particles increases, more light is absorbed and scattered, resulting in less

⁴ California Air Resources Board, *Hydrogen Sulfide & Health*, ww2.arb.ca.gov/resources/hydrogen-sulfide-and-health, accessed October 3, 2023.

⁵ California Air Resources Board, *Hydrogen Sulfide & Health*, ww2.arb.ca.gov/resources/hydrogen-sulfide-and-health, accessed October 3, 2023.

⁶ California Air Resources Board, *Hydrogen Sulfide & Health*, ww2.arb.ca.gov/resources/hydrogen-sulfide-and-health, accessed October 3, 2023.

clarity, color, and visual range.⁷ Exposure to some haze-causing pollutants have been linked to adverse health impacts similar to PM₁₀ and PM_{2.5}, as discussed above.⁸

(iv) Vinyl Chloride

Vinyl chloride is a colorless gas with a mild, sweet odor. Most vinyl chloride is used to make polyvinyl chloride (PVC) plastic and vinyl products and is generally emitted from industrial processes. Other major sources of vinyl chloride have been detected near landfills, sewage plants, and hazardous waste sites, due to microbial breakdown of chlorinated solvents.⁹ Short-term health effects of exposure to high levels of vinyl chloride in the air include central nervous system effects, such as dizziness, drowsiness, and headaches while long-term exposure to vinyl chloride through inhalation and oral exposure causes liver damage and has been shown to increase the risk of angiosarcoma, a rare form of liver cancer in humans.¹⁰ Most health data on vinyl chloride relate to carcinogenicity; thus, the people most at risk are those who have long-term exposure to elevated levels, which is more likely to occur in occupational or industrial settings. However, control methodologies applied to industrial facilities generally prevent emissions to the ambient air.¹¹

(c) Volatile Organic Compounds (VOCs) and Toxic Air Contaminants (TACs)

Although the SCAQMD's primary mandate is attaining the NAAQS and the CAAQS for criteria pollutants within the district, SCAQMD also has a general responsibility to control emissions of air contaminants and prevent endangerment to public health. As a result, the SCAQMD has regulated pollutants other than criteria pollutants, such as VOCs, TACs, greenhouse gases, and stratospheric ozone-depleting compounds.

(i) Volatile Organic Compounds (VOCs)

VOCs are organic chemical compounds of carbon and are not "criteria" pollutants themselves; however, VOCs are a prime component (along with NO_x) of the photochemical

⁷ California Air Resources Board, *Visibility-Reducing Particles and Health*, ww2.arb.ca.gov/resources/visibility-reducing-particles-and-health, accessed October 3, 2023.

⁸ California Air Resources Board, *Visibility-Reducing Particles and Health*, ww2.arb.ca.gov/resources/visibility-reducing-particles-and-health, accessed October 3, 2023.

⁹ California Air Resources Board, *Vinyl Chloride & Health*, ww2.arb.ca.gov/resources/vinyl-chloride-and-health, accessed October 3, 2023.

¹⁰ California Air Resources Board, *Vinyl Chloride & Health*, ww2.arb.ca.gov/resources/vinyl-chloride-and-health, accessed October 3, 2023.

¹¹ California Air Resources Board, *Vinyl Chloride & Health*, ww2.arb.ca.gov/resources/vinyl-chloride-and-health, accessed October 3, 2023.

processes by which such criteria pollutants as O₃, nitrogen dioxide, and certain fine particles are formed. They are, therefore, regulated as “precursors” to formation of these criteria pollutants. Some are also identified as TACs and have adverse health effects. VOCs are typically formed from combustion of fuels and/or released through evaporation of organic liquids, internal combustion associated with motor vehicle usage, and consumer products (e.g., architectural coatings, etc.).

(ii) Toxic Air Contaminants (TACs)

TACs is a term used to describe airborne pollutants that may be expected to result in an increase in mortality or serious illness or which may pose a present or potential hazard to human health, and include both carcinogens and non-carcinogens. The California Air Resources Board (CARB) and the California Office of Environmental Health Hazard Assessment (OEHHA) determine if a substance should be formally identified, or “listed,” as a TAC in California. CARB has listed approximately 200 toxic substances, including those identified by the USEPA, which are identified on the California Air Toxics Program’s TAC List. TACs are also not classified as “criteria” air pollutants. The greatest potential for TAC emissions during construction is related to diesel particulate matter (DPM) emissions associated with heavy-duty equipment. During long-term operations, sources of DPM may include heavy duty diesel-fueled delivery trucks and stationary emergency generators. The effects of TACs can be diverse and their health impacts tend to be local rather than regional; consequently ambient air quality standards for these pollutants have not been established, and analysis of health effects is instead based on cancer risk and exposure levels.

b. Regulatory Framework

There are several plans, regulations, and programs that include policies, requirements, and guidelines regarding air quality at the federal, state, regional, and local levels. As described below, these plans, guidelines, and laws include the following:

- Federal Clean Air Act
 - National Ambient Air Quality Standards
- California Clean Air Act
 - California Ambient Air Quality Standards
- California Code of Regulations
- State Programs for Toxic Air Contaminants
- Diesel Risk Reduction Program

- South Coast Air Quality Management District
 - Air Quality Management Plan and Regional Transportation Plan/Sustainable Communities Strategy
 - Air Quality Guidance Documents
 - Rules and Regulations
- City of Los Angeles Air Quality Element
- City of Los Angeles Plan for a Healthy LA

(1) Federal

(a) Federal Clean Air Act

The Federal Clean Air Act (CAA) was enacted in 1970 and has been amended numerous times in subsequent years, with the most recent amendments occurring in 1990.¹² The CAA is the comprehensive federal law that regulates air emissions in order to protect public health and welfare.¹³ The USEPA is responsible for the implementation and enforcement of the CAA, which establishes the federal NAAQS, specifies future dates for achieving compliance, and requires the USEPA to designate areas as attainment, nonattainment, or maintenance. The CAA also mandates that each state submit and implement a State Implementation Plan (SIP) for each criteria pollutant for which the state has not achieved the applicable NAAQS. The SIP includes pollution control measures that demonstrate how the standards for those pollutants will be met. The sections of the CAA most applicable to land use development projects include Title I (Nonattainment Provisions) and Title II (Mobile Source Provisions).¹⁴

Title I requirements are implemented for the purpose of attaining NAAQS for criteria air pollutants. Table IV.B-1 on page IV.B-3 shows the NAAQS currently in effect for each criteria pollutant and their relative attainment status. The Air Basin fails to meet national standards for O₃ and PM_{2.5} and, therefore, is considered a federal “non-attainment” area for these pollutants. The Los Angeles County portion of the Air Basin fails to meet national

¹² 42 United States Code §7401 et seq. (1970).

¹³ United States Environmental Protection Agency, *Summary of the Clean Air Act*, www.epa.gov/laws-regulations/summary-clean-air-act, accessed October 3, 2023.

¹⁴ United States Environmental Protection Agency, *Clean Air Act Overview, Clean Air Act Table of Contents by Title, Last Updated January 3, 2017*, www.epa.gov/clean-air-act-overview/clean-air-act-text, accessed October 3, 2023. As shown therein, Title I addresses nonattainment areas and Title II addresses mobile sources.

standards for Pb and, therefore, is considered a federal “non-attainment” area for this pollutant.

Title II pertains to mobile sources, which includes on-road vehicles (e.g., cars, buses, motorcycles) and non-road vehicles (e.g., aircraft, trains, construction equipment). Reformulated gasoline and automobile pollution control devices are examples of the mechanisms the USEPA uses to regulate mobile air emission sources. The provisions of Title II have resulted in tailpipe emission standards for vehicles, which have been strengthened in recent years to improve air quality. For example, the standards for NO_x emissions have been lowered substantially, and the specification requirements for cleaner burning gasoline are more stringent.

The NAAQS and the CAAQS for the California criteria air pollutants (discussed below) have been set at levels considered safe to protect public health, including the health of sensitive populations and to protect public welfare.

(2) State

(a) California Clean Air Act

The California Clean Air Act (CCAA), signed into law in 1988, requires all areas of the state to achieve and maintain the California Ambient Air Quality Standards (CAAQS) by the earliest practicable date. CARB, a part of the California Environmental Protection Agency (CalEPA), is responsible for the coordination and administration of both state and federal air pollution control programs within California. In this capacity, CARB conducts research, sets state ambient air quality standards, compiles emission inventories, develops suggested control measures, and provides oversight of local programs. CARB establishes emissions standards for motor vehicles sold in California, consumer products, and various types of commercial equipment. It also sets fuel specifications to further reduce vehicular emissions. Table IV.B-1 on page IV.B-3 includes the CAAQS currently in effect for each of the criteria pollutants, as well as other pollutants recognized by the state. As shown in Table IV.B-1, the CAAQS include more stringent standards than the NAAQS. The Air Basin fails to meet state standards for O₃, PM₁₀, and PM_{2.5} and, therefore, is considered a state “non-attainment” area for these pollutants.

(b) California Code of Regulations

The California Code of Regulations (CCR) is the official compilation and publication of regulations adopted, amended or repealed by the state agencies pursuant to the Administrative Procedure Act (APA). The CCR includes regulations that pertain to air quality emissions. Specifically, Section 2485 in Title 13 of the CCR states that the idling of all diesel-fueled commercial vehicles (weighing over 10,000 pounds) during construction shall be limited to 5 minutes at any location. In addition, Section 93115 in Title 17 of the

CCR states that operation of any stationary, diesel-fueled, compression-ignition engines shall meet specified fuel and fuel additive requirements and emission standards.

(c) State Programs for Toxic Air Contaminants

The California Air Toxics Program is an established two-step process of risk identification and risk management to address potential health effects from exposure to toxic substances in the air. In the risk identification step, CARB and OEHHA determine if a substance should be formally identified, or “listed,” as a TAC in California. In the risk management step, CARB reviews emission sources of an identified TAC to determine whether regulatory action is needed to reduce risk. Based on results of that review, CARB has promulgated a number of Airborne Toxic Control Measures (ATCMs), both for stationary and mobile sources, including On-Road and Off-Road Vehicle Rules. These ATCMs include measures, such as limits on heavy-duty diesel motor vehicle idling and emission standards for off-road diesel construction equipment, in order to reduce public exposure to DPM and other TACs. These actions are also supplemented by the AB 2588 Air Toxics “Hot Spots” program and SB 1731, which require facilities to report their air toxics emissions, assess health risks, notify nearby residents and workers of significant risks if present, and reduce their risk through implementation of a risk management plan. SCAQMD has further adopted two rules to limit cancer and non-cancer health risks from facilities located within its jurisdiction. Rule 1401 (New Source Review of Toxic Air Contaminants) regulates new or modified facilities, and Rule 1402 (Control of Toxic Air Contaminants from Existing Sources) regulates facilities that are already operating. Rule 1402 incorporates requirements of the AB 2588 program, including implementation of risk reduction plans for significant risk facilities.

(d) Diesel Risk Reduction Program

CARB identified particulate emissions from diesel-fueled engines as TACs in August 1998. Following the identification process, the ARB was required by law to determine if there is a need for further control, which moved us into the risk management phase of the program. CARB developed the Risk Reduction Plan to Reduce Particulate Matter Emissions from Diesel-Fueled Engines and the Vehicles and the Risk Management Guidance for the Permitting of New Stationary Diesel-Fueled Engines. The Diesel Advisory Committee approved these documents on September 28, 2000, paving the way for the next step in the regulatory process: the control measure phase. During the control measure phase, specific statewide regulations designed to further reduce DPM emissions from diesel-fueled engines and vehicles have and continue to be evaluated and developed. The goal of each regulation is to make diesel engines as clean as possible by establishing state-of-the-art technology requirements or emission standards to reduce DPM emissions.

(3) Regional

The South Coast Air Quality Management District (SCAQMD) is primarily responsible for planning, implementing, and enforcing air quality standards for the South Coast Air Basin. The Air Basin is a subregion within the western portion of the SCAQMD jurisdiction as the SCAQMD also regulates portions of the Salton Sea Air Basin and Mojave Desert Air Basin within Riverside County.

(a) Air Quality Management Plan and RTP/SCS

To meet the NAAQS and CAAQS, the SCAQMD has adopted a series of AQMPs, which serve as a regional blueprint to develop and implement an emission reduction strategy that will bring the area into attainment with the standards in a timely manner. The 2016 AQMP includes strategies to ensure that rapidly approaching attainment deadlines for O₃ and PM_{2.5} are met and that public health is protected to the maximum extent feasible. The most significant air quality challenge in the Air Basin is to reduce NO_x emissions¹⁵ sufficiently to meet the upcoming O₃ standard deadlines as NO_x plays a critical role in the creation of O₃. The AQMP's strategy to meet the 8-hour O₃ standard in 2023 should lead to sufficient NO_x emission reductions to attain the 1-hour O₃ standard by 2022. Since NO_x emissions also lead to the formation of PM_{2.5}, the NO_x reductions needed to meet the O₃ standards will likewise lead to improvement of PM_{2.5} levels and attainment of PM_{2.5} standards.^{16,17} The 2022 AQMP is focused on attaining the 2015 8-hour O₃ standard of 70 parts per billion. The 2022 AQMP builds upon measures already in place from previous AQMPs and includes a variety of additional strategies such as regulation, accelerated development of available clean technologies, incentives and other CAA measures to achieve this standard.

The SCAQMD's strategy to meet the NAAQS and CAAQS distributes the responsibility for emission reductions across federal, state, and local levels and industries. The 2022 AQMP is composed of stationary and mobile source emission reductions from traditional regulatory control measures, incentive-based programs, co-benefits from climate programs, mobile source strategies, and reductions from federal sources, which include aircraft, locomotives and ocean-going vessels. These strategies are to be implemented in partnership with the CARB and USEPA.

¹⁵ NO_x emissions are a precursor to the formation of both O₃ and secondary PM_{2.5}.

¹⁶ Estimates are based on the inventory and modeling results and are relative to the baseline emission levels for each attainment year (see Final 2016 AQMP for detailed discussion).

¹⁷ SCAQMD, Final 2016 AQMP, 2017, p. ES-2.

The 2022 AQMP also incorporates the transportation strategy and transportation control measures from SCAG's adopted 2020–2045 RTP/SCS (2020–2045 RTP/SCS) Plan.¹⁸ SCAG is the regional planning agency for Los Angeles, Orange, Ventura, Riverside, San Bernardino, and Imperial Counties and addresses regional issues relating to transportation, the economy, community development and the environment. SCAG coordinates with various air quality and transportation stakeholders in Southern California to ensure compliance with the federal and state air quality requirements. Pursuant to California Health and Safety Code Section 40460, SCAG has the responsibility of preparing and approving the portions of the AQMP relating to the regional demographic projections and integrated regional land use, housing, employment, and transportation programs, measures, and strategies. SCAG is required by law to ensure that transportation activities “conform” to, and are supportive of, the goals of regional and state air quality plans to attain the NAAQS. The RTP/SCS includes transportation programs, measures, and strategies generally designed to reduce vehicle miles traveled (VMT), which are contained in the AQMP. The SCAQMD combines its portion of the AQMP with those prepared by SCAG.¹⁹ The RTP/SCS and Transportation Control Measures, included as Appendix IV-C of the 2022 AQMP for the Air Basin, are based on SCAG's 2020–2045 RTP/SCS.

The 2022 AQMP forecasts the 2037 emissions inventories “with growth” based on SCAG's 2020–2045 RTP/SCS. The region is projected to see a 12-percent growth in population, a 17-percent growth in housing units, a 11-percent growth in employment, and an 5-percent growth in vehicle miles traveled between 2012 and 2031. Despite regional growth in the past, air quality has improved substantially over the years, primarily due to the effects of air quality control programs at the local, state and federal levels.²⁰

(b) SCAQMD Air Quality Guidance Documents

The SCAQMD published the CEQA Air Quality Handbook (approved by the AQMD Governing Board in 1993) to provide local governments with guidance for analyzing and mitigating project-specific air quality impacts.²¹ The CEQA Air Quality Handbook provides standards, methodologies, and procedures for conducting air quality analyses. However, the SCAQMD is currently in the process of replacing the CEQA Air Quality Handbook with the Air Quality Analysis Guidance Handbook. While this process is underway, the SCAQMD has provided supplemental guidance on the SCAQMD website.²²

¹⁸ SCAG, *Final 2020–2045 RTP/SCP*, 2020.

¹⁹ SCAQMD, *Final 2022 AQMP*, 2022, p. 1-4.

²⁰ SCAQMD, *Final 2022 AQMP*, Figure 1-8.

²¹ South Coast Air Quality Management District, *CEQA Air Quality Handbook* 1993.

²² SCAQMD, *Air Quality Analysis Guidance*, www.aqmd.gov/home/rules-compliance/ceqa/air-quality-analysis-handbook#, accessed October 3, 2023.

The SCAQMD has also adopted land use planning guidelines in its Guidance Document for Addressing Air Quality Issues in General Plans and Local Planning, which considers impacts to sensitive receptors from facilities that emit TAC emissions.²³ SCAQMD's siting distance recommendations are the same as those provided by CARB (e.g., a 500-foot siting distance for sensitive land uses proposed in proximity to freeways and high-traffic roads, and the same siting criteria for distribution centers and dry cleaning facilities). The SCAQMD's document introduces land use-related policies that rely on design and distance parameters to minimize emissions and lower potential health risk. SCAQMD's guidelines are voluntary initiatives recommended for consideration by local planning agencies.

The SCAQMD has published a guidance document called the Final Localized Significance Threshold Methodology for CEQA evaluations that is intended to provide guidance when evaluating the localized effects from mass emissions during construction or operation of a project.²⁴ The SCAQMD adopted additional guidance regarding PM_{2.5} emissions in a document called Final Methodology to Calculate Particulate Matter (PM)_{2.5} and PM_{2.5} Significance Thresholds.²⁵ The latter document has been incorporated by the SCAQMD into its CEQA significance thresholds and Final Localized Significance Threshold Methodology.

(c) SCAQMD Rules and Regulations

The SCAQMD has adopted several rules and regulations to regulate sources of air pollution in the Air Basin and to help achieve air quality standards for land use development projects, which include, but are not limited to the following:

Regulation IV—Prohibitions: This regulation sets forth the restrictions for visible emissions, odor nuisance, fugitive dust, various air emissions, fuel contaminants, start-up/shutdown exemptions and breakdown events. The following is a list of rules which apply to the Project:

- **Rule 401—Visible Emissions:** This rule states that a person shall not discharge into the atmosphere from any single source of emission whatsoever

²³ South Coast Air Quality Management District, *Guidance Document for Addressing Air Quality Issues in General Plans and Local Planning*, 2005.

²⁴ South Coast Air Quality Management District, *Final Localized Significance Threshold Methodology*, 2008, www.aqmd.gov/home/regulations/ceqa/air-quality-analysis-handbook/localized-significance-thresholds, accessed October 3, 2023.

²⁵ South Coast Air Quality Management District, *Final Methodology to Calculate Particulate Matter (PM) 2.5 and PM_{2.5} Significance Thresholds*, 2006.

any air contaminant for a period or periods aggregating more than three minutes in any one hour which is as dark or darker in shade as that designated No. 1 on the Ringelmann Chart or of such opacity as to obscure an observer's view.

- **Rule 402—Nuisance:** This rule states that a person shall not discharge from any source whatsoever such quantities of air contaminants or other material which cause injury, detriment, nuisance, or annoyance to any considerable number of persons or to the public, or which endanger the comfort, repose, health or safety of any such persons or the public, or which cause, or have a natural tendency to cause, injury or damage to business or property.
- **Rule 403—Fugitive Dust:** This rule requires projects to prevent, reduce or mitigate fugitive dust emissions from a site. Rule 403 restricts visible fugitive dust to the project property line, restricts the net PM₁₀ emissions to less than 50 micrograms per cubic meter ($\mu\text{g}/\text{m}^3$) and restricts the tracking out of bulk materials onto public roads. Additionally, projects must utilize one or more of the best available control measures (identified in the tables within the rule). Mitigation measures may include adding freeboard to haul vehicles, covering loose material on haul vehicles, watering, using chemical stabilizers and/or ceasing all activities. Finally, a contingency plan may be required if so determined by the USEPA.

Regulation XI—Source Specific Standards: Regulation XI sets emissions standards for specific sources. The following is a list of rules which may apply to the Project:

- **Rule 1113—Architectural Coatings:** This rule requires manufacturers, distributors, and end users of architectural and industrial maintenance coatings to reduce VOC emissions from the use of these coatings, primarily by placing limits on the VOC content of various coating categories.
- **Rule 1138—Control of Emissions from Restaurant Operations:** This rule specifies PM and VOC emissions and odor control requirements for commercial cooking operations that use chain-driven charbroilers to cook meat.
- **Rule 1146.2—Emissions of Oxides of Nitrogen from Large Water Heaters and Small Boilers and Process Heaters:** This rule requires manufacturers, distributors, retailers, refurbishers, installers, and operators of new and existing units to reduce NO_x emissions from natural gas-fired water heaters, boilers, and process heaters as defined in this rule.
- **Rule 1186—PM₁₀ Emissions from Paved and Unpaved Roads, and Livestock Operations:** This rule applies to owners and operators of paved and unpaved roads and livestock operations. The rule is intended to reduce PM₁₀ emissions by requiring the cleanup of material deposited onto paved roads, use of certified street sweeping equipment, and treatment of high-use unpaved roads (see also Rule 403).

Regulation XIII—New Source Review (NSR): Regulation XIII sets requirements for preconstruction review required under both federal and state statutes for new and modified sources located in areas that do not meet the CAA standards ("non-attainment" areas). NSR applies to both individual permits and entire facilities. Any permit that has a net increase in emissions is required to apply Best Available Control Technology (BACT). Facilities with a net increase in emissions are required to offset the emission increase by use of Emission Reduction Credits (ERCs). The regulation provides for the application, eligibility, registration, use and transfer of ERCs. For low emitting facilities, the SCAQMD maintains an internal bank that can be used to provide the required offsets. In addition, certain facilities are subject to provisions that require public notice and modeling analysis to determine the downwind impact prior to permit issuance.

Regulation XIV—Toxics and Other Non-Criteria Pollutants: Regulation XIV sets requirements for new permit units, relocations, or modifications to existing permit units, which emit toxic air contaminants or other non-criteria pollutants. The following is a list of rules which may apply to the Project:

- **Rule 1403—Asbestos Emissions from Demolition/Renovation Activities:** This rule requires owners and operators of any demolition or renovation activity and the associated disturbance of asbestos-containing materials, any asbestos storage facility, or any active waste disposal site to implement work practice requirements to limit asbestos emissions from building demolition and renovation activities, including the removal and associated disturbance of asbestos-containing materials.
- **Rule 1470—Requirements for Stationary Diesel-Fueled Internal Combustion and Other Compression Ignition Engines:** This rule applies to stationary compression ignition (CI) engines greater than 50 brake horsepower and sets limits on emissions and operating hours. In general, new stationary emergency standby diesel-fueled engines greater than 50 brake horsepower are not permitted to operate more than 50 hours per year for maintenance and testing.

(4) Local

(a) City of Los Angeles General Plan

(i) Air Quality Element

Local jurisdictions, such as the City, have the authority and responsibility to reduce air pollution through their land use decision-making authority. Specifically, the City is responsible for the assessment and mitigation of air emissions resulting from its land use decisions. In general, the City of Los Angeles' General Plan (including the Framework, Air Quality, Mobility 2035, and Health and Wellness Elements) and the City of Los Angeles' Green New Deal (Sustainable pLAN 2019) contain policies and programs for the protection

of the environment and health through improved air quality. These serve to provide additional critical guidance for the betterment of public health for the region and the City.

The most directly related of those plans, the City's General Plan Air Quality Element, was adopted on November 24, 1992, and sets forth the goals, objectives, and policies, which guide the City in its implementation of its air quality improvement programs and strategies. A number of these goals, objectives, and policies are relevant to land use development and relate to traffic mobility, minimizing particulate emissions from construction activities, discouraging single-occupancy vehicle trips, managing traffic congestion during peak hours, and increasing energy efficiency in City facilities and private developments.

The Air Quality Element establishes six goals:

- Good air quality in an environment of continued population growth and healthy economic structure;
- Less reliance on single-occupant vehicles with fewer commute and non-work trips;
- Efficient management of transportation facilities and system infrastructure using cost-effective system management and innovative demand-management techniques;
- Minimal impacts of existing land use patterns and future land use development on air quality by addressing the relationship between land use, transportation, and air quality;
- Energy efficiency through land use and transportation planning, the use of renewable resources and less-polluting fuels, and the implementation of conservation measures, including passive measures, such as site orientation and tree planting; and
- Citizen awareness of the linkages between personal behavior and air pollution and participation in efforts to reduce air pollution.

The City is also responsible for the implementation of transportation control measures as outlined in the AQMP. Through capital improvement programs, the City can fund infrastructure that contributes to improved air quality by requiring such improvements as bus turnouts as appropriate, installation of energy-efficient streetlights, and synchronization of traffic signals. In accordance with CEQA requirements and the CEQA review process, the City assesses the air quality impacts of new development projects, requires mitigation of potentially significant air quality impacts by conditioning discretionary permits, and monitors and enforces implementation of such mitigation measures.

(ii) Plan for a Healthy Los Angeles

The Plan for a Healthy Los Angeles, adopted by the City Council on March 31, 2015, lays the foundation to create healthier communities for all residents in the City. As an element of the General Plan, it provides high-level policy vision, along with measurable objectives and implementation programs, to elevate health as a priority for the City's future growth and development. With a focus on public health and safety, the Plan for a Healthy Los Angeles provides a roadmap for addressing the most basic and essential quality-of-life issues: safe neighborhoods; a clean environment (i.e., improved ambient and indoor air quality); the opportunity to thrive; and access to health services, affordable housing, and healthy and sustainably produced food.

c. Existing Conditions

(1) Regional Air Quality

The Southern California region lies in the semi-permanent high-pressure zone of the eastern Pacific. As a result, the climate is mild, tempered by cool sea breezes. The usually mild climatological pattern is interrupted infrequently by periods of extremely hot weather, winter storms, or Santa Ana winds. The extent and severity of the air pollution problem in the Air Basin is a function of the area's natural physical characteristics (weather and topography), as well as man-made influences (development patterns and lifestyle). Factors, such as wind, sunlight, temperature, humidity, rainfall, and topography, affect the accumulation and dispersion of pollutants throughout the Air Basin, making it an area of high pollution potential.

The greatest degree of air pollution throughout the Air Basin occurs from June through September. This condition is generally attributed to the large amount of pollutant emissions, light winds, and shallow vertical atmospheric mixing. This frequently reduces pollutant dispersion, thus causing elevated air pollution levels. Pollutant concentrations in the Air Basin vary with location, season, and time of day. O₃ concentrations, for example, tend to be lower along the coast, higher in the near inland valleys, and lower in the far inland areas of the Air Basin and adjacent desert. Over the past 30 years, substantial progress has been made in reducing air pollution levels in Southern California. However, the Air Basin still fails to meet the national standards for O₃ and PM_{2.5} and, therefore, is considered a federal non-attainment area for these pollutants. In addition, Los Angeles County still fails to meet the national standard for lead and, therefore, is considered a federal non-attainment area for lead.

(a) AQMP Long-Term Trends

SCAQMD has the responsibility for ensuring that all national and State ambient air quality standards are achieved and maintained throughout the Air Basin. To meet the

standards, SCAQMD has adopted a series of AQMPs. Both the 2016 and 2022 AQMP includes strategies to ensure that rapidly approaching attainment deadlines are met and that public health is protected to the maximum extent feasible. The most significant air quality challenge in the Air Basin is to reduce NO_x emissions²⁶ sufficiently to meet the upcoming ozone standard deadlines. The 2016 AQMP provides a baseline year 2012 inventory of 512 tons per day (tpd) of NO_x and modeling results show that NO_x emissions are projected to be 214 tpd in the 8-hour ozone attainment year of 2031, due to continued implementation of already adopted regulatory actions (“baseline emissions”). The 2016 AQMP suggests that total Air Basin emissions of NO_x must be reduced to 96 tpd by 2031 to attain the 8-hour ozone standard. Although the existing air regulations and programs will continue to lower NO_x emissions in the region, an additional 55 percent in the year 2031 are necessary to attain the 8-hour ozone standard.^{27,28}

The 2022 AQMP provides a baseline year 2018 inventory of 351 tpd of NO_x and modeling results show that NO_x emissions are projected to be 184 tpd in the 8-hour ozone attainment year of 2037, due to continued implementation of already adopted regulatory actions (“baseline emissions”). The 2022 AQMP suggests that total Air Basin emissions of NO_x must be reduced to 124 tpd by 2037 to attain the 8-hour O₃ standard. Although the existing air regulations and programs will continue to lower NO_x emissions in the region, an additional 67 percent in the year 2037 are necessary to attain the 8-hour O₃ standard.^{29,30}

The overall control strategy is an integral approach relying on fair-share emission reductions from federal, State and local levels. The 2016 and 2022 AQMP are composed of stationary and mobile source emission reductions from traditional regulatory control measures, incentive-based programs, co-benefits from climate programs, mobile source strategies and reductions from federal sources, which include aircraft, locomotives and ocean-going vessels. These strategies are to be implemented in partnership with CARB and USEPA. In addition, SCAG’s 2016–2040 RTP/SCS³¹ and 2020–2045 RTP/SCS³² includes transportation programs, measures, and strategies generally designed to reduce VMT, which are contained in the 2016 and 2022 AQMP respectively.

²⁶ NO_x emissions are a precursor to the formation of both ozone and secondary PM_{2.5}.

²⁷ Estimates are based on the inventory and modeling results and are relative to the baseline emission levels for each attainment year (see Final 2016 AQMP for detailed discussion).

²⁸ SCAQMD, Final 2016 AQMP, 2017 (page ES-2).

²⁹ Estimates are based on the inventory and modeling results and are relative to the baseline emission levels for each attainment year (see Final 2022 AQMP for detailed discussion).

³⁰ SCAQMD, Final 2022 AQMP, 2022 (page 4-1).

³¹ SCAG, Final 2016–2040 RTP/SCS, April 2016.

³² SCAG, Final 2020–2045 RTP/SCS, 2020.

Pursuant to California Health and Safety Code Section 40460, SCAG has the responsibility of preparing and approving the portions of the AQMP relating to the integration of regional land use programs, measures, and strategies. SCAQMD combines its portion of the AQMP with those prepared by SCAG. The RTP/SCS and Transportation Control Measures (TCMs), included as Appendix IV-C to the 2016 AQMP for the Basin, are based on SCAG's 2016–2040 RTP/SCS and SCAG's Regional Transportation Strategy and Control Measures, included as Appendix IV-C to the 2022 AQMP for the Basin, are based on SCAG's 2020–2045 RTP/SCS.

The 2016 AQMP forecasts the 2031 emissions inventories “with growth” based on SCAG's 2016–2040 RTP/SCS. The region is projected to see a 12-percent growth in population, 16-percent growth in housing units, 23-percent growth in employment, and 8-percent growth in VMT between 2012 and 2031. The 2022 AQMP forecasts the 2037 emissions inventories “with growth” based on SCAG's 2020–2045 RTP/SCS. The region is projected to see a 12-percent in population, 17-percent growth in housing units, 11-percent growth in employment, and 5-percent growth in VMT between 2018 and 2037.

Despite past regional growth, air quality has improved substantially over the years, primarily due to the impacts of air quality control programs at the local, State and federal levels. The graphic included in Figure IV.B-1 on page IV.B-23 shows the percent change in air quality along with demographic data for the four-county region from the 2016 AQMP. In particular, Figure IV.B-1 illustrates the trends since 1990 of the 8-hour ozone levels, the 1-hour ozone levels, and annual average PM_{2.5} concentrations (since 1999), compared to the regional gross domestic product, total employment and population. The graphic included in Figure IV.B-2 on page IV.B-24 shows the percent change in air quality along with demographic data for the four-county region from the 2022 AQMP. In particular, Figure IV.B-2 illustrates the trends since 1995 of the 8-hour ozone levels, the 1-hour ozone levels, and annual average PM_{2.5} concentrations (since 2001), compared to the regional gross domestic product, total employment and population. Human activity in the region has an impact on achieving reductions in emissions. However, the ozone and particulate matter levels continue to trend downward as the economy and population increase, demonstrating that it is possible to maintain a healthy economy while improving public health through air quality improvements.³³

³³ SCAQMD, *Final 2022 AQMP, 2022* (p. 1-8).

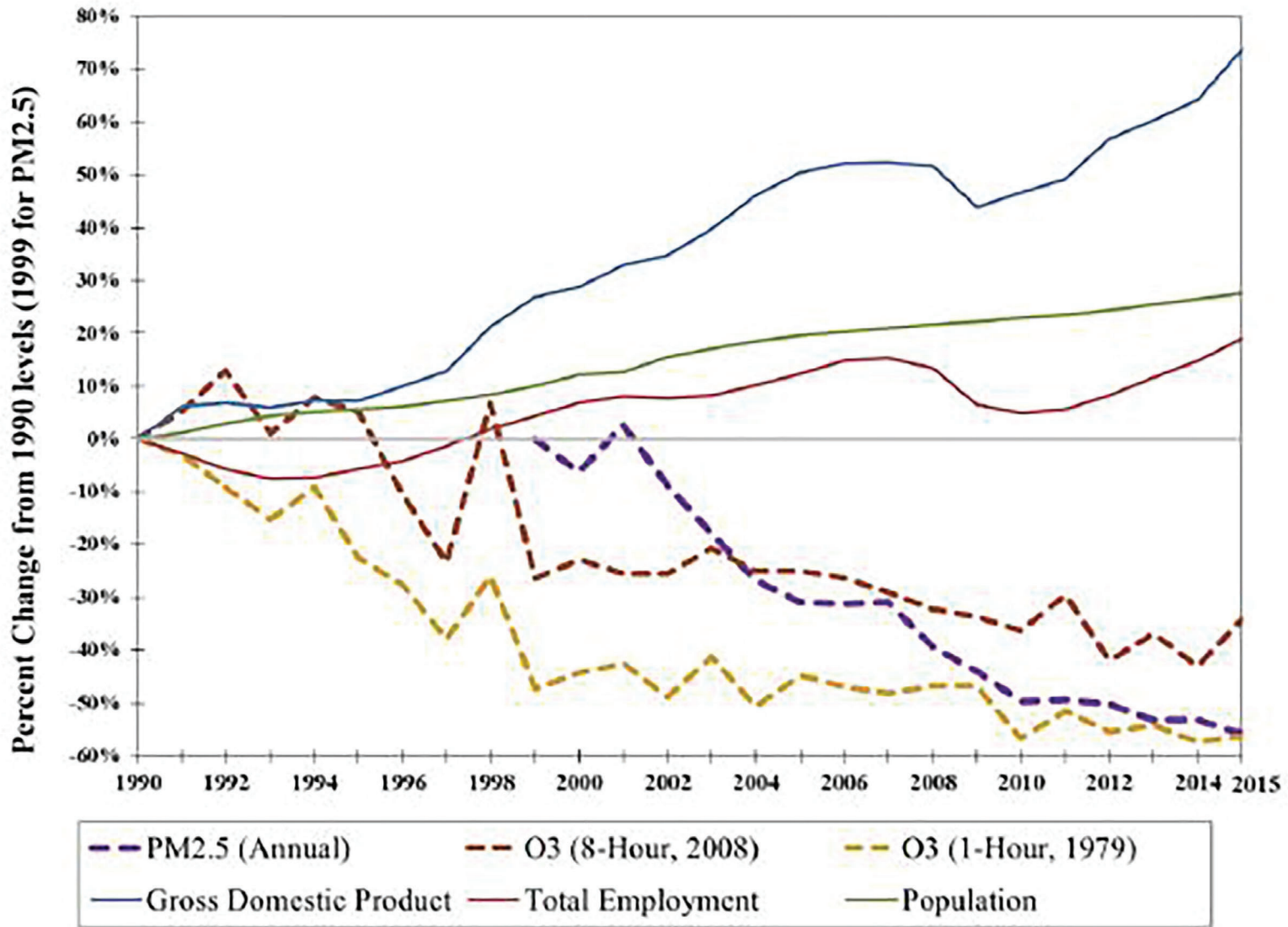


Figure IV.B-1
2016 AQMP Ozone Trends

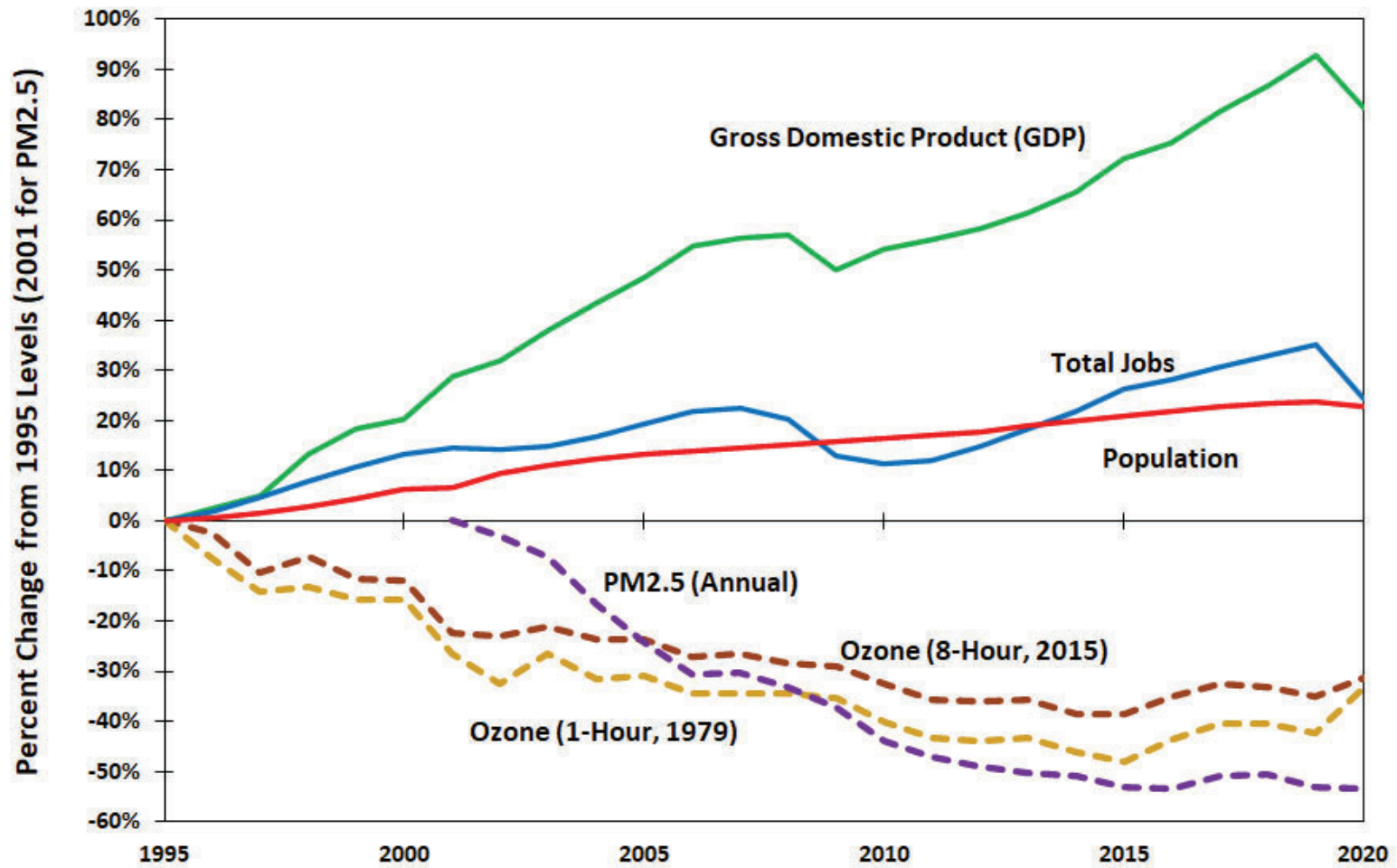


Figure IV.B-5
2022 AQMP Ozone Trends

(b) *SCAQMD Multiple Air Toxic Exposure Study*

SCAQMD has released the Multiple Air Toxics Exposure Study (MATES-V).³⁴ The MATES-V study was aimed at estimating the cancer risk from toxic air emissions throughout the Air Basin by conducting a comprehensive monitoring program, an updated emissions inventory of TACs, and a modeling effort to fully characterize health risks for those living in the Air Basin. The MATES-V study concluded that the average carcinogenic risk from air pollution in the Air Basin is approximately 424 in one million over a 70-year duration. Mobile sources (e.g., cars, trucks, trains, ships, aircraft, etc.) represent the greatest contributors. Approximately 50 percent of the risk is attributed to diesel particulate emissions, approximately 25 percent to other toxics associated with mobile sources (including benzene, butadiene, and carbonyls), and approximately 25 percent of all carcinogenic risk is attributed to stationary sources (which include large industrial operations, such as refineries and metal processing facilities, as well as smaller businesses, such as gas stations and chrome plating).³⁵

As part of the MATES-V study, SCAQMD prepared a series of maps that shows regional trends in estimated outdoor inhalation cancer risk from toxic emissions, as part of an ongoing effort to provide insight into relative risks. The estimates represent the number of potential cancers per million people associated with a lifetime of breathing air toxics (24 hours per day outdoors for 70 years) in parts of the area. The MATES-V map is the most recently available map to represent existing conditions near the Project area. The estimated cancer risk for the vast majority of the urbanized area within the Air Basin ranges from 200 to over 1,200 cancers per million over a 70-year duration.³⁶ Generally, the risk from air toxics is lower near the coastline and higher risks are concentrated near large diesel sources (e.g., freeways, airports, and ports).

(2) Local Air Quality

Air pollutant emissions are generated in the local vicinity by stationary and area-wide sources, such as commercial and industrial activity, space and water heating, landscape maintenance, consumer products, and mobile sources primarily consisting of automobile traffic. Motor vehicles are the primary source of pollutants in the Project site vicinity.

³⁴ SCAQMD, *Multiple Air Toxics Exposure Study in the South Coast Air Basin (MATES V) Final Report*, August 2021.

³⁵ SCAQMD, *Multiple Air Toxics Exposure Study in the South Coast Air Basin (MATES V) Final Report*, August 2021.

³⁶ SCAQMD, *Multiple Air Toxics Exposure Study in the South Coast Air Basin (MATES V), MATES V Interactive Carcinogenicity Map*, 2021.

(a) *Existing Pollutant Levels at Nearby Monitoring Stations*

SCAQMD maintains a network of air quality monitoring stations located throughout the Air Basin and has divided the Air Basin into 38 source receptor areas (SRAs) in which 31 monitoring stations operate. Figure IV.B-3 on page IV.B-27 shows the locations of the SRAs located in Los Angeles County. The Project site is located within SRA 3, which covers the Southwest Coastal Los Angeles area. The monitoring station most representative of the Project site is the LAX Hastings Station, located at 7201 W. Westchester Pkwy, 2.0 miles south of the Project site. Criteria pollutants monitored at this station include O₃, CO, PM₁₀, NO₂, SO₂, and lead. Criteria pollutants not monitored at this station include PM_{2.5} and Sulfate. The second most representative monitoring stations for these pollutants is the North Main Street Station, located approximately 12.2 miles northeast of the Project site (for PM_{2.5} and Sulfate). During 2022, no monitoring station for SRA 3 was provided. Measurements for O₃ and NO₂ were taken from SRA 2 and the remainder from SRA 1. Table IV.B-2 on page IV.B-28 identifies the national and State ambient air quality standards for relevant air pollutants along with the ambient pollutant concentrations that have been measured at these stations through the period of 2020–2022.

(b) *Existing Health Risk in the Surrounding Area*

As shown in Figure IV.B-4 on page IV.B-30, based on the MATES-V model, the calculated cancer risk in the Project area is approximately 508 in one million.³⁷ The cancer risk in this area is predominately related to nearby sources of diesel particulate (e.g., Los Angeles International Airport and State Route 90). Other sources in the Project vicinity include emergency generators, boilers and char broilers. In general, the risk at the Project site is comparable with other urbanized areas in Los Angeles. The OEHHA, on behalf of the California Environmental Protection Agency (CalEPA), provides a screening tool (CalEnviroScreen) that can be used to help identify California communities that are disproportionately burdened by multiple sources of pollution. According to CalEnviroScreen, the Project site is located in the 84th percentile, which means that the Project site is worse than average in terms of pollution in comparison to other communities within California.³⁸

³⁷ SCAQMD, *Multiple Air Toxics Exposure Study in the South Coast Air Basin (MATES V), MATES V Data Visualization Tool*, 2021. https://experience.arcgis.com/experience/79d3b6304912414bb21ebdde80100b23/page/Main-Page/?data_id=dataSource_112-7c8f2a4db79b4a918d46b4e8985a112b%3A17743&views=Click-tabs-for-other-data%2CGridded-Cancer-Risk, accessed October 3, 2023

³⁸ OEHHA, *CalEnviroScreen 4.0 MAP*, https://experience.arcgis.com/experience/11d2f52282a54ceebcac7428e6184203/page/CalEnviroScreen-4_0/, accessed October 3, 2023.

SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT



21865 Copley Drive, Diamond Bar, CA 91765-4182
 Information: 1-800-CUT-SMOG (1-800-288-7664)
 Internet: <http://www.aqmd.gov>

Air Quality Reporting

Since 1977, the South Coast Air Quality Management District has served as the local government agency responsible for measuring, reporting and taking steps to improve air quality.

To inform the AQMD's 15 million residents about air quality conditions, the AQMD issues an air quality forecast each day and reports current air quality conditions for each

numbered Monitoring Area and General Forecast Area depicted here.

This air quality information is transmitted to the public through newspapers, television, radio and pager services, through faxes to schools, through recorded messages on the AQMD's toll-free Smog Update telephone line, 1-800-CUT-SMOG, and on the AQMD's Internet Website <http://www.aqmd.gov>.

Newspapers, television and radio stations typically will report air

quality information using the General Forecast Areas, shown in color below, which are larger groupings of the more specific Air Monitoring Areas.

The 1-800-CUT-SMOG (1-800-288-7664) line also provides smog forecast and current smog level information by ZIP code.

The AQMD's Internet Website provides both forecasts as well as smog levels for that day and the previous day. Forecasts for the next day normally are posted by noon.

General Forecast Areas & Air Monitoring Areas

Coastal		
Northwest Los Angeles County Coastal	2	
Southwest Los Angeles County Coastal	3	
South Los Angeles County Coastal	4	
North Orange County Coastal	18	
Central Orange County Coastal	20	
Metropolitan		
Central Los Angeles County	1	
Southeast Los Angeles County	5	
South Central Los Angeles County	12	
North Orange County	16	
San Fernando Valley		
West San Fernando Valley	6	
East San Fernando Valley	7	
Santa Clarita Valley	13	
San Gabriel Valley		
West San Gabriel Valley	8	
East San Gabriel Valley	9	
Pomona/Walnut Valley	10	
South San Gabriel Valley	11	
Inland Orange County		
Central Orange County	17	
Saddleback Valley	19	
Capistrano Valley	21	
Riverside Valley		
Corona/Norco Area	22	
Metropolitan Riverside	23	
San Bernardino Valley		
Northwest San Bernardino Valley	32	
Southwest San Bernardino Valley	33	
Central San Bernardino Valley	34	
East San Bernardino Valley	35	
Hemet/Elsinore Area		
Perris Valley	24	
Lake Elsinore	25	
Hemet/San Jacinto Valley	28	
Temecula/Anza Area		
Temecula Valley	26	
Anza Area	27	
San Gabriel Mountains		
West San Bernardino Mountains	36	
Central San Bernardino Mountains	37	
Big Bear Lake		
	38	
Banning Pass Area		
	29	
Coachella/Low Desert		
Coachella Valley	30	
East Riverside County	31	
Antelope Valley APCD*		14
MOJAVE DESERT AQMD*		
Victor Valley	39	
Northern Mojave Desert	40	
Central Mojave Desert	41	

*These agencies contract with the South Coast AQMD for forecasting services. Also, the Antelope Valley APCD contracts with the Mojave Desert AQMD for other services. For more air quality information in these areas, please call the Mojave Desert AQMD at (760) 245-1661, extension 5067.

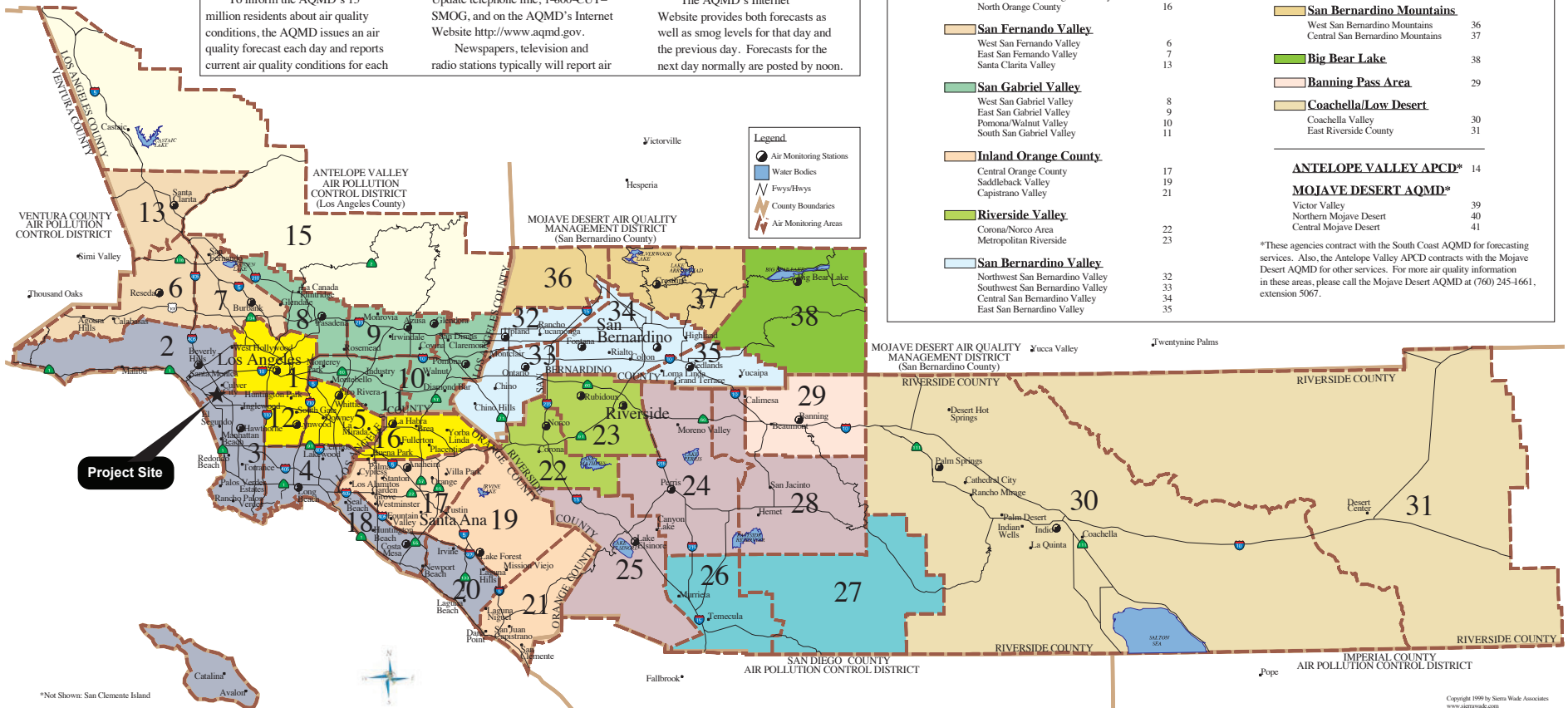


Figure IV.B-3
 SCAQMD SRAs

**Table IV.B-2
Summary of Ambient Air Quality in the Project Vicinity**

Pollutant	Year		
	2020	2021	2022
Ozone (O₃)			
Maximum 1-hour Concentration (ppm)	0.12	0.06	0.08
Days exceeding CAAQS (0.09 ppm)	1	0	0
Maximum 8-hour Concentration (ppm)	0.07	0.05	0.07
Days exceeding NAAQS (0.070 ppm)	2	0	0
Days exceeding CAAQS (0.07 ppm)	2	0	0
Respirable Particulate Matter (PM₁₀)			
Maximum 24-hour Concentration (µg/m ³)	43	33	60
Days exceeding NAAQS (150 µg/m ³)	0	0	0
Days exceeding CAAQS (50 µg/m ³)	0	0	4
Annual Arithmetic Mean (µg/m ³)	23	18	29
Does measured AAM exceed CAAQS (20 µg/m ³)?	Yes	No	Yes
Fine Particulate Matter (PM_{2.5})^b			
Maximum 24-hour Concentration (µg/m ³)	47	61	34
Days exceeding NAAQS (35 µg/m ³)	2	12	0
Annual Arithmetic Mean (µg/m ³)	12	13	11
Does measured AAM exceed NAAQS (12 µg/m ³)?	Yes	Yes	No
Does measured AAM exceed CAAQS (12 µg/m ³)?	Yes	Yes	No
Carbon Monoxide (CO)			
Maximum 1-hour Concentration (ppm)	2	2	2
Days exceeding NAAQS (35.0 ppm)	0	0	0
Days exceeding CAAQS (20.0 ppm)	0	0	0
Maximum 8-hour Concentration (ppm)	1	1	2
Days exceeding NAAQS and CAAQS (9 ppm)	0	0	0
Nitrogen Dioxide (NO₂)			
Maximum 1-hour Concentration (ppm)	0.06	0.06	0.05
Days exceeding CAAQS (0.18 ppm)	0	0	0
Annual Arithmetic Mean (ppm)	0.01	0.01	0.01
Does measured AAM exceed NAAQS (0.0534 ppm)?	No	No	No
Does measured AAM exceed CAAQS (0.03 ppm)?	No	No	No
Sulfur Dioxide (SO₂)			
Maximum 1-hour Concentration (ppm)	0.006	0.008	0.007
Days exceeding CAAQS (0.25 ppm)	0	0	0
Maximum 24-hour concentration (ppm)	N/A	N/A	N/A
Days exceeding CAAQS (0.04 ppm)	0	0	0
Days exceeding NAAQS (0.14 ppm)	0	0	0
Annual Arithmetic Mean (ppm)	N/A	N/A	N/A
Does measured AAM exceed NAAQS (0.030 ppm)?	0	0	0

Table IV.B-2 (Continued)
Summary of Ambient Air Quality in the Project Vicinity

Pollutant	Year		
	2020	2021	2022
Lead^a			
Maximum 30-day Average Concentration ($\mu\text{g}/\text{m}^3$)	0.008	0.003	0.008
Does measured concentration exceed NAAQS ($1.5 \mu\text{g}/\text{m}^3$)	No	No	No
Maximum Calendar Quarter Concentration ($\mu\text{g}/\text{m}^3$)	0.005	0.004	0.007
Does measured concentration exceed CAAQS ($1.5 \mu\text{g}/\text{m}^3$)	No	No	No
Sulfate^b			
Maximum 24-hour Concentration ($\mu\text{g}/\text{m}^3$)	3.3	4.4	5.8
Does measured concentration exceed CAAQS ($25 \mu\text{g}/\text{m}^3$)	No	No	No
<hr/> <p>AAM = annual arithmetic mean ppm = parts per million by volume $\mu\text{g}/\text{m}^3$ = micrograms per cubic meter Note: values included herein are rounded</p> <p>^a USEPA regulation requires the SCAQMD to operate lead monitoring stations near sources of lead. As of 2018, no monitoring stations within the Air Basin demonstrated an exceedance of the lead NAAQS. Attainment redesignation for lead is currently pending with the USEPA.</p> <p>^b The monitoring station for SRA 3 does not measure $\text{PM}_{2.5}$ and Sulfate during 2020 and 2021. Measurements for these pollutants were taken from the SRA 1 monitoring station. During 2022, no monitoring station for SRA 3 was provided. Measurements for O_3 and NO_2 were taken from SRA 2 and the remainder from SRA 1.</p> <p>Source: South Coast Air Quality Management District Ambient Monitoring Data (2020–2022), www.aqmd.gov/home/air-quality/air-quality-data-studies/historical-data-by-year, accessed September 11, 2023.</p>			

SCAQMD developed a web tool which allows one to search for public information about SCAQMD-regulated facilities that are required to have a permit to operate equipment that release pollutants into the air.³⁹ A search was performed on the SCAQMD's Facility Information Database (FIND), as well as site reconnaissance (Google Maps), to identify potential air toxic emitting sources (e.g., freeways, diesel trucks idling at warehouse distribution facilities in excess of 100 trucks per day). Based on this screening analysis, no major sources of TACs were found in the vicinity (within 0.25 mile) of the Project site.

³⁹ SCAQMD, *Facility Information Detail (F.I.N.D.)*, www.aqmd.gov/nav/FIND, accessed October 3, 2023.

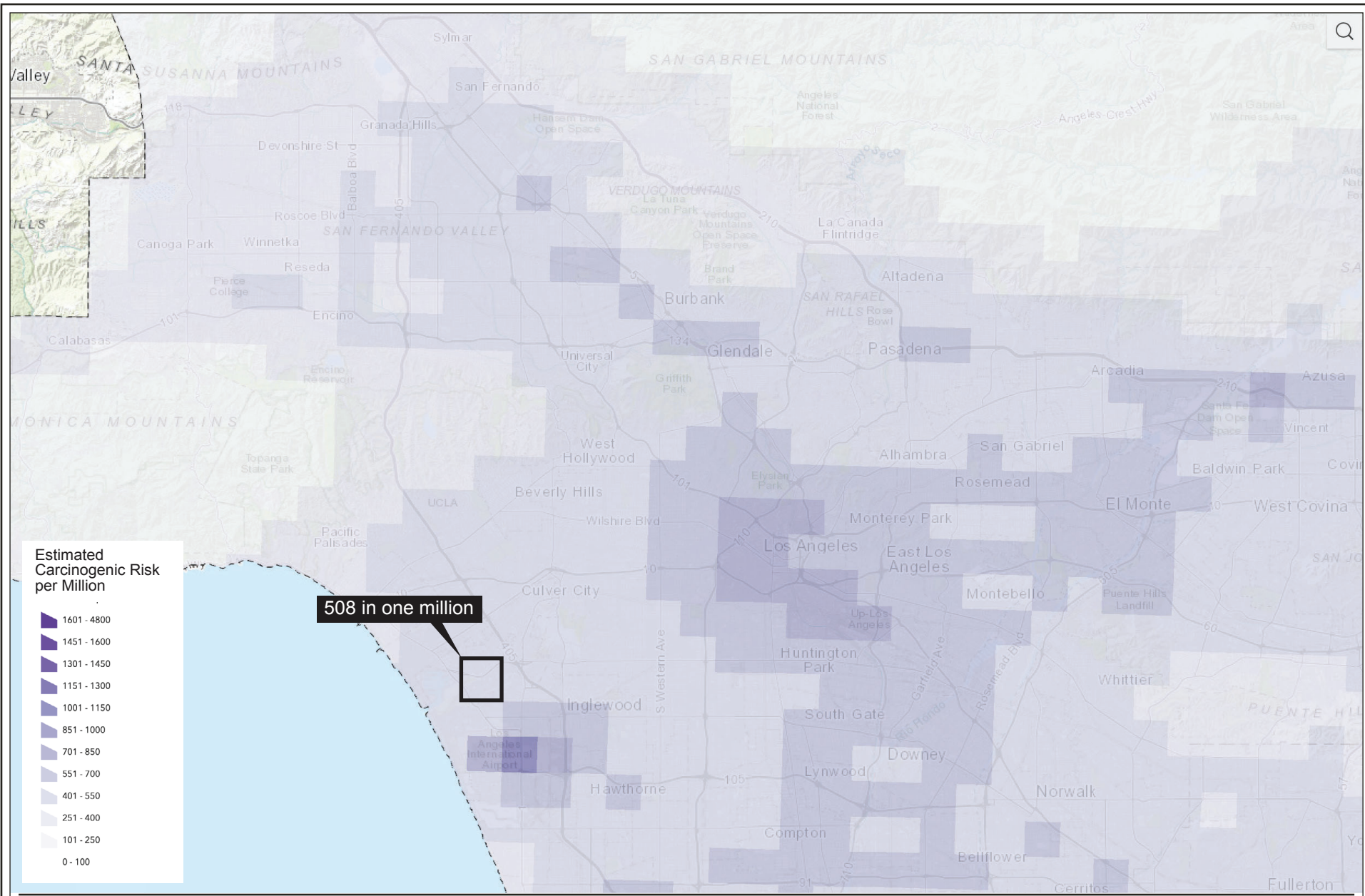


Figure IV.B-4
MATES V Total Cancer Risk for the Project Area

Source: South Coast AQMD, 2021.

(c) Surrounding Uses

As shown in Figure IV.B-5 on page IV.B-32, the area surrounding the Project site includes a variety of land uses, such as medical and general office, light industrial, and manufacturing uses, as well as one multi-family residential structure south of the Project site across Beatrice Street and two residential areas located to the east across Grosvenor Boulevard and south across Jefferson Boulevard. Adjacent to the eastern side of the Project site are two-story commercial office/industrial buildings. A five-level parking structure is located adjacent to the Project site's northeastern side. The Centinela Creek Channel and State Route 90 are also located farther north of the Project site.

(d) Sensitive Uses

Some population groups, including children, elderly, and acutely and chronically ill persons (especially those with cardio-respiratory diseases), are considered more sensitive to air pollution than others. As shown in Figure IV.B-5 the closest sensitive land uses are residences south of the Project site, across Beatrice Street (approximately 25 meters from the Project site). These residences would experience the highest levels of Project emissions. While there are other sensitive receptors in the vicinity of the Project site beyond State Route 90 (Marina Freeway), they are farther from the Project site and would not represent the most conservative location of sensitive uses for the analysis below. Further, while the office building to remain at 12541 Beatrice Street may be occupied during Project construction, office uses are not sensitive uses.

SCAQMD's Localized Significance Threshold Methodology for CEQA Evaluations provides look-up tables based on distance to receptor and acreage of a project site to assist lead agencies in evaluating air quality impacts. SCAQMD's localized significance thresholds (LSTs) provides receptor distances of 25, 50, 100, 200, and 500 meters. This analysis used the 25-meter receptor distance due to the distance of the closest receptor being the residences across Beatrice Street to the south. All other existing air quality-sensitive uses are located at greater distances from the Project site and would experience lower air pollutant impacts from potential sources of pollutants from the Project site due to atmospheric dispersion effects.

(e) Existing Project Site Emissions

The Project site is currently developed with a one-story (20-foot-tall), 23,072-square-foot office building and two single-story accessory buildings comprised of 5,044 square feet and 2,144 square feet at 12575 W. Beatrice Street, and a two-story (26-foot-tall), 87,881-square-foot office building at 12541 W. Beatrice Street as well as surface parking. The Project site contains limited to sparse landscaping in the form of trees, hedges, and shrubs.



Figure IV.B-5

Air Quality Sensitive Receptors Locations

Mobile source emissions are generated by motor vehicle trips to and from the Project site. Area source emissions are generated by the use of maintenance equipment, landscape equipment, and products that contain solvents. Energy source emissions are typically associated with building natural gas usage. Table IV.B-3 below presents an estimate of the existing emissions within the Project site. Existing emissions presented in Table IV.B-3 include existing uses to remain on the Project site (12541 Beatrice Street).

Table IV.B-3
Estimated Daily Regional Operational Criteria Pollutant Emissions—Baseline^a

Emission Source	Pollutant Emissions (pounds per day)					
	VOC ^b	NO _x	CO	SO _x	PM ₁₀	PM _{2.5}
Winter						
Area	3	<1	<1	<1	<1	<1
Energy	<1	<1	<1	<1	<1	<1
Mobile	5	5	44	<1	7	2
Total Existing Emissions^a	8	6	44	<1	7	2
Summer						
Area	3	<1	5	<1	<1	<1
Energy	<1	<1	<1	<1	<1	<1
Mobile	5	5	48	<1	7	2
Total Existing Emissions^a	9	6	53	<1	7	2
<p>Numbers may not add up exactly due to rounding.</p> <p>^a The CalEEMod model printout sheets and/or calculation worksheets are presented in Appendix C (CalEEMod Output) of this Draft EIR. Operational emissions are presented for existing uses, including uses to remain on the Project site.</p> <p>^b For purposes of this analysis, VOC emissions are assumed to be equal to ROG emissions.</p> <p>Source: Eyestone Environmental, 2023.</p>						

3. Project Impacts

a. Thresholds of Significance

(1) State CEQA Guidelines Appendix G

In accordance with Appendix G of the State CEQA Guidelines, the Project would have a significant impact related to air quality if it would:

Threshold (a): Conflict with or obstruct implementation of the applicable air quality plan.

Threshold (b): Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard.

Threshold (c): Expose sensitive receptors to substantial pollutant concentrations.

Threshold (d): Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people.

For this analysis, the Appendix G Thresholds listed above are relied upon. The City's 2006 L.A. CEQA Thresholds Guide includes factors to assist in answering the Appendix G Threshold questions.

(2) 2006 L.A. CEQA Thresholds Guide

The L.A. CEQA Thresholds Guide identifies the following factors that may be relevant to preparing the air quality impacts analysis:

(a) Construction

(i) Combustion Emissions from Construction Equipment

- Type, number of pieces and usage for each type of construction equipment;
- Estimated fuel usage and type of fuel (diesel, natural gas) for each type of equipment; and
- Emission factors for each type of equipment.

(ii) Fugitive Dust—Grading, Excavation and Hauling

- Amount of soil to be disturbed on-site or moved off-site;
- Emission factors for disturbed soil;
- Duration of grading, excavation and hauling activities;
- Type and number of pieces of equipment to be used; and
- Projected haul route.

(iii) Fugitive Dust—Heavy-Duty Equipment Travel on Unpaved Road

- Length and type of road;
- Type, number of pieces, weight and usage of equipment; and

- Type of soil.

(iv) Other Mobile Source Emissions

- Number and average length of construction worker trips to Project Site, per day; and
- Duration of construction activities.

(b) Operation

- Operational emissions exceed 10 tons per year of volatile organic gases or any of the daily thresholds presented below (as reprinted from the CEQA Air Quality Handbook):

Pollutant	Significance Threshold (lbs/day)
ROG	55
NO _x	55
CO	550
PM ₁₀	150
SO _x	150

- Either of the following conditions would occur at an intersection or roadway within one-quarter mile of a sensitive receptor:
 - The proposed project causes or contributes to an exceedance of the California 1-hour or 8-hour CO standards of 20 or 9.0 parts per million (ppm), respectively; or
 - The incremental increase due to the project is equal to or greater than 1.0 ppm for the California 1-hour CO standard, or 0.45 ppm for the 8-hour CO standard.

(c) Toxic Air Contaminants

The determination of significance shall be made on a case-by-case basis, considering the following factors:

- The regulatory framework for the toxic material(s) and process(es) involved;
- The proximity of the TACs to sensitive receptors;
- The quantity, volume and toxicity of the contaminants expected to be emitted;

- The likelihood and potential level of exposure; and

The degree to which project design will reduce the risk of exposure.

(3) SCAQMD's CEQA Air Quality Handbook

To assist in answering the Appendix G Threshold questions and factors identified in the City's 2006 *L.A. CEQA Thresholds Guide* for purposes of this analysis, the City utilizes the thresholds of significance in SCAQMD's *CEQA Air Quality Handbook, Chapter 6*, as identified below, to assess the significance of the Project's estimated air quality impacts. Specifically, Table IV.B-4 on page IV.B-37 shows SCAQMD's currently recommended significance thresholds, which provide numerical thresholds for evaluating the significance of a project's estimated air quality emissions.

(a) Construction

Based on the criteria set forth in SCAQMD's *CEQA Air Quality Handbook*,⁴⁰ the Project would have a significant impact with regard to construction emissions if any of the following would occur:

- Regional emissions from both direct and indirect sources would exceed any of the SCAQMD prescribed threshold levels identified in Table IV.B-4.
- Maximum on-site daily localized emissions exceed the Localized Significance Thresholds (LST), resulting in predicted ambient concentrations in the vicinity of the Project site greater than the most stringent ambient air quality standards for CO (20 ppm [23,000 $\mu\text{g}/\text{m}^3$] over a 1-hour period or 9.0 ppm [10,350 $\mu\text{g}/\text{m}^3$] averaged over an 8-hour period) and NO₂ (0.18 ppm [338.4 $\mu\text{g}/\text{m}^3$] over a 1-hour period, 0.1 ppm [188 $\mu\text{g}/\text{m}^3$] over a three-year average of the 98th percentile of the daily maximum 1-hour average, or 0.03 ppm [56.4 $\mu\text{g}/\text{m}^3$] averaged over an annual period).
- Maximum on-site localized PM₁₀ or PM_{2.5} emissions during construction exceed the applicable LSTs, resulting in predicted ambient concentrations in the vicinity of the Project site to exceed the incremental 24-hr threshold of 10.4 $\mu\text{g}/\text{m}^3$ or 1.0 $\mu\text{g}/\text{m}^3$ PM₁₀ averaged over an annual period.

⁴⁰ SCAQMD, *CEQA Air Quality Handbook*, 1993.

**Table IV.B-4
SCAQMD Air Quality Significance Thresholds**

Mass Daily Thresholds^a		
Pollutant	Construction^b	Operation
NO _x	100 lbs/day	55 lbs/day
VOC ^d	75 lbs/day	55 lbs/day
PM ₁₀	150 lbs/day	150 lbs/day
PM _{2.5}	55 lbs/day	55 lbs/day
SO _x	150 lbs/day	150 lbs/day
CO	550 lbs/day	550 lbs/day
Lead ^e	3 lbs/day	3 lbs/day
Toxic Air Contaminants (TACs) and Odor Thresholds		
TACs (including carcinogens and non-carcinogens)	Maximum Incremental Cancer Risk \geq 10 in 1 million Cancer Burden > 0.5 excess cancer cases (in areas \geq 1 in 1 million) Chronic & Acute Hazard Index \geq 1.0 (project increment)	
Odor	Project creates an odor nuisance pursuant to SCAQMD Rule 402	
Ambient Air Quality Standards for Criteria Pollutants^c		
NO₂ 1-hour average Annual Arithmetic Mean	SCAQMD is in attainment; project is significant if it causes or contributes to an exceedance of the following attainment standards: 0.18 ppm (state) 0.03 ppm (state) and 0.0534 ppm (federal)	
PM₁₀ 24-hour average Annual Average	10.4 $\mu\text{g}/\text{m}^3$ (construction) ^d & 2.5 $\mu\text{g}/\text{m}^3$ (operation) 1.0 $\mu\text{g}/\text{m}^3$	
PM_{2.5} 24-hour average	10.4 $\mu\text{g}/\text{m}^3$ (construction) & 2.5 $\mu\text{g}/\text{m}^3$ (operation)	
SO₂ 1-hour average 24-hour average	0.25 ppm (state) & 0.075 ppm (federal—99th percentile) 0.04 ppm (state)	
Sulfate 24-hour average	25 $\mu\text{g}/\text{m}^3$ (state)	
CO 1-hour average 8-hour average	SCAQMD is in attainment; project is significant if it causes or contributes to an exceedance of the following attainment standards: 20 ppm (state) and 35 ppm (federal) 9.0 ppm (state/federal)	
Lead^e 30-day average Rolling 3-month average	1.5 $\mu\text{g}/\text{m}^3$ (state) 0.15 $\mu\text{g}/\text{m}^3$ (federal)	
<p><i>lbs/day = pounds per day</i></p> <p>^a SCAQMD CEQA Handbook (SCAQMD, 1993), Pages 6-2 and 6-3.</p> <p>^b Construction thresholds apply to both the South Coast Air Basin and Coachella Valley (Salton Sea and Mojave Desert Air Basins).</p> <p>^c Ambient air quality thresholds for criteria pollutants are based on SCAQMD Rule 1303, Table A-2 unless otherwise stated.</p>		

Table IV.B-4 (Continued)
SCAQMD Air Quality Significance Thresholds

^d Ambient air quality threshold is based on SCAQMD Rule 403.

^e While the South Coast Air Quality Management District CEQA Air Quality Handbook contains significance thresholds for lead, Project construction and operation would not include sources of lead emissions and would not exceed the significance thresholds for lead. Unleaded fuel and unleaded paints have virtually eliminated lead emissions from commercial land use projects such as the Project. As a result, lead emissions are not further evaluated in this Draft EIR.

Source: South Coast Air Quality Management District, 2019.

(b) Operation

Based on the criteria set forth in SCAQMD's CEQA Air Quality Handbook,⁴¹ the Project would have a significant impact with regard to operational emissions if any of the following would occur:

- Regional emissions from both direct and indirect sources exceed any of the SCAQMD prescribed threshold levels identified in Table IV.B-4 on page IV.B-37.
- Maximum on-site daily localized emissions exceed the LSTs, resulting in predicted ambient concentrations in the vicinity of the Project site greater than the most stringent ambient air quality standards for CO (20 parts per million (ppm) over a 1-hour period or 9.0 ppm averaged over an 8-hour period) and NO₂ (0.18 ppm over a 1-hour period, 0.1 ppm over a 3-year average of the 98th percentile of the daily maximum 1-hour average, or 0.03 ppm averaged over an annual period).⁴²
- Maximum on-site localized operational PM₁₀ and PM_{2.5} emissions exceed the incremental 24-hr threshold of 2.5 µg/m³ or 1.0 µg/m³ PM₁₀ averaged over an annual period.⁴³
- The Project causes or contributes to an exceedance of the California 1-hour or 8-hour CO standards of 20 or 9.0 ppm, respectively; or
- The Project creates an odor nuisance pursuant to SCAQMD Rule 402 (i.e., objectionable odor at the nearest sensitive receptor).

⁴¹ SCAQMD, *CEQA Air Quality Handbook*, 1993.

⁴² SCAQMD, *LST Methodology*.

⁴³ SCAQMD, *Final-Methodology to Calculate Particulate Matter (PM) 2.5 and PM_{2.5} Significance Thresholds*, October 2006.

(c) Toxic Air Contaminants

Based on the criteria set forth in the SCAQMD's CEQA Air Quality Handbook, the Project would have a significant TAC impact, if:⁴⁴

- The Project emits carcinogenic or TACs that exceed the maximum incremental cancer risk as provided in Table IV.B-4 on page IV.B-37.

In assessing impacts related to TACs in this section, the City will use Appendix G as the thresholds of significance. The criteria identified above from the L.A. CEQA Thresholds Guide will be used where applicable and relevant to assist in analyzing the Appendix G thresholds. In addition, the following criteria set forth in SCAQMD's CEQA Air Quality Handbook serve as quantitative air quality standards to be used to evaluate project impacts under Appendix G thresholds:

- The project results in the exposure of sensitive receptors to carcinogenic or toxic air contaminants that exceed the maximum incremental cancer risk of 10 in one million or an acute or chronic hazard index of 1.0.⁴⁵ For projects with a maximum incremental cancer risk between 1 in one million and 10 in one million, a project would result in a significant impact if the cancer burden exceeds 0.5 excess cancer cases.

(d) Consistency with Applicable Air Quality Plans

Section 15125 of the State CEQA Guidelines requires an analysis of project consistency with applicable governmental plans and policies. In accordance with the SCAQMD's CEQA Air Quality Handbook,⁴⁶ the following criteria were used to evaluate the Project's consistency with the SCAQMD and SCAG regional plans and policies, including the AQMP:

- Criterion 1: Will the Project result in any of the following:
 - An increase in the frequency or severity of existing air quality violations;
 - Cause or contribute to new air quality violations; or

⁴⁴ SCAQMD, *CEQA Air Quality Handbook*, Chapter 6 (Determining the Air Quality Significance of a project) and Chapter 10 (Assessing Toxic Air Pollutants), 1993.

⁴⁵ The hazard index is the ratio of a toxic air contaminant's concentration divided by its Reference Concentration, or safe exposure level. If the hazard index exceeds one, people are exposed to levels of TACs that may pose noncancer health risks.

⁴⁶ SCAQMD, *CEQA Air Quality Handbook*, Chapter 12, Assessing Consistency with Applicable Regional Plans, 1993.

- Delay timely attainment of air quality standards or the interim emission reductions specified in the AQMP?
- Criterion 2: Will the Project exceed the assumptions utilized in preparing the AQMP?
 - Is the Project consistent with the population and employment growth projections upon which AQMP forecasted emission levels are based;
 - Does the Project include air quality mitigation measures; or
 - To what extent is Project development consistent with the AQMP control measures?

In addition, the Project's consistency with the General Plan's Air Quality Element is discussed.

(e) Cumulative Impacts

Based on SCAQMD guidance, individual construction projects that exceed SCAQMD's recommended daily thresholds for project-specific impacts would also cause a cumulatively considerable increase in emissions for those pollutants for which the Air Basin is in non-attainment.⁴⁷ As discussed in SCAQMD's White Paper on Potential Control Strategies to Address Cumulative Impacts From Air Pollution (August 2003):

As Lead Agency, the AQMD uses the same significance thresholds for project specific and cumulative impacts for all environmental topics analyzed in an Environmental Assessment or EIR. ... Projects that exceed the project-specific significance thresholds are considered by the SCAQMD to be cumulatively considerable. This is the reason project-specific and cumulative significance thresholds are the same. Conversely, projects that do not exceed the project-specific thresholds are generally not considered to be cumulatively significant.⁴⁸

The cumulative analysis of air quality impacts within this Draft EIR follows SCAQMD's guidance such that construction or operational Project emissions will be considered cumulatively considerable if Project-specific emissions exceed an applicable SCAQMD recommended significance threshold.

⁴⁷ Wong, Jillian, SCAQMD CEQA Specialist, personal communication, August 8, 2016.

⁴⁸ White Paper on Potential Control Strategies to Address Cumulative Impacts from Air Pollution. Appendix D, South Coast Air Quality Management District, August 2003.

b. Methodology

SCAQMD published the CEQA Air Quality Handbook in November 1993 to assist lead agencies, as well as consultants, project proponents, and other interested parties, in evaluating potential air quality impacts of projects proposed in the Air Basin. The CEQA Air Quality Handbook provides standards, methodologies, and procedures for conducting air quality analyses in EIRs and was used extensively in the preparation of this analysis. SCAQMD is currently in the process of replacing the CEQA Air Quality Handbook with the Air Quality Analysis Guidance Handbook.⁴⁹

Supplemental guidance/information to assist lead agencies is provided on the SCAQMD website (www.aqmd.gov/ceqa/hdbk.html) and includes: (1) Emission FACTor model (EMFAC) on-road vehicle emission factors; (2) background CO concentrations; (3) localized significance thresholds; (4) mitigation measures and control efficiencies; (5) mobile source toxics analysis; (6) off-road mobile source emission factors; (7) PM_{2.5} significance thresholds and calculation methodology; and (8) updated SCAQMD Air Quality Significance Thresholds. SCAQMD also recommends using approved models to calculate emissions from land use projects, such as the California Emissions Estimator Model (CalEEMod). These recommendations were followed in the preparation of this analysis.

SCAQMD has also adopted land use planning guidelines in the Guidance Document for Addressing Air Quality Issues in General Plans and Local Planning, which considers impacts to sensitive receptors from facilities that emit TAC emissions.⁵⁰ SCAQMD's siting distance recommendations are the same as those provided by CARB (e.g., a 500-foot siting distance for sensitive land uses proposed in proximity of freeways and high-traffic roads, and the same siting criteria for distribution centers and dry cleaning facilities). SCAQMD's document introduces land use-related policies that rely on design and distance parameters to minimize emissions and lower potential health risk. SCAQMD's guidelines are voluntary initiatives recommended for consideration by local planning agencies.

This analysis focuses on the potential change in the air quality environment due to implementation of the Project. The existing 87,881-square-foot building located at 12541 Beatrice Street would remain unchanged as part of the Project operation with no additional area or increased employee population. Thus, there are no construction emissions associated with this building or any new emissions associated with this building during Project operation. Air pollutant emissions would result from both construction and

⁴⁹ SCAQMD, *Air Quality Analysis Handbook*, www.aqmd.gov/home/regulations/ceqa/air-quality-analysis-handbook, accessed September 29, 2023.

⁵⁰ SCAQMD, *Guidance Document for Addressing Air Quality Issues in General Plans and Local Planning*, May 6, 2005.

operation of the Project. Specific methodologies used to evaluate these emissions are discussed below.

(1) Construction Emissions Methodology

Construction of the Project has the potential to generate temporary pollutant emissions through the use of heavy-duty demolition and construction equipment, such as dozers, excavators and cranes, and through vehicle trips generated from workers and haul and delivery trucks traveling to and from the Project site. In addition, fugitive dust emissions would result from demolition and various soil-handling activities, such as excavation, grading and shoring. Mobile source emissions, primarily NO_x, would result from the use of construction equipment. Construction emissions can vary substantially from day to day, depending on the level of activity, the specific type of construction activity, and prevailing weather conditions. The assessment of construction air quality impacts considers each of these potential sources.

(a) Regional Emissions

The Project's "regional" emissions refer to emissions that will be evaluated based on regional significance thresholds established by SCAQMD, as discussed above. Daily regional emissions during construction are estimated by assuming a conservative estimate of construction activities (i.e., assuming all construction occurs at the earliest feasible date) and applying mobile source and fugitive dust emissions factors. The emissions are estimated using CalEEMod (Version 2022.1) software, an emissions inventory software program recommended by SCAQMD. The CalEEMod model was developed for the California Air Pollution Control Officers Association (CAPCOA) in collaboration with SCAQMD, received input from other California air districts, and is currently used by numerous lead agencies in the Los Angeles area and within the state for quantifying the emissions associated with development projects undergoing environmental review, including by the City.

CalEEMod is based on outputs from Off-road Emissions Inventory Program model⁵¹ (OFFROAD) and EMFAC,⁵² which are emissions estimation models developed by CARB, and used to calculate emissions from construction activities, including off- and on-road vehicles, respectively. CalEEMod also relies upon known emissions data associated with certain activities or equipment (often referred to as "default" data, values or factors) that can be used if site-specific information is not available. CalEEMod contains default values

⁵¹ CARB, *MSEI, Documentation, Off-Road, Diesel Equipment*, ww2.arb.ca.gov/our-work/programs/mobile-source-emissions-inventory/road-documentation/msei-documentation-road, accessed October 3, 2023.

⁵² CARB, *EMFAC 2021*, <https://arb.ca.gov/emfac/>, accessed October 3, 2023.

to use in each specific local air district region. Default values within CalEEMod were obtained from a survey of construction sites conducted by SCAQMD. The construction survey data was used to determine appropriate construction equipment based on lot size and project type.⁵³ Appropriate statewide default values can be used, if regional default values are not defined.

The input values used in this analysis were adjusted to be Project-specific based on equipment types and the construction schedule. These values were then applied to the construction phasing assumptions used in the criteria pollutant analysis to generate criteria pollutant emissions values for each construction activity. Construction tasks were aggregated to reflect overlapping tasks and identify the reasonably expected maximum construction emissions occurring over the course of Project construction. To be conservative, this analysis evaluates the Project's air quality impacts during construction based on reasonably expected maximum construction emissions even though such emissions would not occur throughout the entire construction phase. Detailed equipment lists, construction scheduling, and emissions calculations are provided in Appendix C of this Draft EIR.

(b) Localized Emissions

The localized effects from the on-site portion of daily construction emissions were evaluated at sensitive receptor locations potentially impacted by the Project according to SCAQMD's LST methodology, which uses on-site mass emissions rate look-up tables and Project-specific modeling, where appropriate, to assess whether the Project's local emissions would exceed SCAQMD's significance thresholds, as described above.⁵⁴ SCAQMD provides LSTs applicable to the following criteria pollutants: NO_x; CO; PM₁₀; and PM_{2.5}.⁵⁵ SCAQMD does not provide a LST for SO₂, Pb, and H₂S since on-site activities during construction and operation of land use development projects do not include activities that emit high levels of these pollutants. Since VOCs are not a criteria pollutant, there is no ambient standard or SCAQMD LST for VOCs. Due to the role VOCs play in O₃ formation, it is classified as a precursor pollutant, and only a regional emissions threshold has been established.

LSTs represent the maximum emissions from a project that are not expected to cause or contribute to an exceedance of the most stringent applicable federal or State ambient air quality standards and are developed based on the ambient concentrations of

⁵³ CAPCOA, *California Emissions Estimator Model, Appendix E1: Construction Survey and SCAQMD, May 2021*.

⁵⁴ SCAQMD, *LST Methodology Appendix C-Mass Rate LST Look-Up Table, October 2009*.

⁵⁵ SCAQMD, *LST Methodology, p. 1-4*.

that pollutant for each source receptor area and distance to the nearest sensitive receptor. These ambient air quality standards were established at levels that provide public health protection and allow adequate margin of safety, including protecting the health of sensitive populations such as asthmatics, children, and the elderly. SCAQMD developed mass rate look-up tables for each source receptor area and to determine whether or not a project may generate significant adverse localized air quality impacts. SCAQMD provides LST mass rate look-up tables for projects with active construction areas that are less than or equal to 5 acres (1 acre, 2 acres, and 5 acres). For projects in between these acreages, SCAQMD recommends use of the smaller acreage as a conservative estimate of impacts. As an example, the 2.37-acre Project Area should use the 2-acre look-up table. If the Project exceeds the LST look-up values, then SCAQMD recommends that Project-specific air quality modeling be performed to determine if the Project's local emissions exceed applicable significance thresholds. As the LST is based on distance from the Project site to the closest sensitive receptor, impacts to other sensitive receptors farther away from the Project would be lower than the closest receptor.

(2) Operation Emissions Methodology

(a) Regional Emissions

Analysis of the Project's impact on regional air quality during long-term Project operations (i.e., after construction is complete) takes into consideration four types of sources: (1) area; (2) energy; (3) mobile; and (4) stationary. Area source emissions are generated by, among other things, landscape equipment and the use of consumer products. Energy source emissions are generated as a result of activities in buildings for which natural gas is used (e.g., natural gas for heat or cooking). Mobile source emissions are generated by the increase in motor vehicle trips to and from the Project site associated with operation of the Project. Stationary source emissions are generated from proposed emergency generators during routine maintenance/testing.

Criteria pollutants are also emitted during the generation of electricity at fossil fuel power plants. When electricity is used in buildings, the electricity generation typically takes place at offsite power plants, the majority of which burn fossil fuels. Because power plants are existing stationary sources permitted by air districts and/or the USEPA, criteria pollutant emissions are generally associated with the power plants themselves, and not individual buildings or electricity users. Additionally, criteria pollutant emissions from power plants are subject to local, state, and federal control measures, which can be considered to be the maximum feasible level of mitigation for stack emissions. CalEEMod therefore does not calculate criteria pollutant emissions from regional power plants associated with building electricity use.

Similar to construction, SCAQMD's CalEEMod model was used to estimate Project emissions during operation. Mobile-source emissions were calculated within CalEEMod. However, CalEEMod default VMT was bypassed to account for the Project-related VMT provided using the Los Angeles Department of Transportation (LADOT) VMT Calculator. The VMT Calculator was developed by the City and LADOT to comply with SB 743, which requires lead agencies to adopt VMT criteria to determine transportation related impacts. The Project's VMT data is provided in the Transportation Assessment prepared for the Project.⁵⁶ CalEEMod then converts EMFAC emission rates into CalEEMod vehicle emission factors.⁵⁷ Area source emissions are based on natural gas (building heating and water heaters), landscaping equipment, and consumer product usage (including paints) rates provided in CalEEMod. Natural gas usage factors in CalEEMod are based on the California Energy Commission California Commercial End Use Survey data set, which provides energy demand by building type and climate zone. Emissions associated with use of emergency generators were calculated using CalEEMod, in which emission factors are based on Table 3.4-1 (Gaseous Emission Factors for Large Stationary Diesel Engines) from USEPA's AP-42: Compilation of Air Pollutant Emission Factors. The emissions are based on the horsepower rating of the diesel generator and the number of hours operated per year for testing purposes.

To determine if a significant air quality impact would occur, the net increase in regional operational emissions generated by the Project was compared against SCAQMD's significance thresholds.⁵⁸ To be conservative, this analysis evaluates the Project's air quality impacts during operations based on reasonably expected maximum operational emissions even though such emissions would not occur throughout the entire operational phase. Refer to Appendix C of this Draft EIR for additional information regarding methodology.

(b) Localized Emissions

(i) On-Site Emissions

Localized impacts from Project operations include calculation of on-site emissions (e.g., combustion from natural gas usage) using SCAQMD's recommended CalEEMod and

⁵⁶ Linscott Law & Greenspan, *Transportation Analysis Addendum for the New Beatrice West Project*, September 2022. Included as Appendix C of this Draft EIR.

⁵⁷ CAPCOA, *California Emissions Estimator Model, Appendix C: Emissions Calculation Details for CalEEMod*, April 2022.

⁵⁸ SCAQMD, *SCAQMD Air Quality Significance Thresholds*, revised March 2023. SCAQMD based these thresholds, in part, on the federal Clean Air Act and, to enable defining "significant" for CEQA purposes, defined the setting as the South Coast Air Basin. (See SCAQMD, *CEQA Air Quality Handbook*, April 1993, pp. 6-1–6-2.)

evaluation of these emissions consistent with SCAQMD's LST methodology discussed above.

(ii) Off-Site Emissions

Potential localized CO concentrations from induced traffic at nearby intersections are addressed consistent with the methodologies and assumptions used in the consistency analysis provided in the 2003 AQMP.⁵⁹

It has long been recognized that CO exceedances are caused by vehicular emissions,⁶⁰ primarily when idling at intersections.^{61,62} Accordingly, vehicle emissions standards have become increasingly more stringent. Before the first vehicle emission regulations, cars in the 1950s were typically emitting about 87 grams of CO per mile.⁶³ Since the first regulation of CO emissions from vehicles (model year 1966) in California, vehicle emissions standards for CO applicable to light duty vehicles have decreased by 96 percent for automobiles,^{64,65} and new cold weather CO standards have been implemented, effective for the 1996 model year.⁶⁶ Currently, the CO standard in California is a maximum of 3.4 grams/mile for passenger cars (with provisions for certain cars to emit even less).⁶⁷ With the turnover of older vehicles, introduction of cleaner fuels and implementation of control technology on industrial facilities, CO concentrations in the Air Basin have steadily declined.

The analysis prepared for CO attainment in the Air Basin by SCAQMD can be used to assist in evaluating the potential for CO exceedances in the Air Basin. CO attainment was thoroughly analyzed as part of SCAQMD's 2003 AQMP and the 1992

⁵⁹ *The latest CO hotspots modeling and attainment demonstration was performed as part of the 2003 AQMP. Results of the attainment demonstration were eventually incorporated into the redesignation request and approved by the USEPA.*

⁶⁰ *USEPA, Air Quality Criteria for Carbon Monoxide. EPA 600/P-099/001F, 2000.*

⁶¹ *SCAQMD, CEQA Air Quality Handbook, Section 4.5, 1993.*

⁶² *SCAQMD, Air Quality Management Plan, 2003.*

⁶³ *USEPA, Milestone in Auto Emissions Control, August 1994.*

⁶⁴ *National Academy Board on Energy and Environmental Systems, Review of the 21st Century Truck Partnership, 2008, Appendix D: Vehicle Emission Regulations [excerpt from http://books.nap.edu/openbook.php?record_id=12258&page=107].*

⁶⁵ *Kavanagh, Jason, Untangling U.S. Vehicle Emissions Regulations, 2008.*

⁶⁶ *Title 13, California Code of Regulations, Section 1960.1(f)(2) [for 50,000 mile half-life].*

⁶⁷ *CARB, California Exhaust Emission Standards and Test Procedures for 2001 and Subsequent Model Passenger Cars, Light-duty Trucks, and Medium-duty Vehicles, amended September 27, 2010.*

Federal Attainment Plan for Carbon Monoxide (1992 CO Plan).⁶⁸ As discussed in the 1992 CO Plan, peak carbon monoxide concentrations in the Air Basin are due to unusual meteorological and topographical conditions, and not due to the impact of particular intersections. Considering the region's unique meteorological conditions and the increasingly stringent CO emissions standards, CO modeling was performed as part of the 1992 CO Plan and subsequent plan updates and air quality management plans.

In the 1992 CO Plan, a CO hot spot analysis was conducted for the four worst-case scenario intersections in Los Angeles at the peak morning and afternoon time periods. The busiest intersection evaluated was that at Wilshire Boulevard and Veteran Avenue, which had a daily traffic volume of approximately 100,000 vehicles per day. The 2003 AQMP estimated that the 1-hour concentration for this intersection was 4.6 ppm, which indicates that the most stringent 1-hour CO standard (20.0 ppm) would likely not be exceeded until the daily traffic at the intersection exceeded more than 400,000 vehicles per day.⁶⁹ The Los Angeles County Metropolitan Transportation Authority (Metro) evaluated the level of service (LOS) in the vicinity of the Wilshire Boulevard and Veteran Avenue intersection and found it to be Level E at peak morning traffic and Level F at peak afternoon traffic.^{70,71} As an initial screening step, if a project intersection does not exceed 400,000 vehicles per day, then the project does not need to prepare a detailed CO hot spot analysis. If a project would potentially result in a CO hotspot based on the initial screening, detailed modeling may be performed using California LINE Source Dispersion Model, version 4 (CALINE4), which is a model used to assess air quality impacts near transportation facilities (i.e., roadways, intersections, street canyons, and parking facilities).

(3) Toxic Air Contaminants Impacts (Construction and Operations)

Potential TAC impacts are evaluated by conducting a qualitative analysis consistent with CARB's Air Quality and Land Use Handbook: A Community Health Perspective (CARB's Handbook), which provides recommendations regarding the siting of new sensitive land uses near potential sources of air toxic emissions (e.g., freeways, distribution centers, rail yards, ports, refineries, chrome plating facilities, dry cleaners, and gasoline dispensing facilities).⁷² SCAQMD adopted similar recommendations in its Guidance

⁶⁸ SCAQMD, *Federal Attainment Plan for Carbon Monoxide, 1992*.

⁶⁹ Based on the ratio of the CO standard (20.0 ppm) and the modeled value (4.6 ppm).

⁷⁰ Metro measured traffic volumes and calculated the LOS for the intersection of Wilshire Boulevard/ Sepulveda Boulevard, which is a block west along Wilshire Boulevard, still east of Interstate 405.

⁷¹ Metro, *Congestion Management Program for Los Angeles County, 2004, Exhibit 2-6 and Appendix A*.

⁷² CARB, *Air Quality and Land Use Handbook, a Community Health Perspective, April 2005*.

Document for Addressing Air Quality Issues in General Plans and Local Planning.⁷³ Given that Page 2-3 of the SCAQMD guidance states that “the potential for public health impacts remains unchanged when siting sensitive receptors near a pollution source or a pollution source near a sensitive receptor,” the City as Lead Agency has elected to use the siting distances in Table 1-1 of the CARB Handbook for evaluating health risk impacts from both TAC sources and sensitive uses. The qualitative analysis consists of reviewing the Project to identify any new or modified TAC emissions sources and evaluating the potential for such sources to cause significant TAC impacts. If the qualitative evaluation does not rule out significant impacts from a new source, or modification of an existing TAC emissions source, a more detailed analysis is conducted. For the detailed analysis, downwind sensitive receptor locations are identified, and site-specific dispersion modeling is conducted to estimate Project impacts.

c. Project Design Features

The following project design features consist of best practices and design preferences included in the Project description.

Project Design Feature AIR-PDF-1: Where power poles are available, electricity from power poles and/or solar powered generators rather than temporary diesel or gasoline generators would be used during construction.

It is noted that Project Design Feature AIR-PDF-1 was not accounted for in the construction emissions analysis below, and, thus, the analysis is conservative, because the use of diesel generators is accounted for in this analysis. In addition, the Project would incorporate additional project design features to support and promote environmental sustainability as discussed under Section IV.F, Greenhouse Gas Emissions, of this Draft EIR. Such project design features include Project Design Feature GHG-PDF-1, which would incorporate increased energy efficiency and sustainability features. While these features are designed primarily to reduce greenhouse gas emissions (GHG), they would also serve to reduce criteria air pollutants discussed herein and were accounted for in the emissions analysis.

d. Analysis of Project Impacts

Threshold (a): Conflict with or obstruct implementation of the applicable air quality plan.

⁷³ SCAQMD, *Guidance Document for Addressing Air Quality Issues in General Plans and Local Planning*, May 6, 2005.

(1) Impact Analysis

(a) SCAQMD CEQA Air Quality Handbook Policy Analysis

To assess whether the Project would conflict with or obstruct implementation of an applicable air quality plan, this analysis evaluates the Project's consistency with SCAQMD's AQMP and SCAG's RTP/SCS. In accordance with SCAQMD's CEQA Air Quality Handbook, Chapter 12, the following criteria are considered as part of this evaluation:

- Criterion 1: Would the project result in any of the following:
 - An increase in the frequency or severity of existing air quality violations;
 - Cause or contribute to new air quality violations; or
 - Delay timely attainment of air quality standards or the interim emission reductions specified in the AQMP.
- Criterion 2: Would the project exceed the assumptions utilized in preparing the AQMP?
 - Is the Project consistent with the population and employment growth projections upon which AQMP forecasted emission levels are based;
 - Does the Project include air quality mitigation measures; or
 - To what extent is Project development consistent with the AQMP control measures?

(i) Criterion 1

The Project is an infill mixed-use development, which is currently served by many local and regional bus lines via stops within walking distance along Jefferson Boulevard approximately 750 feet from the Project site. Public transit service in the Project study area is currently provided by the Los Angeles County Metropolitan Transportation Authority (Metro). The bus lines include Metro Local Lines 108 and 110, Commuter Express 437B, Culver City Bus Line 4, and City of Santa Monica Big Blue Bus 14. The Project would concentrate *196,100 square feet of new office space with 3,400 square feet of ground floor commercial space* within a SCAG-designated High Quality Transit Area (HQTA).⁷⁴ As a

⁷⁴ SCAG, *High Quality Transit Areas (HQTA) 2045—SCAG Region*, <https://gisdata-scag.opendata.arcgis.com/datasets/SCAG::high-quality-transit-areas-hqta-2045-scag-region/explore?location=33.978737%2C-118.413571%2C16.10>, accessed January 6, 2022.

result, the Project would advance regional goals to reduce VMT through infill development near transit services that has the co-benefit of reducing air emissions compared to the average regional project. As shown below, the Project would not exceed any SCAQMD localized significance thresholds for air quality emissions.

With respect to the first criterion, as discussed below, localized concentrations of NO₂ as NO_x, CO, PM₁₀, and PM_{2.5} have been analyzed for the Project. Due to California Low Sulfur Diesel Fuel requirements, calculations shown below demonstrate that SO₂ emissions would be negligible during construction and long-term operations, and, therefore, would not have the potential to cause or affect a violation of the SO₂ ambient air quality standard.⁷⁵ Since VOCs are not a criteria pollutant, there is no ambient standard or localized threshold for VOCs. Due to the role VOCs play in O₃ formation, it is classified as a precursor pollutant and only a regional emissions threshold has been established.

The Project's maximum potential NO_x, CO, PM₁₀, and PM_{2.5} daily emissions during construction were analyzed to ascertain potential effects on localized concentrations and to determine if there is a potential for such emissions to cause or affect a violation of an applicable ambient air quality standard. As shown in Table IV.B-8 on page IV.B-64 in the analysis below, localized NO₂ as NO_x, CO, PM₁₀, and PM_{2.5} would not exceed the SCAQMD-recommended localized significance thresholds. Therefore, Project construction would not result in a significant impact with regard to localized air quality.

Because the Project would not introduce any substantial stationary sources of emissions, CO is the preferred benchmark pollutant for assessing local area air quality impacts from post-construction motor vehicle operations.⁷⁶ As discussed below, no intersections would require a CO hotspot analysis, and impacts would be less than significant. Therefore, the Project would not increase the frequency or severity of an existing CO violation or cause or contribute to new CO violations.

An analysis of potential localized operational impacts from on-site activities was also conducted. As shown in Table IV.B-9 on page IV.B-67 in the analysis below, localized NO₂ as NO_x, CO, PM₁₀, and PM_{2.5} operational impacts would be less than significant. Therefore, the Project would also not delay timely attainment of air quality standards or interim emission reductions specified in the AQMP.

⁷⁵ CalEEMod outputs provided in Appendix C show that SO₂ emissions during Project construction and operations activities would be less than one pound per day, which is also less than one percent of the SCAQMD regional significance threshold. As a result, the Project's SO₂ emissions would not likely result in a localized air quality impact.

⁷⁶ SCAQMD, CEQA Air Quality Handbook, Chapter 12, Assessing Consistency with Applicable Regional Plans, 1993.

(ii) Criterion 2

With respect to the second criterion for determining consistency with AQMP growth assumptions, the projections in the AQMP for achieving air quality goals are based on assumptions in SCAG's 2016–2040 RTP/SCS regarding population, housing, and growth trends. Determining whether or not a project exceeds the assumptions reflected in the AQMP involves the evaluation of three criteria: (1) consistency with applicable population, housing, and employment growth projections; (2) project mitigation measures; and (3) appropriate incorporation of AQMP land use planning strategies. The following discussion provides an analysis with respect to each of these three criteria.

- Is the project consistent with the population, housing, and employment growth projections upon which AQMP forecasted emission levels are based?

A project is consistent with the 2016 and 2022 AQMPs, in part, if it is consistent with the population, housing, and employment assumptions that were used in the development of the AQMP. In the case of the 2016 and 2022 AQMPs, two sources of data form the basis for the projections of air pollutant emissions: the City of Los Angeles General Plan and SCAG's 2016–2020 and 2020–2045 RTP/SCS.

As described in Section IV.H, Land Use and Planning, of this Draft EIR, the City's General Plan serves as a comprehensive, long-term plan for future development of the City. Refer to Subsection IV.B.3.d.(1)(b), City of Los Angeles Policies, below, for a discussion of the Project's consistency with applicable goals, objectives and policies of the City's General Plan Air Quality Element. The 2016–2040 and 2020–2045 RTP/SCS provides socioeconomic forecast projections of regional employment growth. The employment forecasts, which are adopted by SCAG's Regional Council, are based on the local plans and policies applicable to the specific area; these are used by SCAG in all phases of implementation and review.

The Project would generate short-term construction jobs, but these jobs would not necessarily bring new construction workers or their families into the region since construction workers are typically drawn from an existing regional pool of construction workers who travel among construction sites within the region as individual projects are completed and are not typically brought from other regions to work on developments such as the Project. Moreover, these jobs would be relatively small in number and temporary in nature. Therefore, the Project's construction jobs would not conflict with the long-term employment or population projections upon which the 2016 AQMP and the 2022 AQMP are based.

As discussed in the Initial Study included as Appendix A of this Draft EIR, development of the Project would result in approximately 670 new employees at 12575

Beatrice Street. According to the 2016–2040 RTP/SCS, the employment forecast for the City of Los Angeles Subregion in 2020 is approximately 1,831,457 employees.⁷⁷ In 2025, the projected occupancy year of the Project, the City of Los Angeles Subregion is anticipated to have approximately 1,915,868 employees.⁷⁸ Thus, the Project’s net increase of approximately 670 new employees would constitute approximately 0.79 percent of the employment growth forecasted between 2020 (baseline) and 2025 (buildout) by the 2016–2040 RTP/SCS.⁷⁹ Accordingly, the Project’s generation of employees would be consistent with the employment projections contained in the 2016–2040 RTP/SCS. Because 2016–2040 RTP/SCS projections form the basis of the 2016 AQMP, the Project would be consistent with the projections in the 2016 AQMP.

As discussed in the Initial Study included as Appendix A of this Draft EIR, development of the Project would result in approximately 670 new employees at 12575 Beatrice Street. According to SCAG’s 2020–2045 RTP/SCS, the employment forecast for the City of Los Angeles Subregion in 2020 is approximately 1,887,969 employees.⁸⁰ In 2025, the projected occupancy year of the Project, the City of Los Angeles Subregion is anticipated to have approximately 1,937,555 employees.⁸¹ Therefore, the projected employment growth in the City between 2020 and 2025 based on SCAG’s 2020–2045 RTP/SCS is approximately 49,586 employees. Thus, the Project’s estimated 670 new employees would constitute approximately 1.4 percent of the employment growth forecasted between 2020 and 2025. Accordingly, the Project’s generation of employees would be consistent with the employment projections contained in the 2020–2045 RTP/SCS. Because 2020–2045 RTP/SCS projections form the basis of the 2022 AQMP, the Project would be consistent with the projections in the 2022 AQMP.

- Does the project implement feasible air quality mitigation measures?

⁷⁷ Based on a linear interpolation of 2016–2040 data.

⁷⁸ Based on a linear interpolation of 2016–2040 data.

⁷⁹ According to SCAG’s 2016–2040 RTP/SCS the projected employment growth would increase from 1,831,457 in 2020 to 1,915,868 in 2025. The estimated new employment generated by the Project would represent approximately 0.79 percent of the employment growth forecasted by SCAG in the City of Los Angeles Subregion between 2020 and 2025.

⁸⁰ SCAG, *ConnectSoCal (2020-045 RTP/SCS), Demographics and Growth Forecast Appendix, Table 14, page 35*. Based on a linear interpolation of SCAG’s employment data for 2016 (1,848,300) and 2045 (2,135,900). The 2020 value is extrapolated from 2016 and 2045 values: $[(2,135,900 - 1,848,300) \div 29] * 4 + 1,848,300 = \sim 1,887,969$.

⁸¹ SCAG, *ConnectSoCal (2020-045 RTP/SCS), Demographics and Growth Forecast Appendix, Table 14, page 35*. Based on a linear interpolation of SCAG’s employment data for 2016 (1,848,300) and 2045 (2,135,900). The 2025 value is extrapolated from 2016 and 2045 values: $[(2,135,900 - 1,848,300) \div 29] * 9 + 1,848,300 = \sim 1,937,555$.

The Project would comply with all applicable regulatory standards (e.g., SCAQMD Rule 403, etc.) as required by SCAQMD, as summarized above. The Project also would incorporate project design features to support and promote environmental sustainability as discussed above and in Section IV.F, Greenhouse Gas Emissions, of this Draft EIR. In addition to Project Design Feature AIR-PDF-1, which requires the use of electricity from power poles where available and/or solar powered generators rather than temporary diesel or gasoline generators, such project design features that would improve air quality include Project Design Feature GHG-PDF-1, which would incorporate increased energy efficiency and sustainability features. While these features are designed primarily to reduce GHG emissions, they would also serve to reduce the criteria air pollutants discussed herein. In addition, in accordance with Mitigation Measure TR-MM-1 included in Section IV.K, Transportation, of this Draft EIR, the Project would implement a Transportation Demand Management (TDM) Program to promote non-auto travel and reduce the use of single-occupant vehicle trips by including measures such as workplace parking pricing, travel behavior change programming, bicycle parking with facilities such as showers, and subsidization of transit fares. Overall, given the Project's design features and compliance with the regulatory requirements identified above and in Section IV.F, Greenhouse Gas Emissions, of this Draft EIR, no significant air quality impacts would occur, and no mitigation measures are required. As such, the Project is consistent with this AQMP consistency criterion.

- To what extent is project development consistent with the control measures set forth in the AQMP?

As an infill development located in an HQTAs, the Project advances goals of the AQMP and RTP/SCS to reduce VMT and related vehicle emissions. Pursuant to California Health and Safety Code Section 40460, SCAG has the responsibility of preparing and approving the portions of the AQMP relating to the integration of regional land use programs, measures, and strategies. SCAQMD combines its portion of the Plan with those prepared by SCAG. The RTP/SCS and TCMs, included as Appendix IV-C to the 2016 AQMP/SIP for the Basin, are based on SCAG's 2016–2040 RTP/SCS.

With regard to land use developments, such as the Project, the AQMP's reliance on the 2016–2040 RTP/SCS focuses on the reduction of vehicle trips and VMT through transportation and land use planning that include building infill projects, locating residents closer to where they work and play, and designing communities so there is access to high quality transit service. The Project would create an integrated office campus that would support the employment and commercial needs of the growing number of residents, businesses, and visitors in the vicinity. The Project would also enhance pedestrian activity by siting restaurant and retail uses on the ground level, installing new street-level landscaping around the Project site, and providing a pedestrian paseo between the new and existing buildings. Enhancement of pedestrian walkways would encourage walking

instead of driving, reducing Project VMT and associated emissions. In accordance with Mitigation Measure TR-MM-1 included in Section IV.K, Transportation, of this Draft EIR, the Project would implement a Transportation Demand Management (TDM) Program to promote non-auto travel and reduce the use of single-occupant vehicle trips by including measures, such as workplace parking pricing; travel behavior change programming; bicycle parking with facilities, such as showers; and subsidization of transit fares. Project employees and visitors would also have convenient access to transit services approximately 750 feet from the Project Site. The bus lines include Metro Local Lines 108 and 110, Commuter Express 437B, Culver CityBus Line 4, and City of Santa Monica Big Blue Bus 14. Accordingly, the Project would support AQMP and RTP/SCS objectives of reducing VMT and the related vehicular air emissions.

In conclusion, the determination of AQMP consistency is primarily concerned with the long-term influence of the Project on air quality in the Air Basin. The Project would concentrate *new* commercial/retail uses within an HQTAs, thus reducing VMT. The Project would not have a significant long-term adverse impact on the region's ability to meet State and federal air quality standards. As discussed above, the Project would be consistent with the goals and policies of the AQMP and, therefore, would not conflict with or obstruct implementation of SCAQMD's AQMP.

(b) City of Los Angeles Policies

To achieve the goals of the Air Quality Element of the City's General Plan, performance-based standards have been adopted to provide flexibility in implementation of its policies and objectives. The following Air Quality Element goals, objectives, and policies are relevant to the Project:

Goal 1—Good air quality and mobility in an environment of continued population growth and health economic structure.

Objective 1.1—It is the objective of the City of Los Angeles to reduce air pollutants consistent with the Regional Air Quality Management Plan (AQMP), increase traffic mobility, and sustain economic growth citywide.

Objective 1.3—It is the objective of the City of Los Angeles to reduce particulate air pollutants emanating from unpaved areas, parking lots, and construction sites.

Goal 2—Less reliance on single-occupant vehicles with fewer commute and non-work trips.

Objective 2.1—It is the objective of the City of Los Angeles to reduce work trips as a step towards attaining trip reduction objectives necessary to achieve regional air quality goals.

Policy 2.1.1—Utilize compressed work weeks and flextime, telecommuting, carpooling, vanpooling, public transit, and improve walking/bicycling related facilities in order to reduce Vehicle Trips and/or Vehicle Miles Traveled (VMT) as an employer and encourage the private sector to do the same to reduce work trips and traffic congestion.

Goal 4—Minimize impacts of existing land use patterns and future land use development on air quality by addressing the relationship between land use, transportation, and air quality.

Objective 4.1—It is the objective of the City of Los Angeles to include regional attainment of ambient air quality standards as a primary consideration in land use planning.

Policy 4.1.1—Coordinate with all appropriate regional agencies in the implementation of strategies for the integration of land use, transportation, and air quality policies.

Objective 4.2—It is the objective of the City of Los Angeles to reduce vehicle trips and vehicle miles traveled associated with land use patterns.

Policy 4.2.2—Improve accessibility for the City's residents to places of employment, shopping centers, and other establishments.

Policy 4.2.3—Ensure that new development is compatible with pedestrians, bicycles, transit, and alternative fuel vehicles.

Policy 4.2.4—Require that air quality impacts be a consideration in the review and approval of all discretionary projects.

Policy 4.2.5—Emphasize trip reduction, alternative transit and congestion management measures for discretionary projects.

Goal 5—Energy efficiency through land use and transportation planning, the use of renewable resources and less polluting fuels, and the implementation of conservation measures including passive methods such as site orientation and tree planting.

Objective 5.1—It is the objective of the City of Los Angeles to increase energy efficiency of City facilities and private developments.

Policy 4.1.2—Effect a reduction in energy consumption and shift to non-polluting sources of energy in its buildings and operations.

Policy 5.1.4—Reduce energy consumption and associated air emissions by encouraging waste reduction and recycling.

As an infill development within an HQTAs, the Project advances regional and City goals to reduce VMT and related vehicle emissions, which has the co-benefit of decreasing pollutant emissions from mobile sources. In addition, the Project would include short- and long-term bicycle parking spaces for the proposed uses as required by the LAMC and would enhance the pedestrian environment surrounding the Project site. In addition, the Project would provide opportunities for the use of alternative modes of transportation, including access to public transit, opportunities for walking and biking, thereby facilitating a reduction in VMT. The Project is consistent with the existing land use pattern in the vicinity that concentrates urban density along major arterials and near transit options. The Project also includes primary entrances for pedestrians and bicyclists that would be safe, easily accessible, and approximately 750 feet from the nearest transit stop. During construction activities, the Project would comply with SCAQMD Rule 403, which limits the amount of particulate dust generated by the Project. As discussed in Section IV.E, Greenhouse Gas emissions, the Project would include energy efficiency measures to further reduce energy usage. In addition, the Project would comply with City policies regarding waste diversion and recycling rates. A more detailed analysis of the Project's consistency with the City's General Plan is presented in Table IV.B-5 on page IV.B-57 which identifies specific goals and polices of the City's General Plan and demonstrates the Project's consistency with these goals.

In conclusion, analysis of Threshold (a) was based on the Project's consistency with the AQMP, as well as the City of Los Angeles plans and policies. The determination of AQMP consistency is primarily concerned with the long-term influence of the Project on air quality in the Air Basin. As discussed above, the Project would not increase the frequency or severity of an existing air quality violation or cause or contribute to new violations for these pollutants. As the Project would not exceed any of the State and federal standards, the Project would also not delay timely attainment of air quality standards or interim emission reductions specified in the AQMP. In addition, because the Project is consistent with growth projections that form the basis of the 2016 and 2022 AQMPs, the Project would be consistent with the emissions forecasts in the AQMP. Furthermore, as the Project implements feasible air quality mitigation measures, which would reduce air quality impacts, the Project meets this AQMP consistency criterion. Additionally, as the Project would support the City's and SCAQMD's objectives of reducing VMT and the related vehicular air emissions, the Project would be consistent with AQMP control measures.

**Table IV.B-5
Project Consistency with City of Los Angeles General Plan (Air Quality Element)**

Recommendation	Analysis of Project Consistency
Air Quality Element	
<p>Goal 1: Good air quality and mobility in an environment of continued population growth and health economic structure.</p>	<p>Consistent. The Project's emissions would not cause or affect a violation of an applicable ambient air quality standard. The Project would create an integrated office campus that would support the employment and commercial needs of the growing number of residents, businesses, and visitors in the vicinity. The Project would also provide required short- and long-term bicycle parking spaces in compliance with the requirements of the LAMC. The transit accessibility and the bicycle parking spaces provided on-site would further reduce vehicle trips and VMT by encouraging walking and non-automotive forms of transportation, thereby supporting good air quality and mobility.</p>
<p>Objective 1.1: It is the objective of the City of Los Angeles to reduce air pollutants consistent with the Regional Air Quality Management Plan (AQMP), increase traffic mobility, and sustain economic growth citywide.</p>	<p>Consistent. The Project is in an infill location with access to public transit and opportunities for walking and biking which would promote an improved quality of life by facilitating a reduction of vehicle trips, VMT, and air pollution. Specifically, the Project site is served by Metro bus lines 108 and 110 along with Commuter Express 437B, Culver City Bus Line 4, and City of Santa Monica Big Blue Bus 14. The Project site's proximity to transit would reduce VMT and associated air pollution. As discussed under Threshold (a), the Project would be consistent with the relevant SCAG growth projections in the SCAG 2016–2040 RTP/SCS that were used in preparing the 2016 AQMP. Furthermore, the Project would be consistent with the relevant SCAG growth projections in the SCAG 2020–2045 RTP/SCS that were used in preparing the 2022 AQMP. The Project would reduce air pollutants through a reduction in VMT and increase traffic mobility while also sustaining economic growth.</p>
<p>Objective 1.3: It is the objective of the City of Los Angeles to reduce particulate air pollutants emanating from unpaved areas, parking lots, and construction sites.</p>	<p>Consistent. The Project would comply with SCAQMD Rule 403 which requires dust control measures during construction activities. The Project would also require the construction contractor(s) to comply with the applicable provisions of the CARB In-Use Off-Road Diesel Vehicle Regulation, which aims to reduce emissions through the installation of diesel particulate matter filters and encouraging the retirement, replacement, or repower of older, dirtier engines with newer emission-controlled models. In addition, the Project would not have large areas of unpaved surfaces. Parking areas would be maintained with good housekeeping practices.</p>
<p>Goal 2: Less reliance on single-occupant vehicles with fewer commute and non-work trips.</p>	<p>Consistent. The Project would implement Mitigation Measure TR-MM-1, which would incentivize alternative modes of transportation by requiring future project employees to pay for vehicle parking on-site and providing transit subsidies to those that choose not to</p>

Table IV.B-5 (Continued)
Project Consistency with City of Los Angeles General Plan (Air Quality Element)

Recommendation	Analysis of Project Consistency
	drive. The Project would also provide bicycle parking spaces on-site in an area with its own access point, facilities such as showers and repair station to support safe and comfortable bicycle travel by providing end-of-trip amenities. These measures would serve to reduce reliance on single-occupant vehicles, consistent with this goal.
Objective 2.1: It is the objective of the City of Los Angeles to reduce work trips as a step towards attaining trip reduction objectives necessary to achieve regional air quality goals.	Consistent. The Project would implement Mitigation Measure TR-MM-1, which would incentivize alternative modes of transportation by requiring future project employees to pay for vehicle parking on-site and providing transit subsidies to those that choose not to drive. The Project would also provide bicycle parking spaces on-site in an area with its own access point, facilities such as showers and repair station to support safe and comfortable bicycle travel by providing end-of-trip amenities. These measures would reduce work trips and encourage employees to utilize alternative modes of transportation.
Policy 2.1.1: Utilize compressed work weeks and flextime, telecommuting, carpooling, vanpooling, public transit, and improve walking/bicycling related facilities in order to reduce Vehicle Trips and/or Vehicle Miles Traveled (VMT) as an employer and encourage the private sector to do the same to reduce work trips and traffic congestion.	Consistent. The Project is in an infill location with access to public transit and opportunities for walking and biking would promote an improved quality of life by facilitating a reduction of vehicle trips, VMT, and air pollution. The Project would incorporate pedestrian pathways that would connect to the existing sidewalk network. In addition, the Project would provide 63 bicycle spaces for Project uses.
Goal 4: Minimal impact of existing land use patterns and future land use development on air quality by addressing the relationship between land use, transportation, and air quality.	Consistent. The Project would continue and expand uses that currently exist within the Project site and add a small retail component to the Project site. The Project proposes a complementary mix of land uses within a SCAG-designated HQTAs which would facilitate a reduction of vehicle trips and VMT. The Project is also consistent with the 2016 AQMP and the 2016–2040 RTP/SCS.
Objective 4.1: It is the objective of the City of Los Angeles to include the regional attainment of ambient air quality standards as a primary consideration in land use planning.	Consistent. The Project analysis of potential air quality impacts relied upon the numeric indicators established by SCAQMD, which considers attainment of the ambient air quality standards. Air quality impacts would be less than significant and would not cause or contribute to an exceedance of the ambient air quality standards.
Objective 4.2: It is the objective of the City of Los Angeles to reduce vehicle trips and VMT associated with land use patterns.	Consistent. The Project would reduce VMT associated with land use patterns due to its infill location, development of an integrated office campus that would support the employment and commercial needs of the growing number of residents, businesses, and visitors in the vicinity. The Project would implement Mitigation Measure TR-MM-1, which would incentivize alternative modes of transportation by requiring future project

Table IV.B-5 (Continued)
Project Consistency with City of Los Angeles General Plan (Air Quality Element)

Recommendation	Analysis of Project Consistency
	employees to pay for vehicle parking on-site and providing transit subsidies to those that choose not to drive. The Project would also provide bicycle parking spaces on-site in an area with its own access point, facilities such as showers and repair station to support safe and comfortable bicycle travel by providing end-of-trip amenities. These measures would reduce trips and encourage employees to utilize alternative modes of transportation.
Policy 4.2.2: Improve accessibility for the City's residents to places of employment, shopping centers and other establishments.	Consistent. The Project site's location within a major employment area, surrounding the Project site and to the West, and a SCAG-designated HQTAs would improve accessibility to places of employment and retail opportunities. The Project would create an integrated creative office campus that would support the employment and commercial needs of the growing number of residents, businesses, and visitors in the vicinity. The transit accessibility and the bicycle parking spaces provided on-site would reduce trips and encourage nearby residents to utilize alternative modes of transportation.
Policy 4.2.3: Ensure that new development is compatible with pedestrians, bicycles, transit, and alternative fuel vehicles.	Consistent. The Project would incorporate pedestrian pathways that would connect to the existing sidewalk network. In addition, the Project would provide 63 bicycle parking spaces for Project uses. The Project would also comply with City requirements for providing electric vehicle charging capabilities and electric vehicle charging stations within the proposed parking areas.
Policy 4.2.4: Require that air quality impacts be a consideration in the review and approval of all discretionary projects.	Consistent. The environmental review conducted for the Project includes an analysis of air quality impacts; and the decision-maker(s) for the discretionary actions would be responsible for determining that the environmental review was conducted in compliance with CEQA.
Policy 4.2.5: Emphasize trip reduction, alternative transit and congestion management measures for discretionary projects.	Consistent. The Project would occupy an infill location within approximately 750 feet of existing public transportation, which would help to promote transit usage and in turn reduce the number of vehicle trips to and from the Project site. In addition, the Project would provide 63 bicycle parking spaces for Project uses. The Project would implement Mitigation Measure TR-MM-1, which would incentivize alternative modes of transportation by requiring future project employees to pay for vehicle parking on-site and providing transit subsidies to those that choose not to drive. The Project would also provide bicycle parking spaces on-site in an area with its own access point, facilities, such as showers and repair station to support safe and comfortable bicycle travel by providing end-of-trip amenities. These measures would reduce trips and encourage employees to utilize

Table IV.B-5 (Continued)
Project Consistency with City of Los Angeles General Plan (Air Quality Element)

Recommendation	Analysis of Project Consistency
	alternative modes of transportation.
<hr/> <i>Source: Eyestone Environmental, 2023.</i>	

Thus, the Project would not conflict with or obstruct implementation of the AQMP. With regard to the City's policies, as discussed above, the Project would serve to implement applicable policies of the City pertaining to air quality. Based on the above, impacts related to Threshold (a) would be less than significant.

(2) Mitigation Measures

Project-level impacts related to Threshold (a) would be less than significant during construction and operation of the Project. Therefore, no mitigation measures are required.

(3) Level of Significance After Mitigation

Project-level impacts related to Threshold (a) during both construction and operation of the Project were determined to be less than significant without mitigation. Therefore, no mitigation measures were required, and the impact level remains less than significant.

Threshold (b): Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard.

(1) Impact Analysis

(a) Regional Emissions

(i) Construction

Construction of the Project would commence with demolition of the existing on-site structures. This phase would be followed by grading and excavation for the subterranean parking. Building foundations would then be laid, followed by building construction, paving/concrete installation, and landscape installation. Utility infrastructure (e.g., electricity, water, gas) would be installed at various times during the building construction phase. The construction equipment and truck fleet mix is anticipated to emit less pollution in future years due to more stringent emissions control regulations. Project construction is anticipated to occur over an approximate 18-month period and be completed in 2025. It is

estimated that approximately 59,000 cubic yards of export would be hauled from the Project site.

Construction of the Project has the potential to create air quality impacts through the use of heavy-duty construction equipment and through vehicle trips generated from construction workers traveling to and from the Project site. In addition, fugitive dust emissions would result from demolition and construction activities. Mobile source emissions, primarily NO_x, would result from the use of construction equipment, such as dozers, loaders, and cranes. During the finishing phase of the Project, paving and the application of architectural coatings (e.g., paints) would potentially release VOCs. The assessment of construction air quality impacts considers each of these potential sources. Construction emissions can vary substantially from day to day, depending on the level of activity, the specific type of operation, and, for dust, the prevailing weather conditions.

The emissions levels in Table IV.B-6 on page IV.B-62 represent the highest daily emissions projected to occur during each year of construction. As presented in Table IV.B-6 construction-related daily maximum regional construction emissions (i.e., combined on-site and off-site emissions) would not exceed any of the SCAQMD daily significance thresholds. Therefore, regional construction emissions resulting from the Project would result in a less than significant short-term impact.

(ii) Operation

As discussed above, SCAQMD's CalEEMod was used to calculate regional area, energy, mobile source, and stationary emissions. The Project would incorporate project design features to support and promote environmental sustainability, as discussed in Section IV.F, Greenhouse Gas Emissions, of this Draft EIR. While these features are designed primarily to reduce greenhouse gas emissions, they would also serve to reduce criteria air pollutants discussed herein and were incorporated into the emissions analysis. For purposes of the air quality analysis, project characteristics incorporated in this analysis include the Project site's increase in accessibility to transit and increase in diversity of uses and intensity, which reduce VMT and are consistent with Project-related VMT provided in the LADOT VMT Calculator. These Project characteristics are explained further in Section IV.F, Greenhouse Gas Emissions, of this Draft EIR. This analysis is conservative as it did not account for Mitigation Measure TR-MM-1 included in Section IV.K, Transportation, of this Draft EIR, in which the Project would implement a TDM Program to promote non-auto travel and reduce the use of single-occupant vehicle trips by including measures such as workplace parking pricing, travel behavior change programming, bicycle parking with facilities such as showers, and subsidization of transit fares.

Table IV.B-6
Estimate of Maximum Regional Project Daily Construction Emissions (pounds per day)

Construction Year	VOC ^b	NO _x	CO	SO _x	PM ₁₀ ^c	PM _{2.5} ^c
Regional Construction Emissions						
2024 Winter	4	45	40	<1	11	4
2024 Summer	4	44	43	<1	11	4
2025 Winter	3	25	38	<1	7	2
2025 Summer	33	30	53	<1	9	3
Maximum Unmitigated Construction Emissions^a	33	45	53	<1	11	4
SCAQMD Daily Significance Thresholds	75	100	550	150	150	55
Over/(Under)	(42)	(55)	(497)	(150)	(139)	(51)
Maximum Unmitigated Construction Emissions Exceed Threshold?	No	No	No	No	No	No
<p>Numbers may not add up exactly due to rounding.</p> <p>^a The CalEEMod model printout sheets and/or calculation worksheets are presented in Appendix C (CalEEMod Output) of this Draft EIR.</p> <p>^b For purposes of this analysis VOC emissions are assumed to be equal to ROG emissions.</p> <p>^c Calculations are compliant with Rule 403.</p> <p>Source: Eyestone Environmental, 2023.</p>						

Operational air quality impacts are assessed based on the incremental increase in emissions compared to baseline (existing) conditions. Therefore, the Project's operational emissions would subtract the existing emissions of the current use to determine the incremental increase. Table IV.B-7 on page IV.B-63 provides Project operational emissions with incorporation of project design features. As shown in Table IV.B-7 regional emissions resulting from operation of the Project would not exceed any SCAQMD's daily regional operational thresholds. Therefore, regional operational emissions resulting from the Project would result in a less-than-significant air quality impact.

(b) Localized Emissions

As previously discussed, SCAQMD recommends the evaluation of localized air quality impacts to sensitive receptors in the immediate vicinity of a project site as a result of project construction and operations. The thresholds are based on applicable short-term State and federal ambient air quality standards.

Table IV.B-7
Estimate of Maximum Regional Project Daily Operational Emissions—At Project Buildout^a

Emission Source	Pollutant Emissions (pounds per day)					
	VOC	NO _x	CO	SO _x	PM ₁₀	PM _{2.5}
Project Winter Emissions						
Area	4	<1	<1	<1	<1	<1
Energy (Natural Gas) ^b	<1	<-1	<-1	<1	<-1	<-1
Mobile ^b	7	6	55	<1	12	3
Stationary	<1	1	1	<1	<1	<1
Total Proposed Uses Emissions	12	7	56	<1	12	3
SCAQMD Significance Threshold	55	55	550	150	150	55
Over/(Under)	(43)	(48)	(494)	(150)	(138)	(52)
Exceed Threshold?	No	No	No	No	No	No
Project Summer Emissions						
Area	8	<1	22	<1	<1	<1
Energy (Natural Gas)	<1	<-1	<-1	<1	<-1	<-1
Mobile ^b	7	5	60	<1	12	3
Stationary	<1	1	1	<1	<1	<1
Total Proposed Uses Emissions	15	7	83	<1	13	3
SCAQMD Significance Threshold	55	55	550	150	150	55
Over/(Under)	(40)	(48)	(467)	(150)	(137)	(52)
Exceed Threshold?	No	No	No	No	No	No
<p>Numbers may not add up exactly due to rounding.</p> <p>^a The CalEEMod model printout sheets and/or calculation worksheets are presented in Appendix C (CalEEMod Output) of this Draft EIR. The table reflects net emissions (i.e., Project emissions less existing emissions).</p> <p>^b This analysis does not account for additional reductions in pollutant emissions associated with Mitigation Measure TR-MM-1 (TDM trip and VMT reduction measures).</p> <p>Source: Eystone Environmental, 2023.</p>						

(i) Construction

Project-related localized construction impacts are evaluated based on SCAQMD LST methodology, which takes into account ambient pollutant concentrations. Based on SCAQMD methodology, localized emissions, which exceed LSTs, would also cause an exceedance of ambient air quality standards. As analyzed in Threshold (c) below and provided in Table IV.B-8 on page IV.B-64, maximum construction emissions would not exceed any of the SCAQMD-recommended localized screening thresholds. Therefore, localized construction emissions resulting from the Project would result in a less-than-significant air quality impact.

Table IV.B-8
Estimate of Maximum Localized Daily Project Construction Emissions (pounds per day)

Construction Year	NO _x	CO	PM ₁₀	PM _{2.5}
2024 Winter	24	27	6	2
2024 Summer	22	23	6	2
2025 Winter	20	21	3	<1
2025 Summer	24	26	4	1
Maximum Unmitigated Daily Localized Emissions	24	27	6	2
SCAQMD Localized Significance Thresholds^b	115	1,059	9	5
Over/(Under)	(91)	(1,032)	(3)	(5)
Exceed Threshold?	No	No	No	No

Numbers may not add up exactly due to rounding.

^a Potential localized construction impacts were evaluated using SCAQMD's LSTs for Source Receptor Area 2.

^b The SCAQMD Daily Significance Thresholds are based on a 2-acre Project site. Active construction area is approximately 2.37 acres, excluding the area where the existing office building would remain. The closest sensitive land uses are residences east of the Project site, across Beatrice Street (approximately 25 meters or 82 feet from the Project site). The localized threshold is based on a 25 meter receptor distance.

Source: Eyestone Environmental, 2023.

(ii) Operations

Project-related operational emissions were also evaluated based on SCAQMD LST methodology. The SCAQMD LST methodology evaluates emissions from on-site sources (e.g., water heaters, HVAC). As analyzed in Threshold (c) below, Project-related operational emissions from on-site and off-site sources would not exceed localized thresholds. Therefore, localized operational emissions resulting from the Project would result in a less-than-significant air quality impact.

(2) Mitigation Measures

Project-level impacts related to Threshold (b) would be less than significant during construction and operation of the Project. Therefore, no mitigation measures are required.

(3) Level of Significance After Mitigation

Project-level impacts related to Threshold (b) during both construction and operation of the Project were determined to be less than significant without mitigation. Therefore, no mitigation measures were required, and the impact level remains less than significant.

Threshold (c): Expose sensitive receptors to substantial pollutant concentrations.**(1) Impact Analysis*****(a) Construction******(i) Localized Criteria Pollutant Emissions***

As discussed above in the Methodology subsection, the localized construction air quality analysis was conducted using the methodology promulgated by SCAQMD. Look-up tables provided by the SCAQMD were used to determine localized construction emissions thresholds for the Project.⁸² LSTs represent the maximum emissions from a project that are not expected to cause or contribute to an exceedance of the most stringent applicable federal or state ambient air quality standard and are based on the most recent background ambient air quality monitoring data (2020–2022) for the Project area presented in Table IV.B-2 on page IV.B-28. Although the trend shown in Table IV.B-2 demonstrates that ambient air quality is improving in the area, the localized construction emissions analysis conservatively did not apply a reduction in background pollutant concentrations for subsequent years of construction (i.e., 2024–2025). By doing so, the allowable pollutant increment to not exceed an ambient air quality standard is more stringent. The analysis is based on existing background ambient air quality monitoring data (2020–2022).

Maximum on-site daily construction emissions for NO_x, CO, PM₁₀, and PM_{2.5} were calculated using CalEEMod and compared to the applicable SCAQMD LSTs for the area (SRA 2) based on a construction site acreage of two acres. Potential impacts were evaluated at the closest off-site sensitive receptor, which are residences south of the Project site, across Beatrice Street (approximately 25 meters or 82 feet from the Project site). All other existing air quality-sensitive uses are located at greater distances from the Project site and would experience lower air pollutant impacts from potential sources of pollutants from the Project site due to atmospheric dispersion effects. The maximum daily localized emissions from Project construction and LSTs are presented in Table IV.B-8 on page IV.B-64. As shown in Table IV.B-8, maximum construction emissions would not exceed any of the SCAQMD-recommended localized screening thresholds. As a result, localized construction emissions resulting from the Project would result in a less-than-significant air quality impact.

(ii) Localized Toxic Air Contaminant Emissions

The greatest potential for TAC emissions during construction would be from diesel particulate emissions associated with heavy equipment operations. According to

⁸² SCAQMD, *LST Methodology Appendix C-Mass Rate LST Look-up Table*, revised October 2009.

SCAQMD methodology, health effects from carcinogenic air toxics are usually described in terms of individual cancer risk. “Individual Cancer Risk” is the likelihood that a person continuously exposed to concentrations of TACs over a 70-year lifetime will contract cancer based on the use of standard risk assessment methodology. Given the short-term construction schedule of approximately 18 months, the Project would not result in a long-term (i.e., 70-year) source of TAC emissions. Additionally, the SCAQMD CEQA guidance does not require a health risk assessment (HRA) for short-term construction emissions. It is, therefore, not necessary to evaluate long-term cancer impacts from construction activities which occur over a relatively short duration. Also, the Project would not result in any substantial emissions of acute or chronic TACs during construction activities. In addition, there would be no residual emissions or corresponding individual cancer risk after construction. It is expected that heavy construction equipment, trucks and other diesel powered sources will no longer be operating at the site once construction is complete. As such, Project-related TAC impacts during construction would be less than significant.

(b) Operation

(i) On-Site Operational Activities (Criteria Pollutants)

Operation of the Project would not introduce any major new sources of air pollution within the Project site. Emissions estimates for criteria air pollutants from on-site sources are presented in Table IV.B-9 on page IV.B-67. The SCAQMD LST mass rate look-up tables, which apply to projects that have active areas that are less than or equal to 5 acres in size, were used to evaluate potential localized impacts. As shown in Table IV.B-9, on-site operational emissions would not exceed any of the LSTs. Therefore, localized on-site operational emissions resulting from the Project would result in a less-than-significant air quality impact.

(ii) Off-Site Operational Activities (CO “Hot Spots” Analysis)

Consistent with the CO methodology above, if a project intersection does not exceed 400,000 vehicles per day, then the project does not need to prepare a detailed CO hot spot analysis. At buildout of the Project, the highest average daily trips at an intersection under the Future With Project Conditions⁸³ would be approximately 50,290 trips at the Westlawn Avenue and Jefferson Boulevard intersection,⁸⁴ which is significantly below the

⁸³ As defined in the Transportation Assessment included as Appendix K of this Draft EIR, the Future With Project Conditions is a traffic scenario that provides projected traffic volumes and an assessment of operating conditions under future conditions with the addition of Project-generated traffic.

⁸⁴ Eyestone Environmental, Air Quality Calculations for New Beatrice West Project, see Appendix C of this Draft EIR.

Table IV.B-9
Estimate of Maximum Localized Project Daily Operational Emissions—At Project Buildout (2025)
(pounds per day)^a

Emission Source	NO _x	CO	PM ₁₀	PM _{2.5}
Winter Emissions				
Area	<1	<1	<1	<1
Energy (Natural Gas) ^b	-<1	-<1	-<1	-<1
Stationary	1	1	<1	<1
On-Site Total^c	1	1	<1	<1
SCAQMD Significance Threshold^c	115	1,059	2	1
Over/(Under)	(114)	(1,058)	(2)	(1)
Exceed Threshold?	No	No	No	No
Summer Emissions				
Area	<1	22	<1	<1
Energy (Natural Gas) ^b	-<1	-<1	-<1	-<1
Stationary	1	1	<1	<1
On-Site Total^c	1	23	<1	<1
SCAQMD Significance Threshold^c	115	1,059	2	1
Over/(Under)	(113)	(1,036)	(2)	(1)
Exceed Threshold?	No	No	No	No
<p>Numbers may not add up exactly due to rounding.</p> <p>^a The CalEEMod model printout sheets and/or calculation worksheets are presented in Appendix C (CalEEMod Output) of this Draft EIR. The table reflects net emissions (i.e., Project emissions less existing emissions).</p> <p>^b Energy (Natural Gas) emissions accounts for a reduction in emissions with implementation of Project Design Feature GHG-PDF-1.</p> <p>^c The SCAQMD Daily Significance Thresholds are based on a two-acre Project site. New buildings are on approximately 2.37 acres. The closest sensitive receptors are residential uses south of the Project site, across Beatrice Street (approximately 25 meters or 82 feet from the Project site). The localized threshold is based on a 25 meter receptor distance.</p> <p>Source: Eyestone Environmental, 2023.</p>				

daily traffic volumes that would be expected to generate CO exceedances as evaluated in the 2003 AQMP.⁸⁵ This daily trip estimate is based on the peak hour conditions of the intersection. There is no reason unique to the Air Basin meteorology to conclude that the CO concentrations at the Westlawn Avenue and Jefferson Boulevard intersection would exceed the 1-hour CO standard if modeled in detail, based on the studies undertaken for

⁸⁵ The 2003 AQMP estimated that the 1-hour concentration for this intersection was 4.6 ppm, which indicates that the most stringent 1-hour CO standard (20.0 ppm) would likely not be exceeded until the daily traffic at the intersection exceeded more than 400,000 vehicles per day.

the 2003 AQMP86 and discussed above. Therefore, the Project does not trigger the need for a detailed CO hotspots model and would not cause any new or exacerbate any existing CO hotspots. As a result, impacts related to localized mobile-source CO emissions are considered less than significant. The supporting data for this analysis is included in Appendix C of this Draft EIR.

(iii) Toxic Air Contaminants

When considering potential air quality impacts under CEQA, consideration is given to the location of sensitive receptors within close proximity of land uses that emit TACs. CARB has published and adopted the Air Quality and Land Use Handbook: A Community Health Perspective, which provides recommendations regarding the siting of new sensitive land uses near potential sources of air toxic emissions (e.g., freeways, distribution centers, rail yards, ports, refineries, chrome plating facilities, dry cleaners, and gasoline dispensing facilities).⁸⁷ SCAQMD adopted similar recommendations in its Guidance Document for Addressing Air Quality Issues in General Plans and Local Planning.⁸⁸ Together, the CARB and SCAQMD guidelines recommend siting distances for both the development of sensitive land uses in proximity to TAC sources and the addition of new TAC sources in proximity to existing sensitive land uses.

The primary sources of potential air toxics associated with Project operations include diesel particulate matter from delivery trucks (e.g., truck traffic on local streets and idling on adjacent streets) and, to a lesser extent, facility operations (e.g., natural gas fired boilers). However, these activities, and the land uses associated with the Project, are not considered land uses that generate substantial TAC emissions. It should be noted that SCAQMD recommends that HRAs be conducted for substantial individual sources of diesel particulate matter (e.g., truck stops and warehouse distribution facilities that generate more than 100 trucks per day or more than 40 trucks with operating transport refrigeration units) and has provided guidance for analyzing mobile source diesel emissions.⁸⁹ The Project primarily includes office and retail uses, which would not be expected to generate a large number of heavy duty truck trips. The Project total truck deliveries including both diesel and non-diesel would be approximately eight daily truck deliveries (5 truck deliveries daily

⁸⁶ *It should be noted that CO background concentrations within the vicinity of the modeled intersection have substantially decreased since preparation of the 2003 AQMP. In 2003, the 1-hour background CO concentration was 5 ppm and has decreased to 2 ppm in 2014.*

⁸⁷ *CARB, Air Quality and Land Use Handbook, a Community Health Perspective, April 2005.*

⁸⁸ *SCAQMD, Guidance Document for Addressing Air Quality Issues in General Plans and Local Planning, May 6, 2005.*

⁸⁹ *SCAQMD, Health Risk Assessment Guidance for Analyzing Cancer Risks from Mobile Source Diesel Idling Emissions for CEQA Air Quality Analysis, 2002.*

under existing condition and approximately 13 truck deliveries daily under buildout).⁹⁰ Also, the Project would not include land uses, such as warehousing or cold storage uses, and is not considered to be a substantial source of diesel particulate matter warranting a refined HRA since daily truck trips to the Project site would not exceed 100 trucks per day or more than 40 trucks with operating transport refrigeration units. In addition, the CARB-mandated ATCM limits diesel-fueled commercial vehicles (delivery trucks) to idle for no more than five minutes at any given time, which would further limit diesel particulate emissions. Furthermore, there are no substantial sources of TAC within the Project vicinity.

Typical sources of acutely and chronically hazardous TACs include industrial manufacturing processes (e.g., chrome plating, electrical manufacturing, petroleum refinery). The Project would not include these types of potential industrial manufacturing process sources. It is expected that quantities of hazardous TACs generated on-site (e.g., cleaning solvents, paints, landscape pesticides, etc.) for the types of proposed land uses would be below thresholds warranting further study under the California Accidental Release Program (CalARP). In addition, these products would be used, stored and disposed of in accordance with manufactures instructions and applicable regulations. As such, the Project would not release substantial amounts of TACs, and impacts on human health would be less than significant.

As the Project would not contain substantial TAC sources and is consistent with the CARB and SCAQMD guidelines, the Project would not result in the exposure of off-site sensitive receptors to carcinogenic or toxic air contaminants that exceed the maximum incremental cancer risk of 10 in one million or an acute or chronic hazard index of 1.0, and potential TAC impacts would be less than significant.

(2) Mitigation Measures

Project-level impacts related to Threshold (c) would be less than significant during construction and operation of the Project. Therefore, no mitigation measures are required.

(3) Level of Significance After Mitigation

Project-level impacts related to Threshold (c) during both construction and operation of the Project were determined to be less than significant without mitigation. Therefore, no mitigation measures were required, and the impact level remains less than significant.

⁹⁰ *National Cooperative Highway Research Program, Synthesis 298, Truck Trip Generation Data, 2001.*

Threshold (d): Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people.

As evaluated in the Initial Study prepared for this Project, included in Appendix A of this Draft EIR, and summarized in Section VI, Other CEQA Considerations, of this Draft EIR, no objectionable odors are anticipated to adversely affect a substantial number of people as a result of either construction or operation of the Project. Therefore, as determined in the Initial Study, the potential odor impact during construction and operation of the Project would be less than significant, and no further analysis is required.

e. Cumulative Impacts

(1) Impact Analysis

As discussed above under Thresholds (b) and (c) above, the Project's construction and operational-related regional air quality emissions, localized emissions, and emissions of TACs would be less than significant. Based on SCAQMD guidance, individual construction projects that exceed SCAQMD's recommended daily thresholds for project-specific impacts would cause a cumulatively considerable increase in emissions for those pollutants for which the Air Basin is in non-attainment.⁹¹ However, those projects that do not exceed the thresholds would not be cumulatively considerable. Therefore, since the Project would not exceed the threshold for air quality pollutants, the Project's contribution to cumulative air quality impacts would not be cumulatively considerable. In conclusion, during construction and operation, the Project would have a less than significant cumulative impact to regional impacts and is, therefore, not cumulatively considerable.

(2) Mitigation Measures

Cumulative impacts related to air quality would be less than significant during construction and operation of the Project. Therefore, no mitigation measures are required.

(3) Level of Significance After Mitigation

Project-level and cumulative construction and operational air quality impacts were determined to be less than significant without mitigation. Therefore, no mitigation measures were required, and the impact level remains less than significant.

⁹¹ SCAQMD, *White Paper on Potential Control Strategies to Address Cumulative Impacts from Air Pollution, Appendix D, August 2003.*