4.2 AIR QUALITY

This section discusses the existing air quality setting of the Project Site and assesses the Project's potential impacts related to air quality. This section is based on the Air Quality and Greenhouse Gas Emissions Report, prepared by Psomas, dated July 2024 (Psomas 2024a), which is included as Appendix C-1, the Health Risk Assessment for the Pacific Place Project, City of Long Beach, California, dated July 2024 (Psomas 2024b) which is included as Appendix C-2, and the Project's Air Quality and Greenhouse Gas Emissions Calculations (Psomas 2024d) included as Appendix C-3.

4.2.1 SUMMARY OF PREVIOUS ENVIRONMENTAL DOCUMENTATION

MND for the Pacific Place Project

Project emissions were estimated in the MND using the California Emissions Estimator Model (CalEEMod) version 2016.3.2 computer program (CAPCOA 2016).

The Air Quality analysis for the MND for the Prior Project determined that implementation of the Prior Project would not conflict with or obstruct implementation of an air quality plan.

The analysis within the MND determined that the Prior Project has the potential to result in a cumulatively considerable net increase of a criteria pollutant related to regional construction emissions during the self-storage component of the Prior Project. However, with implementation of mitigation, potential impacts related to air quality would be reduced to less than significant levels.

Additionally, the MND found that the Prior Project's impacts related to the exposure of sensitive receptors to substantial pollutant concentrations would be less than significant.

Further, it was determined that the Prior Project would not have resulted in other emissions (such as those leading to odors) adversely affecting a substantial number of people.

MND Mitigation Measures

The MND required implementation of the following mitigation measure regarding air quality to reduce potential impacts associated with implementation of the Prior Project to less than significant levels.

MM AIR-1 For the Artesia parcels, prior to the issuance of each grading permit, the City or its designee shall provide construction plans and specifications demonstrating that, onsite equipment used for construction of the Project shall be required to meet a minimum of Tier 3 or equivalent off-road engine emissions standards. Tier 4 compliant engines can also be used, which would further reduce emissions, but are not required.

As set forth below, the DEIR analysis confirms that there are no new impacts and no increase in the severity of previously identified impacts beyond those identified in the MND. The mitigation identified in the Air Quality analysis from the MND has been amended to require more stringent standards on construction equipment.

Additionally, the Court Ruling found that the MND's analysis was insufficient regarding the 134 trucks trips associated with the previously proposed warehouse development on the McDonald Trust Parcels. Specifically, the Court Ruling found that the MND did not detail how many of the

134 trucks might be refrigerated trucks and therefore did not adequately analyze how air quality might be impacted if the trucks were refrigerated. As noted in Section 2, Introduction, of this DEIR, the Project evaluated in this EIR does not include any proposed development on the McDonald Trust Parcels because the owner of the McDonald Trust Parcels notified the City that no development is planned at that property nor is any development application pending. Accordingly, this EIR does not analyze truck trips for that prior proposed development, nor does it address the defects with that analysis identified by the Court Ruling.

4.2.2 ENVIRONMENTAL SETTING

A. Existing Conditions

Climate and Meteorology

The Project Site is located in the Los Angeles portion of the South Coast Air Basin (SoCAB), and, for air quality regulation and permitting, is under the jurisdiction of the South Coast Air Quality Management District (SCAQMD). The SoCAB is a 6,600-square-mile area bound by the Pacific Ocean to the west; the San Gabriel, San Bernardino, and San Jacinto Mountains to the north and east; and the San Diego County line to the south. The SoCAB includes all of Orange County, the non-desert portions of Los Angeles, Riverside, and San Bernardino counties, and the San Gorgonio Pass area of Riverside County. (Psomas 2024a)

The SoCAB's terrain and geographical location (i.e., a coastal plain with connecting broad valleys and low hills) determine its distinctive semi-arid climate, which is characterized by moderate temperatures, oceanic influence, and precipitation that is limited to a few storms during the winter (i.e., November through April). The SoCAB has light winds and poor vertical mixing compared to other large urban areas in the United States. Dominant airflows provide the driving mechanism for the transport and dispersion of air pollution in the SoCAB. The mountains surrounding the SoCAB form natural horizontal barriers to the dispersion of air contaminants. Air pollution created in the coastal areas and around the Los Angeles area is transported inland until it reaches the mountains, where the combination of mountains and inversion layers generally prevents further dispersion. This poor ventilation results in a gradual degradation of air quality from the coastal areas to inland areas. Air stagnation may occur during the early evening and early morning periods of transition between daytime and nighttime flows. The Basin also experiences periods of hot, dry winds from the desert, known as Santa Ana winds. If the Santa Ana winds are strong, they can surpass the sea breeze, which blows from the ocean to the land, and carry the suspended dust and pollutants out to the ocean. If the winds are weak, they are opposed by the sea breeze and cause stagnation, resulting in high pollution events. As measured at the SCAQMD Long Beach Airport meteorological station, the primary wind direction near the Project Site is from the south and south-southwest during the day and from the northwest and north-northwest at night. Data acquired from the Western Regional Climate Center (WRCC) indicates that the City of Long Beach experiences cool winters (an average high of 67.0 °Fahrenheit and an average low of 45.3 °Fahrenheit in December) and warm, dry summers (an average high of 83.9 °Fahrenheit and an average low of 64.9 °Fahrenheit in August). Average rainfall is 12.01 inches, mainly falling during the winter months (January, February, and March). (Psomas 2024a)

The combination of poor dispersion and abundant sunshine, which drives the photochemical reactions that form pollutants (such as ozone [O_3]), provides conditions especially favorable to the formation of smog. The unfavorable combination of meteorology, topography, and emissions from the nation's second largest urban area results in the SoCAB having some of the worst air quality in the United States. (Psomas 2024a)

Air Pollutants

Criteria Pollutants

Air quality regulations were first promulgated with the Federal Clean Air Act (CAA) of 1970. Air quality is defined by ambient air concentrations of seven "criteria air pollutants," which are a group of common air pollutants identified by the United States Environmental Protection Agency (USEPA) to be of concern with respect to the health and welfare of the general public. Federal and State governments regulate criteria air pollutants by using ambient standards based on criteria regarding the health and/or environmental effects of each pollutant. The seven "criteria" air pollutants defined by the USEPA are ozone (O_3); carbon monoxide (CO); nitrogen dioxide (NO_2); sulfur dioxide (SO_2); respirable particulate matter with a diameter of 10 microns or less (PM10), and fine particulate matter with a diameter of 2.5 microns or less (PM2.5), and lead. A description of each criteria air pollutant, including source types and health effects, is provided below. (Psomas 2024a)

Nitrogen Dioxide

Nitrogen gas, normally relatively inert (nonreactive), comprises approximately 78 percent of the air (UCAR 2024). At high temperatures (e.g., in a combustion process) and under certain other conditions, nitrogen can combine with oxygen to form several different gaseous compounds collectively called nitrogen oxides (NOx). Nitric oxide (NO), NO_2, and nitrous oxide (N_2O) are important constituents of NOx. NO is converted to NO_2 in the atmosphere. Motor vehicle emissions are the main source of NOx in urban areas. (Psomas 2024a)

NO_2 is a red-brown pungent gas and is toxic to various animals and to humans because of its ability to form nitric acid with water in the eyes, lungs, mucus membranes, and skin. In animals, long-term exposure to NO_2 increases susceptibility to respiratory infections, lowering resistance to such diseases as pneumonia and influenza. Laboratory studies show that susceptible humans, such as asthmatics, who are exposed to high concentrations of NO_2 can suffer lung irritation and, potentially, lung damage. Epidemiological studies have also shown associations between NO_2 concentrations and daily mortality from respiratory and cardiovascular causes and with hospital admissions for respiratory conditions. (Psomas 2024a)

While the National Ambient Air Quality Standards (NAAQS) only address NO_2, NO and NO_2 are both precursors in the formation of O_3 and PM2.5, as discussed below. Because of this, and the fact that NO emissions largely convert to NO_2, NOx emissions are typically examined when assessing potential air quality impacts. NO_2 levels in the SoCAB are in attainment with the State and federal 1--hour and annual standards. (Psomas 2024a)

Ozone

O_3 is a secondary pollutant, meaning that it is not directly emitted. It is a gas that is formed when volatile organic compounds (VOCs) (also referred to as reactive organic gases) and NO_x undergo photochemical reactions that occur only in the presence of sunlight (USEPA 2023a). The primary source of VOC emissions is unburned hydrocarbons in motor vehicle and other internal combustion engine exhaust. NO_x forms as a result of the combustion process, most notably due to the operation of motor vehicles. Sunlight and hot weather cause ground-level O_3 to form;[1] as a result, ozone is known as a summertime air pollutant. Ground-level O_3 is the primary constituent of smog. Because O_3 formation occurs over extended periods of time, and both O_3 and its

[1] Ground-level O_3 is not to be confused with atmospheric O_3 or the "ozone layer", which occurs very high in the atmosphere and shields the planet from some ultraviolet rays.

precursors are transported by wind, high O_3 concentrations can occur in areas well away from sources of its constituent pollutants. (Psomas 2024a)

People with lung disease, children, older adults, and people who are active can be affected when O_3 levels exceed ambient air quality standards. Numerous scientific studies have linked ground-level O_3 exposure to a variety of problems, including:

- Lung irritation that can cause inflammation;
- Wheezing, coughing, pain when taking a deep breath, and breathing difficulties during exercise or outdoor activities;
- Permanent lung damage to those with repeated exposure to O_3 pollution; and
- Aggravated asthma, reduced lung capacity, and increased susceptibility to respiratory illnesses like pneumonia and bronchitis. (Psomas 2024a)

Ground-level O_3 can have detrimental effects on plants and ecosystems. These effects include:

- Interfering with the ability of sensitive plants to produce and store food, making them more susceptible to certain diseases, insects, other pollutants, competition, and harsh weather;
- Damaging the leaves of trees and other plants; and
- Reducing crop yields and forest growth, potentially impacting species diversity in ecosystems. (Psomas 2024a)

O_3 levels in the SoCAB are not in attainment with the State and federal 1--hour and 8-hour standards. (Psomas 2024a)

Particulate Matter

Particulate matter includes both aerosols and solid particles of a wide range of size and composition. Of particular concern are PM10 and PM2.5. Particulate matter size refers to the aerodynamic diameter of the particle. Smaller particles are of greater concern because they can penetrate deeper into the lungs than large particles. (Psomas 2024a)

PM10 is generally emitted directly as a result of mechanical processes that crush or grind larger particles or from the resuspension of dust, most typically through construction activities and vehicular travel. PM10 generally settles out of the atmosphere rapidly and is not readily transported over large distances. (Psomas 2024a)

PM2.5 is directly emitted in combustion exhaust and is formed in atmospheric reactions between various gaseous pollutants, including NO_x, sulfur oxides (SO_x), and VOCs. PM2.5 can remain suspended in the atmosphere for days and/or weeks and can be transported long distances. (Psomas 2024a)

The principal health effects of airborne particulate matter are on the respiratory system. Short term- exposure to high PM2.5 and PM10 levels are associated with premature mortality and increased hospital admissions and emergency room visits; a decline in respiratory function is also associated with short-term exposure to high PM10 levels. Long-term exposure to high PM2.5 levels is associated with premature mortality and development of chronic respiratory disease. According to the USEPA, some people are much more sensitive than others to breathing PM10 and PM2.5. People with influenza, chronic respiratory and cardiovascular diseases, and the elderly may suffer worse illnesses; people with bronchitis can expect aggravated symptoms; and children may experience decline in lung function due to breathing in PM10 and PM2.5. Other

groups considered sensitive include smokers and people who cannot breathe well through their noses. Exercising athletes are also considered sensitive because many breathe through their mouths. (Psomas 2024a)

Particulate matter tends to occur primarily in the form of fugitive dust. This dust appears to be generated by both local sources and by region-wide dust during moderate- to high-wind episodes. These regional episodes tend to be multidistrict and sometimes interstate in scope. The principal sources of dust in urban areas are from grading, construction, disturbed areas of soil, and dust entrained by vehicles on roadways. PM10 levels in the SoCAB are in compliance with federal 24--hour standards; nevertheless, PM10 levels in the SoCAB are not in attainment with State 24--hour standards. In addition, PM2.5 levels in the SoCAB are not in attainment with State and federal 24-hour and annual standards. (Psomas 2024a)

Carbon Monoxide

CO is a colorless and odorless gas which, in the urban environment, is associated primarily with the incomplete combustion of fossil fuels in motor vehicles. CO combines with hemoglobin in the bloodstream and reduces the amount of oxygen that can be circulated through the body. High CO concentrations can cause headaches, aggravate cardiovascular disease, and impair central nervous system functions. CO concentrations can vary greatly over comparatively short distances. Relatively high CO concentrations are typically found near crowded intersections; along heavily used roadways carrying slow moving traffic; and at or near ground level. Even under the most severe meteorological and traffic conditions, concentrations of CO are limited to locations within a relatively short distance (i.e., up to 600 feet or 185 meters) of heavily traveled roadways. Overall, CO emissions are decreasing as a result of the Federal Motor Vehicle Control Program, which has mandated increasingly lower emission levels for vehicles manufactured since 1973. CO levels in the SoCAB are in attainment with the State and federal 1-hour and 8-hour standards. (Psomas 2024a)

Sulfur Dioxide

SO_x is a class of compounds of which SO_2 and sulfur trioxide (SO_3) are of greatest importance. Ninety-five percent of pollution-related SO_x emissions are in the form of SO_2. SO_x emissions are typically examined when assessing potential air quality impacts of SO_2. The primary contributor of SO_x emissions is fossil fuel combustion for generating electric power. Industrial processes, such as nonferrous metal smelting, also contribute to SO_x emissions. SO_x are also formed during combustion of motor fuels; however, most of the sulfur has been removed from fuels, greatly reducing SO_x emissions from vehicles. (Psomas 2024a)

SO_2 combines easily with water vapor, forming aerosols of sulfurous acid (H_2SO_3), a colorless, mildly corrosive liquid. This liquid may then combine with oxygen in the air, forming the even more irritating and corrosive sulfuric acid (H_2SO_4). Peak levels of SO_2 in the air can cause temporary breathing difficulty for people with asthma who are active outdoors. Longer-term exposures to high levels of SO_2 gas and particles cause respiratory illness and aggravate existing heart disease. SO_2 reacts with other chemicals in the air to form tiny sulfate particles that are measured as PM2.5. SO_2 levels in the SoCAB are in attainment with State and federal 1-hour and 24--hour standards. (Psomas 2024a)

Lead

Lead is a stable compound, which persists and accumulates both in the environment and in animals. In humans, it affects the body's blood-forming (or hematopoietic), nervous, and renal systems. In addition, lead has been shown to affect the normal functions of the reproductive,

endocrine, hepatic, cardiovascular, immunological, and gastrointestinal systems, although there is significant individual variability in response to lead exposure. Since 1975, lead emissions have been in decline due, in part, to the introduction of catalyst-equipped vehicles and the decline in the production of leaded gasoline. In general, an analysis of lead is limited to projects that emit significant quantities of the pollutant (i.e., lead smelters) and are not applied to transportation sources of emissions. Lead levels in the Los Angeles County portion of the SoCAB are not in attainment with federal 3-month rolling average standards. (Psomas 2024a)

Toxic Air Contaminants

Toxic air contaminants (TACs) are a diverse group of air pollutants that may cause or contribute to an increase in deaths or in serious illness or that may pose a present or potential hazard to human health. TACs include both organic and inorganic chemical substances that may be emitted from a variety of common sources, including motor vehicles, gasoline stations, dry cleaners, industrial operations, painting operations, and research and teaching facilities. (Psomas 2024a)

TACs are different than the “criteria” pollutants previously discussed in that ambient air quality standards have not been established for them. TACs occurring at extremely low levels may still cause health effects, and it is typically difficult to identify levels of exposure that do not produce adverse health effects. TAC impacts are described by carcinogenic risk and chronic (i.e., of long duration) and acute (i.e., severe but of short duration) adverse effects on human health. (Psomas 2024a)

Diesel engines emit a complex mixture of air pollutants composed of gaseous and solid material. The solid emissions in diesel exhaust are known as diesel particulate matter (DPM). In 1998, California identified DPM as a TAC based on its potential to cause cancer, premature death, and other health problems (e.g., asthma attacks and other respiratory symptoms). Those most vulnerable are children (whose lungs are still developing) and the elderly (who may have other serious health problems). Overall, diesel engine emissions are responsible for the majority of California’s known cancer risk from outdoor air pollutants. Diesel engines also contribute to California’s PM2.5 air quality problems. (Psomas 2024a)

The SCAQMD provides three thresholds of significance for TACs: the Maximum Incremental Cancer Risk threshold of greater than 10 in 1 million, the Cancer Burden threshold of greater than 0.5 excess cancer cases (in areas ≥ 1 in 1 million), and the Chronic and Acute Hazard Index of greater than 1.0 (SCAQMD 2023).

Carcinogenic risks (i.e., cancer risks) are estimated as the incremental probability that an individual will develop cancer over his/her lifetime as a direct result of exposure to potential carcinogens. The estimated risk is expressed as a probability (e.g., 10 in a million). A risk level of 1 in a million implies a likelihood that up to 1 person out of 1 million equally exposed people would contract cancer if exposed continuously (24 hours per day) to the specific concentration over 70 years (an assumed lifetime). This would be in addition to those cancer cases that would normally occur in an unexposed population of 1 million people. (Psomas 2024a)

Different from carcinogenic risks, the Hazard Index (HI) expresses the potential for chemicals to result in non-cancer-related health impacts. HIs are expressed using decimal notation (e.g., 0.001). A calculated HI exposure of less than 1.0 will likely not result in adverse non-cancer-related health effects over a lifetime of exposure. Although a value of 1.0 is a commonly accepted CEQA significance threshold, an HI greater than 1.0 does not necessarily mean that adverse effects will occur. (Psomas 2024a)

The Multiple Air Toxics Exposure Study V (MATES V) is a monitoring and evaluation study conducted in the SoCAB. According to the MATES V Study, the carcinogenic risk from air toxics in the SoCAB has continued to improve over time. While toxic air pollutants decreased by more than 54 percent from 2012 to 2018, the cancer risk for residents of the SoCAB was 455 in 1 million in the year 2018. The results of the MATES V Study indicate that diesel exhaust is the primary contributor to air toxics risk within the SoCAB. (Psomas 2024a)

Sensitive Air Quality Receptors

The SCAQMD defines a "sensitive receptor" as a land use or facility such as residences, schools, childcare centers, athletic facilities, playgrounds, retirement homes, and convalescent homes. The closest sensitive receptors to the Project Site are the single-family residences located approximately 160 feet east of the site along the east side of Del Mar Avenue. This distance was measured from the Project Site's eastern boundary to the southwestern property line of the nearest single-family unit. The location of the proposed storage building is located approximately 700 feet away from the property line of these residences. Other sensitive receptors located within the vicinity of the Project Site include Los Cerritos Elementary School and Los Cerritos Park. No sensitive receptors are or would be located on the Project Site. (Psomas 2024a)

Ambient Air Quality

The SCAQMD measures criteria air pollutant concentrations at several monitoring stations in Los Angeles County. Air quality data for the proposed Project Site is represented by the Long Beach – Signal Hill monitoring station located at 1710 E 20th St., Signal Hill. The monitoring station is located approximately 2.9 miles southeast of the Project Site. Pollutants measured at the Long Beach – Signal Hill monitoring station include O_3, PM2.5, PM10, and NO_2. The monitoring data presented in Table 4.2-1, Air Quality Levels Measured at the Long Beach – Signal Hill Monitoring Station, include maximum pollutant levels and exceedances of federal and State air quality standards for the years 2020-2022. (Psomas 2024a)

TABLE 4.2-1
AIR QUALITY LEVELS MEASURED AT
LONG BEACH – SIGNAL HILL MONITORING STATIONS

Pollutant	California Standard	National Standard	Year	Max. Level[a]	State Standard Days Exceeded[b]	National Standard Days Exceeded[b, c]
O_3 (1 hour)	0.09 ppm	None	2020	0.105	4	N/A
			2021	0.086	0	N/A
			2022	0.108	1	N/A
O_3 (8 hour)	0.070 ppm	0.070 ppm	2020	0.083	4	4
			2021	0.064	0	0
			2022	0.077	1	1
PM10 (24 hour)	50 µg/m^3	150 µg/m^3	2020	N/A	N/A	N/A
			2021	N/A	N/A	N/A
			2022	57.9	0	0
PM10 (AAM)	20 µg/m^3	None	2020	–	N/A	N/A
			2021	–	N/A	N/A
			2022	57.9	2	0
NO_2 (1 hour)	0.18 ppm	0.100 ppm	2020	0.075	0	0
			2021	0.059	0	0
			2022	0.058	0	0
NO_2 (AAM)	0.030 ppm	0.053 ppm	2020	0.012	0	0
			2021	0.012	0	0
			2022	0.012	0	0
CO (1 hour)	20 ppm	35 ppm	2020	N/A	NA	NA
			2021	N/A	NA	NA
			2022	N/A	NA	NA
CO (8 hour)	9 ppm	9 ppm	2020	N/A	NA	NA
			2021	N/A	NA	NA
			2022	N/A	NA	NA
PM2.5 (24 Hour)	None	35 µg/m^3	2020	N/A	N/A	N/A
			2021	N/A	N/A	N/A
			2022	28.8	0	0
PM2.5 (AAM)	12 µg/m^3	15 µg/m^3	2020	N/A	NA	NA
			2021	N/A	NA	NA
			2022	10.8	NA	NA

NA: Not Available

Source: CARB 2022b.

B. Regulatory Framework

The Project Site is located in the SoCAB. Air quality in the SoCAB is regulated by the USEPA, CARB, and the SCAQMD. Each of these agencies develops rules, regulations, policies, and/or goals to comply with applicable legislation. Both State and local regulations may be more, but not less, stringent than USEPA regulations. The Southern California Association of Governments (SCAG) is an important partner to the SCAQMD and produces estimates of anticipated future growth and vehicular travel in the basin that are used for air quality planning. The federal, State, regional, and local regulations for criteria air pollutants and TACs are discussed below. (Psomas 2024a)

Federal

United States Environmental Protection Agency

The USEPA is responsible for implementing the Clean Air Act (CAA), which was first enacted in 1955[2] and amended numerous times thereafter. The CAA established federal air quality standards known as the National Ambient Air Quality Standards (NAAQS). These standards identify levels of air quality for criteria pollutants that are considered the maximum levels of ambient (background) air pollutants considered safe (with an adequate margin of safety) to protect the public's health and welfare. The USEPA is responsible for setting and enforcing the NAAQS for criteria pollutants. The NAAQS are shown in Table 4.2-2, California and National Ambient Air Quality Standards. (USEPA 2023c)

The USEPA directly regulates emission sources that are under the exclusive authority of the federal government, such as aircraft, ships, and certain locomotives while stationary sources of emissions such as from industrial uses are regulated by local air pollution control districts. The USEPA requires each State with federal nonattainment areas to prepare and submit a State Implementation Plan (SIP). In addition, the USEPA requires states to regulate other sources of emissions through the SIP. The SIP must integrate federal, State, and local plan components and regulations to identify specific measures to reduce pollution and thereby bring areas of nonattainment into attainment and maintain federal air quality standards by using a combination of performance standards and market-based programs within the SIP-identified time frame. (USEPA 2023c)

[2] The Air Pollution Control Act, the predecessor to the Clean Air Act, was enacted in 1955.

TABLE 4.2-2
CALIFORNIA AND NATIONAL AMBIENT AIR QUALITY STANDARDS

Pollutant	Averaging Time	California Standards	Federal Standards	
			Primary[a]	Secondary[b]
O_3	1 Hour	0.09 ppm (180 µg/m^3)	–	–
	8 Hour	0.070 ppm (137 µg/m^3)	0.070 ppm (137 µg/m^3)	Same as Primary
PM10	24 Hour	50 µg/m^3	150 µg/m^3	Same as Primary
	AAM	20 µg/m^3	–	–
PM2.5	24 Hour	–	35 µg/m^3	Same as Primary
	AAM	12 µg/m^3	9.0 µg/m^3	15.0 µg/m^3
CO	1 Hour	20 ppm (23 mg/m^3)	35 ppm (40 mg/m^3)	–
	8 Hour	9.0 ppm (10 mg/m^3)	9 ppm (10 mg/m^3)	–
NO_2	AAM	0.030 ppm (57 µg/m^3)	0.053 ppm (100 µg/m^3)	Same as Primary
	1 Hour	0.18 ppm (339 µg/m^3)	0.100 ppm (188 µg/m^3)	–
SO_2	24 Hour	0.04 ppm (105 µg/m^3)	–	–
	3 Hour	–	–	0.5 ppm (1,300 µg/m^3)
	1 Hour	0.25 ppm (655 µg/m^3)	0.075 ppm (196 µg/m^3)	–
Lead	30-day Avg.	1.5 µg/m^3	–	–
	Calendar Quarter	–	1.5 µg/m^3	Same as Primary
	Rolling 3-month Avg.	–	0.15 µg/m^3	
Visibility Reducing Particles	8 Hour	Extinction coefficient of 0.23 per km – visibility ≥ 10 miles	**No Federal Standards**	
Sulfates	24 Hour	25 µg/m^3		
Hydrogen Sulfide	1 Hour	0.03 ppm (42 µg/m^3)		
Vinyl Chloride	24 Hour	0.01 ppm (26 µg/m^3)		

O_3: ozone, ppm: parts per million, µg/m^3: micrograms per cubic meter, –: No Standard; PM10: respirable particulate matter with a diameter of 10 microns or less, AAM: Annual Arithmetic Mean, PM2.5: fine particulate matter with a diameter of 2.5 microns or less, CO: carbon monoxide, mg/m^3: milligrams per cubic meter, NO_2: nitrogen dioxide, SO_2: sulfur dioxide, km: kilometer.

[a] National Primary Standards: The levels of air quality necessary, within an adequate margin of safety, to protect the public health.

[b] National Secondary Standards: The levels of air quality necessary to protect the public welfare from any known or anticipated adverse effects of a pollutant.

Note: More detailed information in the data presented in this table can be found at the CARB website (www.arb.ca.gov).

Source: CARB 2016.

As indicated previously, the SoCAB is a nonattainment area for PM10 (State), PM2.5 (State and federal), and O_3 (State and federal). An area falls into nonattainment when that specific area fails to meet (or that contributes to ambient air quality in a nearby area that does not meet) the national primary or secondary ambient air quality standard for a NAAQS. An area is considered to be in attainment when that area meets the national primary or secondary ambient air quality standard for a NAAQS. (USEPA 2023c)

State

California Air Resources Board

The California Air Resources Board (CARB), as part of the California Environmental Protection Agency (CalEPA), is responsible for coordinating and administering both the federal and State air pollution control programs in California. In this capacity, CARB establishes the California Ambient Air Quality Standards (CAAQS), as shown in Table 4.2-2, which are generally more stringent and apply to more pollutants than the NAAQS. In addition to the criteria pollutants, CAAQS have been established for visibility-reducing particulates, sulfates, hydrogen sulfide, and vinyl chloride.

In addition, CARB conducts research, compiles emissions inventories, develops suggested control measures, provides oversight of local programs, and prepares the State Implementation Plan (SIP). The SIP is based on an emissions inventory for the State based emissions information provided from each of the 35 local air districts. CARB requires the air districts in regions that do not attain the CAAQS to prepare plans for attaining the standards. CARB reviews each of these plans and determines whether each region is demonstrating sufficient progress toward attainment of State and federal ambient air quality standards. These plans are then integrated into the State SIP. The latest adopted SIP is the 2022 State SIP Strategy. (CARB 2022a). SIPs are generally enforced by the State but the EPA has authorization to take enforcement action against violators for federally-approved SIPs. The public can also file citizen suits under the federal Clean Air Act to address violations of SIPs.

CARB establishes emissions standards for motor vehicles sold in California, consumer products (e.g., hair spray, aerosol paints, and barbecue lighter fluid), and various types of commercial equipment. It also sets fuel and emission specifications to further reduce onroad and offroad vehicular emissions.

Attainment Status

Based on monitored air pollutant concentrations, the USEPA and CARB designate an area's status in attaining the NAAQS and the CAAQS, respectively, for selected criteria pollutants. These attainment designations for the SoCAB are shown in Table 4.2-3, Attainment Status of Criteria Pollutants in the South Coast Air Basin. As shown, the SoCAB is a nonattainment area for PM10 (State), PM2.5 (State and federal), and O_3 (State and federal).

TABLE 4.2-3
ATTAINMENT STATUS OF CRITERIA POLLUTANTS
IN THE SOUTH COAST AIR BASIN

Pollutant	State	Federal
O_3 (1-hour)	Nonattainment	No Standards
O_3 (8-hour)	Nonattainment	Extreme Nonattainment
PM10	Nonattainment	Attainment/Maintenance
PM2.5	Nonattainment	Serious Nonattainment
CO	Attainment	Attainment/Maintenance
NO_2	Attainment	Attainment
SO_2	Attainment	Attainment
Lead	No Standard	Attainment/Nonattainment*
All others	Attainment/Unclassified	No Standards

O_3: ozone; PM10: particulate matter 10 microns or less in diameter; PM2.5: particulate matter 2.5 microns or less in diameter; CO: carbon monoxide; NO_2: nitrogen dioxide; SO_2: sulfur dioxide.

* The Los Angeles County portion of the SoCAB is designated nonattainment for lead; the remainder of the SoCAB is designated attainment.

Source: SCAQMD 2016

The California Clean Air Act (CCAA), which was approved in 1988, requires that each local air district prepare and maintain an AQMP to achieve compliance with CAAQS. These AQMPs also serve as the basis for the preparation of the SIP for meeting federal clean air standards for California. The AQMP for the SoCAB is discussed below under Regional Regulatory Framework.

Title 24 Energy Efficiency Standards

The Energy Efficiency Standards for Residential and Nonresidential Buildings (CCR, Title 24, Part 6) were established in 1978 in response to a legislative mandate to reduce California's energy consumption. The current applicable standards are the 2022 Standards, effective January 1, 2023 (CBSC 2022). The requirements of the energy efficiency standards result in the reduction of natural gas and electricity consumption. Since using natural gas produces criteria pollutant emissions, a reduction in natural gas consumption results in a related reduction in air quality emissions.[3] Additional discussion of the Title 24 energy efficiency standards is included in Sections 4.5, Energy, and 4.7, Greenhouse Gas Emissions. The 2022 Energy Code focuses on four key areas in newly constructed homes and businesses:

- Encouraging electric heat pump technology for space and water heating, which consumes less energy and produces fewer emissions than gas-powered units.
- Establishing electric-ready requirements for single-family homes to position owners to use cleaner electric heating, cooking and electric vehicle (EV) charging options whenever they choose to adopt those technologies.
- Expanding solar photovoltaic (PV) system and battery storage standards to make clean energy available onsite and complement the state's progress toward a 100 percent clean electricity grid.
- Strengthening ventilation standards to improve indoor air quality.

[3] Because electricity would not be generated on the Project Site, the emissions associated with electricity generation are not included in the emissions calculations.

California Green Building Standards Code

The 2022 California Green Building Standards Code (CCR, Title 24, Part 11), also known as the "CALGreen Code," contains mandatory requirements and voluntary measures for new residential and non-residential buildings (including buildings for retail uses, office uses, public schools, and hospitals) throughout California (CBSC 2022). Development of the CALGreen Code is intended to (1) cause a reduction in GHG emissions from buildings; (2) promote environmentally responsible, cost-effective, healthier places to live and work; (3) reduce energy and water consumption; and (4) respond to the directives by the Governor. The CALGreen Code was established to reduce construction waste; make buildings more efficient in the use of materials and energy; and reduce environmental impact during and after construction. The regulation of energy efficiency for residential and non-residential structures is established by the CEC and its California Energy Code. The City has adopted the CALGreen Code in AMC Section 15.03.010 Adoption of Building Standards Codes.

The CALGreen Code provides standards for bicycle parking, carpool/vanpool/electric vehicle spaces, light and glare reduction, grading and paving, energy-efficient appliances, renewable energy, graywater systems, water efficient plumbing fixtures, recycling and recycled materials, pollutant controls (including moisture control and indoor air quality), acoustical controls, storm water management, building design, insulation, flooring, and framing, among others. Implementation of the CALGreen Code measures reduces energy consumption and vehicle trips and encourages the use of alternative-fuel vehicles which, in turn, reduces pollutant emissions. Additional discussion of the CALGreen Code is included in Sections 4.5, Energy, and 4.7, Greenhouse Gas Emissions.

Regional

South Coast Air Quality Management District

In the SoCAB, the SCAQMD is the agency responsible for protecting public health and welfare through the administration of federal and State air quality laws, regulations, and policies. The SCAQMD is 1 of 35 local air districts responsible for regional air quality planning, controlling emissions primarily from stationary sources. The SCAQMD administers air quality improvement grant programs and is CARB's primary partner in efforts to ensure that those located within the SoCAB breathe clean air. Included in the SCAQMD's tasks are the monitoring of air pollution, the preparation of the AQMP for the SoCAB, and the promulgation of rules and regulations. (CARB 2024)

Southern California Association of Governments

The Southern California Association of Governments (SCAG) is the federally designated Metropolitan Planning Organization and the State-designated transportation planning agency for six counties: Riverside, San Bernardino, Los Angeles, Ventura, Imperial, and Orange. SCAG serves as a forum for regional issues relating to transportation, the economy, community development, and the environment. On April 4, 2024, SCAG's Regional Council adopted the 2024-2050 Regional Transportation Plan/Sustainable Communities Strategy (Connect SoCal). The RTP/SCS is a long-range visioning plan that balances future mobility and housing needs with economic, environmental, and public health goals. The RTP/SCS includes a strong commitment to reduce emissions from transportation sources in order to improve public health, to meet the NAAQS as set forth by the CAA.

The SCAQMD and SCAG are jointly responsible for formulating and implementing the AQMP for the SoCAB. SCAG's Regional Mobility Plan and Growth Management Plan form the basis for the land use and transportation control portion of the AQMP.

Air Quality Management Plan

The current regional plan applicable to the Project is the SCAQMD's 2022 AQMP. The SCAQMD is responsible for ensuring that the SoCAB meets the NAAQS and CAAQS by reducing emissions from stationary (area and point), mobile (cars, trucks and buses, ships, trains, airplanes, and construction equipment), and indirect sources. (SCAQMD 2024) According to the SCAQMD, indirect sources constitute any facility, building, structure, or installation, or combination thereof, which generates or attracts mobile source activity that results in emissions of any pollutant (or precursor) for which there is a State Ambient Air Quality Standard. (SCAQMD 2022) Indirect sources include, but are not limited to, collegiate and professional sports stadiums/arenas, shopping centers, and warehouses. To accomplish this goal, the SCAQMD prepares AQMPs in conjunction with the SCAG, County transportation commissions, and local governments; develops rules and regulations; establishes permitting requirements for stationary sources; inspects emissions sources; and enforces such measures through educational programs or fines, when necessary.

The 2022 AQMP was adopted on December 2, 2022, by the SCAQMD Governing Board. The 2022 AQMP evaluates integrated strategies and measures to meet the following NAAQS for the following criteria pollutants in which the SoCAB is in a state of nonattainment (SCAQMD 2022):

- 8-hour O_3 target of 80 parts per billion (ppb) by 2024, 75 ppb by 2032, 70 ppb by 2038;
- Annual PM2.5 (12 micrograms per cubic meter [µg/m^3]) by 2025;
- 1-hour O_3 (120 ppb) by 2023; and
- 24-hour PM2.5 (35 µg/m^3) by 2023.

South Coast Air Quality Management District Rules

The Project would be required to comply with existing SCAQMD rules for the reduction of fugitive dust and criteria pollutant emissions. The following rules are most relevant to the Project.

SCAQMD Rule 201 requires a "Permit to Construct" prior to the installation of any equipment (such as blast/cupola furnaces, spray booths, dry-cleaning equipment, or metal finishing/plating equipment) "the use of which may cause the issuance of air contaminants . . ." and Regulation II provides the requirements for the application for a Permit to Construct.[4]

SCAQMD Rule 203 similarly requires a Permit to Operate.

SCAQMD Rule 219, **Equipment not Requiring a Written Permit Pursuant to Regulation II**, identifies "equipment, processes, or operations that emit small amounts of contaminants that shall not require written permits . . .". This Rule provides a list of equipment that is exempt from Rules 201 and 203.

SCAQMD Rule 401, Visible Emissions states that "a person shall not discharge into the atmosphere from any single source of emission whatsoever any air contaminant for a period or periods aggregating more than 3 minutes in any 1 hour which is as dark or darker in shade as

[4] SCAQMD Rule 201 would be applicable to any equipment the use of which may cause the issuance of air contaminants including the soil venting system and building protection system.

that designated No. 1 on the Ringelmann Chart, as published by the United States Bureau of Mines, or is of such opacity as to obscure an observer's view to a degree equal to or greater than does smoke described in subparagraph (b)(1)(A) of this rule."

SCAQMD Rule 402, Nuisance states that a project 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."

SCAQMD Rule 403, Fugitive Dust requires actions to prevent, reduce, or mitigate fugitive particulate matter emissions. These actions include applying water or chemical stabilizers to disturbed soils; managing haul road dust by applying water; covering all haul vehicles before transporting materials; restricting vehicle speeds on unpaved roads to 15 miles per hour (mph); and sweeping loose dirt from paved site access roadways used by construction vehicles. In addition, Rule 403 requires that vegetative ground cover be established on disturbance areas that are inactive within 30 days after active operations have ceased. Alternatively, an application of dust suppressants can be applied in sufficient quantity and frequency to maintain a stable surface. Rule 403 also requires grading and excavation activities to cease when winds exceed 25 mph.

SCAQMD Rule 445 has been adopted to reduce the emissions of particulate matter from wood-burning devices and prohibits the installation of such devices in any new development.

SCAQMD Rule 1113 governs the sale of architectural coatings and limits the VOC content in paints and paint solvents. Although this rule does not directly apply to the proposed Project, it does dictate the VOC content of paints available for use during building construction and ongoing maintenance.

SCAQMD Rule 1166 establishes requirements to control the emission of VOC from excavating, grading, handling and treating VOC-contaminated soil as a result of leakage from storage or transfer operations, accidental spillage, or other deposition. This rule requires that an approved mitigation plan be obtained from SCAQMD prior to excavation of materials containing VOCs, handling or storage or VOC-contaminated soil, or treatment of VOC-contaminated soil.

SCAQMD Rule 1466 was established to minimize the amount of off-site fugitive dust emissions containing toxic air contaminants by reducing particulate emissions in the ambient air as a result of earth-moving activities, including from the removal of soil that contains applicable toxic air contaminants. This rule mandates ambient PM10 monitoring, dust control measures, notification, signage, and recordkeeping requirements.

Local

City of Long Beach General Plan – Air Quality Element

The City of Long Beach General Plan contains an Air Quality Element that was adopted in 1996. The Air Quality Element serves to establish policies that will guide future land use and transportation decisions in the City; implement regional air quality plans; heighten awareness of air quality efforts and impacts in the community; and promote greater collaboration amongst all levels of government to address air quality issues. Policies contained within the Air Quality Element include eliminating vehicle trips; reducing vehicle miles traveled (VMT); promoting the use of alternative fuels such as electric vehicles and compressed natural gas (CNG); promoting transit-oriented development; minimizing particulate matter emissions generated during construction; reducing energy related emissions; promoting increased air quality monitoring; and

educating the public on modifying travel behavior and energy consumption. (City of Long Beach 1996)

4.2.3 PROJECT IMPACTS

A. Thresholds of Significance

In accordance with Appendix G of the State CEQA Guidelines, a project would result in a significant biological resources impact if it would:

Threshold 4.2a ***Would the project conflict with or obstruct implementation of the applicable air quality plan?***

Threshold 4.2b ***Would the project result in a cumulatively considerable net increase of any criteria pollutant for which the project region is in non-attainment under an applicable federal or state ambient air quality standard?***

Threshold 4.2c ***Would the project expose sensitive receptors to substantial pollutant concentrations?***

Threshold 4.2d ***Would the project result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?***

B. Methodology

California Emissions Estimator Model

The Project's construction and operations phase emissions were calculated by using California Emissions Estimator Model (CalEEMod) version 2022.1.1.0 (CAPCOA 2022). CalEEMod is designed to model construction and operational emissions for land development projects and allows for the input of project- and County-specific information. The purpose of CalEEMod is to provide a uniform platform for government agencies, land use planners, and environmental professionals to quantify potential criteria pollutant and greenhouse gas (GHG) emissions associated with both construction and operations from a variety of land use projects. The model quantifies direct emissions from construction and operation activities (including vehicle use), as well as indirect emissions, such as GHG emissions from energy use, solid waste disposal, vegetation planting and/or removal, and water use. Furthermore, the model identifies mitigation measures to reduce criteria pollutant and GHG emissions along with calculating the benefits achieved from measures chosen by the user (CAPCOA 2023). CalEEMod was developed by ICF in collaboration with the Sacramento Metropolitan Air Quality Management District, Fehr and Peers, STI, and Ramboll. CalEEMod is a computer program accepted by the SCAQMD that can be used to estimate criteria pollutant and GHG emissions associated with land development projects in California (SCAQMD 2024). CalEEMod has separate databases for specific counties and air districts. The Los Angeles County database was used for the Project. The model calculates emissions of CO, SO_2, PM10, PM2.5, and the O_3 precursors VOC, NO_x, and greenhouse gases. For this analysis, the results are compared with the SCAQMD mass daily thresholds described in Section 4.2.3 below to determine potential air quality and greenhouse gas impacts for Project-related construction and operations phase emissions.

Construction Mass Daily Emissions

Specific inputs to CalEEMod include land uses and acreages. Construction input data include but are not limited to: (1) the anticipated start and finish dates of each construction activity (e.g., grading, building, and paving); (2) inventories of construction equipment to be used during each

Project activity; (3) areas to be graded for development; (4) volumes of materials to be imported to and exported from the Project Site; (5) areas to be paved; and (6) areas to be painted.

Construction activities for purposes of analyzing the Project's air quality impact include the following phases:

- Site preparation, which involves clearing vegetation (grubbing and tree/stump removal) and removing stones and other unwanted material or debris prior to grading in addition to activities associated with prior development of the surcharge pile.
- Mass grading activities, which involves the cut and fill of land to ensure that the proper base and slope is created for the self-storage building foundation and RV storage parking areas.
- Building construction, which involves the construction of the building foundations, any ancillary structures, and the buildings (self-storage and carwash) themselves.
- Paving, which involves the laying of concrete or asphalt such as in parking lots, roads, driveways, or sidewalks.
- Architectural coatings, which involves the application of coatings to both the interior and exterior of buildings or structures, the painting of parking lot or parking garage striping, associated signage and curbs, and the painting of the walls or other components such as stair railings inside parking structures.

Additionally, the above construction phasing includes implementation of the Project's Response Plan. The input data and assumptions are discussed in Section 4.2.4 below and are shown in notes on the CalEEMod data in Appendix C-3. The CalEEMod model has the capability to calculate reductions in construction emissions from the effects of dust control, off-road diesel-engine classifications, low-emission paints, and other selected measures.

To capture the full scope of potential air quality impacts for the Project, the surcharge activities that occurred from late 2020 through early 2021 were included in the air quality modeling and analysis. Specifically, the actual number and type of offroad construction vehicles used for past construction activities were based on data provided by the Applicant's contractor, while the number and type of offroad construction vehicles expected to be used for future construction activities were based on a mixture of data from the CalEEMod model and estimates by the Applicant's contractor. In sum, the estimate of construction activities and subsequent emissions, and their comparison to the SCAQMD thresholds, is presented to provide an estimate of potential air quality impacts associated with Project construction.

Operational Mass Daily Emissions

The Project includes the operation of a self-storage building and RV storage, which is a unique land use that is not included in CalEEMod's default land use categories. Therefore, to model Project emissions associated with self-storage land uses, CalEEMod's "User Defined Commercial" land use category was selected since there is no commercial subtype for self-storage uses. Any fields not automatically populated with data provided by CalEEMod were populated with project-specific data provided by the City and the Applicant, which are included in Appendix C-3. In addition, consistent with the Project's Vehicle Miles Traveled (VMT) Analysis, which is provided in Appendix M, all trips associated with the Self-Storage land use were included within CalEEMod under "User Defined Commercial".

Operational inputs to CalEEMod include: (1) the specific year for project operations, (2) vehicle trip generation rates, and (3) energy use. Output operational emissions data are separated into

energy use, which includes electricity consumption, area sources, and mobile sources. The area sources are landscape maintenance equipment, consumer products, and architectural coatings used for routine maintenance. Consumer products (e.g., household cleaners, air fresheners, automotive products, and personal care products) emit VOCs. Mobile sources are the vehicles used by employees, customers/visitors, and vendors traveling to and from the Project Site. CalEEMod also includes data to calculate emissions reductions based on project-specific characteristics and results from the implementation of mitigation measures.

Local Concentrations of Criteria Pollutants from On-Site Sources

The localized effects from the onsite portion of daily construction and operational emissions were also evaluated at receptor locations potentially impacted by the Project according to the SCAQMD's localized significance threshold (LST) method, which utilizes onsite emissions rate look up tables and Project-specific modeling, where appropriate (SCAQMD 2008). LSTs are applicable to the following criteria pollutants: NO_2, CO, PM10, and PM2.5. 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 developed based on the ambient concentrations of that pollutant for each source receptor area and distance to the nearest receptor. For the LST CO and NO_2 exposure analysis, receptors who could be exposed for 1 hour or more are considered, such as residential units, hospitals, assisted living, and congregate care. For PM10 and PM2.5 exposure analysis, receptors who could be exposed for 24 hours are considered, such as residential units, hospitals, assisted living, and congregate care. As discussed previously, the nearest receptors are residential and school uses located to the east of the Project Site. The mass rate look-up tables were developed for each source receptor area and are used to determine whether a project may generate significant adverse localized air quality impacts. The SoCAB is divided into source receptor areas based on factors that include meteorological conditions. The City of Long Beach is in source-receptor area 4, South Coastal LA County. The SCAQMD provides LST mass rate look-up tables for projects that are less than or equal to five acres. For projects that exceed five acres, such as the proposed Project, the five-acre LST lookup values can be used as a screening tool to determine which pollutants require detailed analysis (Krause 2018). Although the Project Site is larger than five acres, SCAQMD recognizes the efficacy of using the LST for larger sites if it is demonstrated that the calculated Project emissions would be less than the five-acre site emissions limits. The SCAQMD released guidance titled "Fact Sheet for Applying CalEEMod to Localized Significance Thresholds," which clarifies that acreage is based on the daily soil disturbance area for each piece of equipment during each construction phase. Based on this methodology, the Project's construction would not disturb more than 5 acres per day, making it appropriate to apply the LST look-up tables to the Project Site. If a project exceeds the LST look-up values, then the SCAQMD recommends that project-specific localized air quality modeling be performed.

When quantifying mass emissions for localized analysis, only emissions that occur on site are considered (SCAQMD 2008). Consistent with the SCAQMD's Final Localized Significance Threshold Methodology, emissions related to offsite delivery/haul truck activity and employee trips are not considered in the evaluation of localized impacts (SCAQMD 2008). The LST methodology was developed to be used as a tool to assist lead agencies to analyze localized impacts associated with project-specific level proposed projects. The LST methodology and associated mass rates are not designed to evaluate localized impacts from mobile sources traveling over roadways. (SCAQMD 2008).

Health Risk Assessment

Health risks represent the increase in cancer and non-cancer risks to sensitive uses proximate to the Project associated with exposure to TACs from construction equipment and operations

emissions generated from the Project. These sensitive uses include the residential uses located 160 feet to the east of the Project Site; Los Cerritos Elementary School, located 170 feet to the east of the Project Site; and Los Cerritos Park, located 345 feet to the east of the Project Site. For the portion of the Project operations implicated in the HRA's TAC assessment (the operation of RVs onsite), the methodology assumes that a person is exposed continuously (24-hours per day) to a source of TAC emissions over a 30-year exposure period for residential uses. For construction activities, the exposure duration lasts as long as construction activities occur. The construction emissions modeling includes surcharge and remediation activities (movement of Areas of elevated concentrations (AECs) that occurred in 2020-2021 as well as planned activities occurring in 2024-2026. Cancer risk is expressed as the probability of one person developing cancer out of a million persons due to exposure to TAC emissions for the exposure duration that emissions would occur. A receptor calculated to have a cancer risk of one in one million means that this receptor has a probability of one in one million of developing cancer from the intermittent exposure to diesel particulate matter (DPM) from the Project Site. For operations, DPM is analyzed in the HRA due to RVs using diesel fuel and diesel exhaust representing the primary source of health risk in the air basin. No other TACs would be emitted since hazardous materials are prohibited from the self-storage facility. The HRA conservatively assumed that all RVs are emitting DPM despite estimates from the ARB EMFAC2021 model shows that approximately one-third of the population of recreational vehicles are using diesel fuel (EMFAC2021). In addition to potential cancer risks, TACs can result in short-term and long-term non-cancer impacts. The Office of Environmental Health Hazard Assessment (OEHHA) specifies a significance threshold for acute (short-term) and chronic (long-term) non-cancer impacts, which is represented by a HI. The HI is based on whether TACs would exceed the Reference Exposure Level (REL), which is the level at which no adverse non-cancer health effects are anticipated. OEHHA developed acute RELs for assessing potential noncancer health impacts for short-term, 1-hour peak exposures to emissions. The OEHHA has developed chronic RELs for assessing noncancer health impacts from long-term exposure. The assumptions applied in calculating cancer and noncancer health risk from the various TACs are based on the methodology published by the SCAQMD and the OEHHA. The HARP2 model developed by the CARB was used to calculate the health risk exposure at the Project Site based on ground-level concentrations of DPM developed with the USEPA's AMS/EPA Regulatory Model (AERMOD) air pollutant dispersion modeling. The AERMOD model has been accepted for use by the SCAQMD for air pollutant dispersion modeling (SCAQMD 2024). The Health Risk Assessment is included in Appendix C-2.

Additionally, a screening level human health risk evaluation was conducted for on-site receptors associated with TACs from the disturbance of on-site soil during construction as part of the Project's environmental investigation. (Roux 2020a) Mitigation measures outlined in the Project's Soil Management Plan and monitoring requirements outlined in the Ambient Air Monitoring Plan were implemented during the Surcharge program and, per **MM HAZ-1**, the Soil Management Plan, Excavation Management Plan, and Ambient Air Monitoring Plan are required to be implemented during any future earth disturbing activities to manage TAC emissions below the applicable regulatory thresholds. (Roux 2020d, Roux 2020e). See Section 4.8 Hazards and Hazardous Materials for more detailed information.

CO Hotspots

The analysis of potential CO hotspots for the Project involves a discussion of ambient measurement data of CO concentrations relative to the ambient air quality standards, emissions rates associated with current automobile legislation and electric vehicle adoption, and vehicle trips attributable to the Project, as identified in the Project's Traffic Impact Assessment included as Appendix M of this DEIR.

C. Standard Requirements

The following standard requirements are applicable to the Project.

SR AQ-1 SCAQMD Rule 201 requires a "Permit to Construct" prior to the installation of any equipment "the use of which may cause the issuance of air contaminants . . ." and Regulation II provides the requirements for the application for a Permit to Construct. Rule 203 similarly requires a Permit to Operate. Rule 219, Equipment not Requiring a Written Permit Pursuant to Regulation II, identifies "equipment, processes, or operations that emit small amounts of contaminants that shall not require written permits

SR AQ-2 SCAQMD Rule 401, Visible Emissions states that "a person shall not discharge into the atmosphere from any single source of emission whatsoever any air contaminant for a period or periods aggregating more than 3 minutes in any 1 hour which is as dark or darker in shade as that designated No. 1 on the Ringelmann Chart, as published by the United States Bureau of Mines, or is of such opacity as to obscure an observer's view to a degree equal to or greater than does smoke described in subparagraph (b)(1)(A) of this rule."

SR AQ-3 SCAQMD Rule 402, Nuisance states that a project 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."

SR AQ-4 SCAQMD Rule 403, Fugitive Dust requires actions to prevent, reduce, or mitigate fugitive particulate matter emissions. These actions include applying water or chemical stabilizers to disturbed soils; managing haul road dust by applying water; covering all haul vehicles before transporting materials; restricting vehicle speeds on unpaved roads to 15 mph; and sweeping loose dirt from paved site access roadways used by construction vehicles. In addition, Rule 403 requires that vegetative ground cover be established on disturbance areas that are inactive within 30 days after active operations have ceased. Alternatively, an application of dust suppressants can be applied in sufficient quantity and frequency to maintain a stable surface. Rule 403 also requires grading and excavation activities to cease when winds exceed 25 mph.

SR AQ-5 SCAQMD Rule 445 has been adopted to reduce the emissions of particulate matter from wood-burning devices and prohibits the installation of such devices in any new development.

SR AQ-6 SCAQMD Rule 1113 governs the sale of architectural coatings and limits the VOC content in paints and paint solvents. Although this rule does not directly apply to the proposed Project, it does dictate the VOC content of paints available for use during building construction and ongoing maintenance.

SR AQ-7 SCAQMD Rule 1166 establishes requirements to control the emission of VOC from excavating, grading, handling and treating VOC-contaminated soil as a result of leakage from storage or transfer operations, accidental spillage, or other deposition. This rule requires that an approved mitigation plan be obtained from SCAQMD prior to excavation of materials containing VOCs, handling or storage or VOC-contaminated soil, or treatment of VOC-contaminated soil**.**

SR AQ-8 SCAQMD Rule 1466 was established to minimize the amount of off-site fugitive dust emissions containing toxic air contaminants by reducing particulate emissions in the ambient air as a result of earth-moving activities, including from the removal of soil that contains applicable toxic air contaminants. This rule mandates ambient PM10 monitoring, dust control measures, notification, signage, and recordkeeping requirements**.**

D. Impact Analysis

Threshold 4.2a *Would the project conflict with or obstruct implementation of the applicable air quality plan?*

Pursuant to the SCAQMD's CEQA Air Quality Handbook, a project would be inconsistent with the AQMP if it would (SCAQMD 1993):

- Create an increase in the frequency or severity of air quality violations; cause or contribute to new violations; delay attainment of air quality standards; or
- Exceed the assumptions of the AQMP.

With respect to the first criterion, the analyses in Response to Threshold 4.2b below demonstrate that, the Project would have the potential to (1) generate short-term or long-term emissions of NOx, which is an O_3 precursor that could potentially cause an increase in the frequency or severity of existing air quality violations; (2) cause or contribute to new violations; or (3) delay timely attainment of air quality standards. Prior to implementation of mitigation, the Project would result in a potentially significant impact.

With respect to the second criterion, the Project was evaluated to determine whether it would exceed the assumptions in the 2022 AQMP. The 2022 AQMP is a regional and multi-agency effort among the SCAQMD, CARB, Southern California Association of Governments (SCAG), and the USEPA. The purpose of the 2022 AQMP is to set forth a comprehensive program to promote reductions in criteria pollutants, greenhouse gases, and toxic risk and improve efficiencies in energy use, transportation, and goods movement. The 2022 AQMP incorporates the latest scientific and technical information and planning assumptions, including the 2020–2045 Regional Transportation Plan/Sustainable Communities Strategy; updated emission inventory methods for various source categories; and SCAG's latest growth forecasts (SCAQMD 2022). The 2022 AQMP includes strategies and measures necessary to meet the NAAQS. The AQMP is based on SCAG's projections of energy usage and vehicle trips from land uses within the SoCAB.

The Project Site has a General Plan land use designation (PlaceType) of Neo-Industrial (NI) and a zoning designation of Light Industrial (IL). The Project is proposing a zone change that would result in the Project Site being zoned as Commercial Storage (CS). Additionally, the Project is proposing a General Plan Amendment that would change the Project Site's PlaceType from Neo-Industrial to Community Commercial Centers and Corridors. The Project would develop a self-storage building, covered RV parking spaces, and a private car wash for exclusive use by property owner or tenants; additionally, the Project would include site improvements, landscaping, off-site improvements along Pacific Place Road, and dedication of an easement for future development and use as a publicly accessible trail and trailhead. While the Project would involve a zone change from IL to CS, the Project would not directly result in population growth or development or new land uses that have not been anticipated in the 2022 AQMP, since the assumptions made in the AQMP are based on data provided by SCAG, which in turn is derived from General Plan land use and zoning designations throughout the SoCAB. The Project would not directly result in population growth and the operation of the proposed storage uses is estimated to generate approximately

10 jobs. The total employment in Los Angeles County will increase by approximately 808,000 jobs from 2020 to 2050, and total employment in the City of Long Beach will increase by approximately 29,500 jobs from 2016 to 2045. As such, the Project's anticipated generation of 10 employees would represent a nominal amount relative to County and City projections, and estimated Project operational employment generation is well within regional forecasts for the County and City. In addition, given the small number of permanent jobs generated by the Project, it is expected that future employment positions would be filled by the local population and would not induce population growth or the need for additional housing. Furthermore, the creation of 10 new jobs as a result of the approval of the Zone Change required to implement the Project would not exceed the growth projections calculated when the Site was zoned IL since the addition of 10 new jobs would be miniscule when compared to potential employment generation from industrial uses permitted by the IL zoning. Therefore, the Project would not exceed the assumption of the 2022 AQMP since the Project would not result in employment generation or population growth not anticipated by the City or SCAG.

However, as discussed above, while the Project would not exceed the assumption of the 2022 AQMP, the Project does have the potential to (1) generate short-term or long-term emissions of NOx which is an O_3 precursor that could potentially cause an increase in the frequency or severity of existing air quality violations; (2) cause or contribute to new violations; or (3) delay timely attainment of air quality standards. As such, prior to implementation of mitigation, the Project would have the potential to result in a significant impact pursuant to this threshold.

Mitigation Measures

MM AIR-1 For construction activities that have already occurred (Surcharge Activities) onsite equipment shall be required to meet a minimum of Tier 3 or equivalent off-road engine emissions standards. For all future construction activities, prior to the issuance of each grading permit, the Applicant shall provide construction plans and specifications demonstrating that onsite equipment used for construction of the Project shall be required to meet a minimum of Tier 4 off-road engine emissions standards.

Level of Significance after Mitigation

New or Increased Air Quality Violations, or Delayed Attainment of Air Quality Standards: With incorporation of **MM AIR-1,** which requires onsite construction equipment used for the Project to meet a minimum of Tier 4 off-road engine emissions standards, the Project would not (1) generate short-term or long-term emissions of VOCs, NOx, which are O_3 precursors, PM10 or PM2.5 that could potentially cause an increase in the frequency or severity of existing air quality violations; (2) cause or contribute to new violations; or (3) delay timely attainment of air quality standards. Therefore, with implementation of **MM AIR-1**, impacts related to the Project's potential to (1) generate short-term or long-term emissions of VOCs, NOx, which are O_3 precursors, PM10 or PM2.5 that could potentially cause an increase in the frequency or severity of existing air quality violations; (2) cause or contribute to new violations; or (3) delay timely attainment of air quality standard would be less than significant with mitigation incorporated.

Exceed Assumptions of AQMP: A less than significant impact would occur and no mitigation is required.

> ***Impact Comparison Summary*****:** The DEIR's analysis concluded that the Project would result in less than significant impacts with mitigation incorporated pursuant to this threshold. The Project would result in similar impacts when compared to the impact conclusion in the MND, which identified no impact pursuant to this threshold.

Threshold 4.2b: ***Would the project result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable Federal or State ambient air quality standard?***

Appendix G of the State CEQA Guidelines (specifically, Issue Area III of the Appendix G Checklist found on Page 349 of the 2024 CEQA Guidelines) states that the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to make significance determinations (AEP 2024). The SCAQMD has established significance thresholds to assess the regional and localized impacts of project-related air pollutant emissions[5]. These significance thresholds are updated as needed to appropriately represent the most current technical information and attainment status in the SoCAB.

Table 4.2-4, SCAQMD Criteria Pollutant Significant Emissions Thresholds, presents the current SCAQMD significance thresholds, including regional daily thresholds for short-term construction and long-term operational emissions; maximum incremental cancer risk and HIs for TACs; and maximum ambient concentrations for exposure of sensitive receptors to localized pollutants. A project with daily emission rates, risk values, or concentrations below these thresholds is generally considered to have a less than significant effect on air quality.

The effects of criteria air pollutants are evaluated against the NAAQS or CAAQS which have been developed to provide air pollution standards that are protective of public health. Exceedance of these air quality standards does not describe the prevalence or magnitude of health effects, but rather assesses the potential for a project-related health effect to occur. Project level assessments of air pollutant concentrations cannot provide an estimate of specific health effects such as asthma, bronchitis, or other specific respiratory ailments due to a broad variety of uncertainties which include modeling limitations. One example provided by the SCAQMD was related to health impacts from emissions related to the ozone (smog) formation. Reactive organic gases (ROGs) and NO_x are pollutants that contribute to the formation of ozone, otherwise known as ozone precursors. It would be too speculative to determine how an individual project could affect the formation of ozone, and how it could affect the health for a specific receptor: ozone does not fully form within the proximity of a project site, and the formation of ozone is affected by solar irradiance, meteorological conditions, presence of ozone precursors from other sources, and other factors. As such, modeling of ozone concentrations is conducted on the "macro" scale of an air basin for all pollutant sources within the basin, and not for an individual project. Consequently, the use of NAAQS and CAAQS focuses on a project-level analysis of the four criteria pollutants of greatest concern (CO, NOx, PM10, and PM2.5) and provides a level at which it is considered harmful to public health but does not provide direct causation to specific health impacts.

These regional emission thresholds cannot be used to correlate whether a specific health impact would occur to an individual receptor. These significance thresholds were developed to assist Lead Agencies with a consistent threshold that could be used to determine whether a project's emissions could significantly contribute to the total emissions occurring within an air basin. The totality of the air basin's emissions would determine whether it would be in attainment of the CAAQS and NAAQS.

[5] https://www.aqmd.gov/docs/default-source/ceqa/handbook/south-coast-aqmd-air-quality-significance-thresholds.pdf?sfvrsn=25

TABLE 4.2-4
SCAQMD AIR QUALITY SIGNIFICANCE THRESHOLDS

Mass Daily Thresholds[a]		
Pollutant	**Construction**	**Operation**
NOx	100 lbs/day	55 lbs/day
VOC	75 lbs/day	55 lbs/day
PM10	150 lbs/day	150 lbs/day
PM2.5	55 lbs/day	55 lbs/day
SOx	150 lbs/day	150 lbs/day
CO	550 lbs/day	550 lbs/day
Lead	3 lbs/day	3 lbs/day
TACs, Odor, and GHG Thresholds		
TACs (including carcinogens and non-carcinogens)	Maximum Incremental Cancer Risk ≥ 10 in 1 million Cancer Burden > 0.5 excess cancer cases (in areas ≥ 1 in 1 million) Chronic & Acute Hazard Index ≥ 1.0 (project increment)	
Odor	Project creates an odor nuisance pursuant to South Coast AQMD Rule 402	
GHG	10,000 MT/yr CO_2e for industrial facilities	
Ambient Air Quality Standards for Criteria Pollutants[b, c]		
NO_2 1-hour average annual arithmetic mean	The South Coast AQMD is in attainment; the 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 µg/m^3 (construction)[c] & 2.5 µg/m^3 (operation) 1.0 µg/m^3	
PM2.5 24-hour average	 10.4 µg/m^3 (construction)[c] & 2.5 µg/m^3 (operation)	
SO_2 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 µg/m^3 (State)	
CO 1-hour average 8-hour average	South Coast AQMD is in attainment; project is significant if it causes or contributes to an exceedance of the following attainment standards: 20.0 ppm (State) and 35 ppm (federal) 9.0 ppm (State/federal)	
Lead 30-day average Rolling 3-month average	 1.5 µg/m^3 (State) 0.15 µg/m^3 (federal)	

NOx: nitrogen oxides, lbs/day: pounds per day, VOC: volatile organic compound, PM10: respirable particulate matter with a diameter of 10 microns or less, PM2.5: fine particulate matter with a diameter of 2.5 microns or less, SOx: sulfur oxides, CO: carbon monoxide, TACs: toxic air contaminants, GHG: greenhouse gases, MT/yr CO_2e: metric tons per year of carbon dioxide equivalents, NO_2: nitrogen dioxide, ppm: parts per million, µg/m^3: micrograms per cubic meter; South Coast AQMD: South Coast Air Quality Management District

[a] Source: South Coast AQMD CEQA Handbook (South Coast AQMD 1993)
[b] Ambient air quality thresholds for criteria pollutants based on South Coast AQMD Rule 1303, Table 2 unless otherwise stated
[c] Ambient air quality threshold is based on South Coast AQMD Rule 403

Source: SCAQMD 2023

Construction Emissions – Regional

Criteria pollutant emissions would occur during construction from operation of construction equipment; excavation and earth-moving activities, which would generate fugitive dust; import of soil; import of construction materials; paving and painting; and operation of vehicles driven to and from the site by construction workers. Emissions would vary from day to day, depending on the level of activity, the specific type of construction activity occurring, and, for fugitive dust, prevailing weather conditions.

A construction-period mass emissions inventory was compiled based on actual construction scheduling and equipment data related to the previous creation of the surcharge pile, as well as estimated construction scheduling and equipment data related to future Project construction phases. More specifically, the mass emissions analysis takes into account the following:

- Combustion emissions from operating onsite stationary and mobile construction equipment;
- Fugitive dust emissions from site preparation and soils remediation/grading phases;
- VOC emissions from asphalt paving and architectural coatings; and
- Mobile-source combustion emissions and fugitive dust from worker commute and truck travel.

A project with daily emission rates below the SCAQMD's established air quality significance thresholds (shown in Table 4.2-4) would have a less than significant effect on regional air quality. Project emissions were estimated using the California Emissions Estimator Model (CalEEMod) version 2022.1.1.20 computer program (CAPCOA 2022). CalEEMod is a computer program accepted by the SCAQMD that can be used to estimate anticipated emissions associated with land development projects in California. CalEEMod has separate databases for specific counties and air districts, and the Los Angeles County database was used for the Project. Consistent with the requirements of SCAQMD Rule 403 (**SR AQ-3**), watering for dust control is included in the emissions calculations.

Additionally, while not quantified, it is noted that construction contractors must also comply with SCAQMD Rules 401, Visible Emissions (**SR AQ-2**) and 402, Nuisance (**SR AQ-3**); no quantitative reductions of particulate emissions are assumed for these rules. All remediation and construction-related activities on the Project Site would be subject to SCAQMD Rule 1466 (**SR AQ-8**), requiring ambient PM10 monitoring, dust control measures, notification, signage, and recordkeeping requirements. The Project would also comply with SCAQMD Rule 1166 (**SR AQ-7**), requiring that an approved mitigation plan be obtained from SCAQMD prior to excavation of equipment of materials containing VOC material, handling or storage or VOC-contaminated soil, or treatment of VOC-contaminated soil.

The regional emissions thresholds that are presented above within Table 4.2-4 are based on the rate of emissions (i.e., pounds of pollutants emitted per day). Therefore, the quantity, duration, and the intensity of construction activities are important in ensuring analysis of worst-case (i.e., maximum daily emissions) scenarios. Project activities (e.g., grading, building construction) are identified by start date and duration. Each activity has associated off-road equipment (e.g., backhoes, loaders, cranes) and on-road vehicles (e.g., haul trucks, concrete trucks, worker commute vehicles). Detailed construction assumptions and CalEEMod inputs and outputs can be found in Appendix C-3. Construction activities for purposes of analyzing the Project's air quality impacts commenced in August of 2020 and concluded in January of 2021, which constituted the period of the surcharge activities. The surcharge activities included the import of 12,000 cubic

yards of soil as well as the grading of on-site materials. Construction of the Project is scheduled to resume in December 2024 and end in July 2026. The CalEEMod input for construction emissions was based on Project-specific construction assumptions and default assumptions derived from CalEEMod, as summarized below. The construction phases detailed below are inclusive of all actions required by the Response Plan, discussed previously in Section 3.0, Project Description, and Section 4.8, Hazards and Hazardous Materials.

- Surcharge activities, which have occurred previously over a span of 89 days from August 2020 to January 2021 and generated an average of 25 worker trips per day and 34 round trips per day for the import of soil (worker trips in CalEEMod are all one-way [ICF 2022]). Non-default (Project-specific) equipment used during this phase included one Tier-4 excavator, two Tier-3 dozers, one Tier-3 track ripper, four Tier-3 scrapers, one Tier-4 skip loader, one Tier-4 Bobcat, and three Tier-3 water trucks.
- Mass grading activities would occur upon approval of the Project and issuance of grading permits for 130 days and would generate an average of 30 worker trips per day and 12 round trips per day for the import of soil. Project-specific equipment used during this phase would include two excavators, two dozers, one track ripper, three scrapers, two skip loaders, two Bobcats, and three water trucks.
- Building construction would occur upon approval of the Project and issuance of building permits and would take approximately 305 days and would generate an average of 67 worker trips per day, 34 vendor trips per day (which are defined as trips consisting of cement and water trucks [ICF 2022]), and six hauling trips (which consist of trips made by haul trucks hauling earth excavated from a construction site). Haul trips are separate from vendor trips, as haul trucks are not considered as part of the vendor truck fleet. Project-specific equipment used during this phase would include one crane, one skytrack, four manlifts, and 90 concrete trucks per pour.
- Paving would occur during the building construction phase and would take approximately 44 days and would generate an average of 5 worker trips per day and three hauling trips. Project-specific equipment used during this phase would include two paving machines, 14 paving trucks, and three concrete trucks per day.
- Architectural coating would occur during the building construction and paving phase and would take approximately 44 days and would generate 13 worker trips per day. Project-specific equipment used during this phase would include two manlifts and two skytracks.
- Construction soil hauling truck trips were estimated based on the grading phase length and an estimated soil import of approximately 18,000 cubic yards for remediation and soil foundation requirements, of which 12,000 cubic yards was already imported during the Surcharge phase of construction. Approximately 6,000 cubic yards of earth required to balance the Site would occur during the Project's grading phase.
- Project-specific construction assumptions include utilizing a 10-hour construction workday[6].

Construction impacts would occur within the Project Site boundaries. Construction staging would be located on-Site. Additional input details are included in Appendix C-3.

[6] This assumption of a 10-hour construction work day was utilized based on City Code and the allowable work hours of 7:00 A.M. to 7:00 P.M., assuming two hours per day for breaks. Actual work hours are expected to be less than this assumption. Therefore, this analysis is conservative and actual emissions are expected to be lower than those represented in this analysis.

Maximum daily construction emissions during the peak workday (the day where emissions are highest due to the combination of number and types of construction equipment), are shown in Table 4.2-5, Estimated Unmitigated Maximum Daily Construction Emissions, below.

TABLE 4.2-5
ESTIMATED UNMITIGATED MAXIMUM DAILY CONSTRUCTION EMISSIONS (LBS/DAY)

Year	VOC	NOx	CO	SOx	PM10	PM2.5
Unmitigated Emissions						
2020	10	112	77	<1	11	7
2021	9	102	72	<1	11	6
2024	7	68	60	<1	9	5
2025	7	70	72	<1	10	5
2026	5	18	26	<1	2	1
Maximum	**10**	**112**	**77**	**<1**	**11**	**7**
SCAQMD Daily Thresholds *(Table 4.2-4)*	***75***	***100***	***550***	***150***	***150***	***55***
Exceeds SCAQMD Thresholds?	**No**	**Yes**	**No**	**No**	**No**	**No**

lbs/day: pounds per day; VOC: volatile organic compound(s); NOx: nitrogen oxides; CO: carbon monoxide; SOx: sulfur oxides; PM10: inhalable particulate matter with a diameter of 10 microns or less; PM2.5: fine particulate matter with a diameter of 2.5 microns or less; SCAQMD: South Coast Air Quality Management District.

Source: SCAQMD 2023 (Thresholds). CalEEMod data in Appendix C-3.

As shown above, all criteria pollutant emissions would be less than their respective thresholds apart from NOx. Thus, impacts to regional construction emissions at the Project Site would be potentially significant.

Operational Emissions – Regional

Operational emissions are comprised of area, energy, and mobile source emissions at full buildout of the Project. Area and energy source emissions are based on CalEEMod assumptions for the specific land uses and size. Area sources include landscape maintenance equipment, consumer products, and architectural coatings used for routine maintenance. The principal area source of VOC emissions associated with the Project would result from the use of consumer products for routine cleaning; the major area source of CO emissions would be landscaping equipment. Energy emissions are from electricity consumption.

Mobile source emissions for the Project are based on estimated Project-related trip generation forecasts, as contained in the Project's Traffic Impact Analysis (Psomas 2024c) and CalEEMod defaults. The Project would generate an average of 399 daily trips. Estimated maximum daily operational emissions for the Project are shown in Table 4.2-6, Estimated Maximum Daily Operational Emissions, using the CalEEMod model. The calculations are shown for buildout year 2026.

TABLE 4.2-6
ESTIMATED MAXIMUM DAILY OPERATIONAL EMISSIONS

Source		Emissions (lbs/day)				
	VOC	NOx	CO	SOx	PM10	PM2.5
Mobile sources	1	1	11	<1	3	1
Area sources	<1	<1	<1	<1	<1	<1
Energy sources	<1	<1	<1	<1	<1	<1
Water sources	<1	<1	<1	<1	<1	<1
Waste sources	1	1	10	<1	3	1
Total Operational Emissions*	**1**	**1**	**11**	**<1**	**3**	**1**
SCAQMD Significance Thresholds (Table 4.2-4)	*55*	*55*	*550*	*150*	*150*	*55*
Significant Impact?	**No**	**No**	**No**	**No**	**No**	**No**

lbs/day: pounds per day; VOC: volatile organic compounds; NOx: nitrogen oxides; CO: carbon monoxide; SOx: sulfur dioxide; PM10: respirable particulate matter 10 microns or less in diameter; PM2.5: fine particulate matter 2.5 microns or less in diameter; SCAQMD: South Coast Air Quality Management District.

* Some totals may not add due to rounding.

Note: CalEEMod model data sheets are included in Appendix C-3.

Therefore, as estimated maximum daily operational emission would be below the applicable SCAQMD thresholds, impacts related to operational criteria pollutant emissions would be less than significant.

Mitigation Measures

MM AIR-1 For construction activities that have already occurred (Surcharge Activities) onsite equipment shall be required to meet a minimum of Tier 3 or equivalent off-road engine emissions standards. For all future construction activities, prior to the issuance of each grading permit, the Applicant shall provide construction plans and specifications demonstrating that onsite equipment used for construction of the Project shall be required to meet a minimum of Tier 4 off-road engine emissions standards.

Level of Significance after Mitigation

Construction Criteria Pollutant Emissions: To reduce emissions occurring during the construction of the Project, the Project shall implement **MM AIR-1**, which requires the use of a minimum of Tier 3 or equivalent off-road engine emission standards for construction activities that have already occurred (Surcharge Activities) and Tier 4 off-road engine emissions standards for construction equipment used in all future construction activities. As shown in Table 4.2-7, Estimated Mitigated Maximum Daily Construction Emissions, below, with implementation of **MM AIR-1**, all criteria pollutant emissions would be below the SCAQMD significance thresholds. Therefore, construction related air pollutant emissions impacts would be less than significant with implementation of **MM AIR-1.**

TABLE 4.2-7
ESTIMATED MITIGATED MAXIMUM DAILY CONSTRUCTION EMISSIONS
(LBS/DAY)

Year	VOC	NOx	CO	SOx	PM10	PM2.5
Mitigated Emissions (with implementation of MM AIR-1, as Amended)						
2020	3	69	77	<1	9	5
2021	3	68	77	<1	9	5
2024	2	13	69	<1	6	3
2025	2	18	88	<1	7	3
2026	4	8	31	<1	1	<1
Maximum	**4**	**69**	**88**	**<1**	**9**	**5**
***SCAQMD Daily Thresholds** (Table 4.2-4)*	***75***	***100***	***550***	***150***	***150***	***55***
Exceeds SCAQMD Thresholds?	**No**	**No**	**No**	**No**	**No**	**No**

lbs/day: pounds per day; VOC: volatile organic compound(s); NOx: nitrogen oxides; CO: carbon monoxide; SOx: sulfur oxides; PM10: inhalable particulate matter with a diameter of 10 microns or less; PM2.5: fine particulate matter with a diameter of 2.5 microns or less; SCAQMD: South Coast Air Quality Management District.

Source: SCAQMD 2023 (Thresholds). CalEEMod data in Appendix C-3.

Operational Criteria Pollutant Emissions: A less than significant impact would occur and therefore no mitigation is necessary.

> ***Impact Comparison Summary*:** The EIR concluded that the Project would result in less than significant impacts with mitigation incorporated pursuant to this threshold. The Project would result in similar impacts when compared to the impact conclusion in the MND, which identified less than significant impacts with mitigation incorporated pursuant to this threshold.

Threshold 4.2c: ***Would the project expose sensitive receptors to substantial pollutant concentrations?***

A significant impact may occur when a project would generate pollutant concentrations to a degree that would significantly affect sensitive receptors, which include populations that are more susceptible to the effects of air pollution than the population at large. Exposure of sensitive receptors is addressed for the following situations: CO hotspots; criteria pollutants, and toxic air contaminants.

Carbon Monoxide Hotspot

In an urban setting, vehicle exhaust is the primary source of CO. (USEPA 2023d) Consequently, the highest CO concentrations generally are found close to congested intersections (USEPA 1992). Under typical meteorological conditions, CO concentrations tend to decrease as the distance from the emissions source (e.g., congested intersection) increases. Therefore, for purposes of providing a conservative worst-case impact analysis, CO concentrations typically are analyzed at congested intersection locations. If impacts are less than significant close to congested intersections, impacts also would be less than significant at more distant sensitive-receptor and other locations. An initial screening procedure is provided in the *Transportation Project-Level Carbon Monoxide Protocol* (CO Protocol) to determine whether a project poses the potential to generate a CO hotspot (UCD ITS 1997). The key criterion is whether the Project would

worsen traffic congestion at signalized intersections operating at level of service (LOS) E or F. If a project poses a potential for a CO hotspot, a quantitative screening is required.

As discussed in the Project's Traffic Impact Analysis included as Appendix M of this DEIR, the two study intersections are expected to operate with Levels of Service D or better in the opening year with or without the project (Psomas 2024c). As such, the Project is not considered to worsen traffic congestion to levels that would result in a CO hotspot. There would be no potential for a CO hotspot or exposure of sensitive receptors to substantial, Project-generated local CO emissions. Therefore, there would be no impact.

Criteria Pollutants from On-Site Construction and Project Operation

Construction Emissions – Local/Ambient Air Quality

The localized effects from the onsite portion of daily construction were evaluated at receptor locations potentially impacted by the Project according to the SCAQMD's localized significance threshold (LST) method, which utilizes onsite emissions rate look up tables and Project-specific modeling, where appropriate (SCAQMD 2008). The LST method was developed by the SCAQMD as a streamlined approach to assessing localized air pollutant concentrations without the use of time intensive detailed air pollutant dispersion modeling. LSTs are applicable to the following criteria pollutants: NO_2, CO, PM10, and PM2.5. 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 developed based on the ambient concentrations of that pollutant for each source receptor area and distance to the nearest receptor. For the LST CO and NO_2 exposure analysis, receptors who could be exposed for 1 hour or more are considered, such as residential units, hospitals, assisted living, and congregate care. For PM10 and PM2.5 exposure analysis, receptors who could be exposed for 24 hours are considered, such as residential units, hospitals, assisted living, and congregate care. The mass rate look-up tables were developed for each source receptor area and are used to determine whether a project may generate significant adverse localized air quality impacts. As discussed previously, the closest receptors are residential and school uses located to the east of the Project Site. The City of Long Beach is in source-receptor area 4, South Coastal LA County. The SCAQMD provides LST mass rate look-up tables for projects that are less than or equal to five acres. For projects that exceed five acres, the five-acre LST lookup values can still be used as a screening tool to determine which pollutants require detailed analysis (Krause 2018). Although the Project Site is larger than five acres, SCAQMD recognizes the efficacy of using the LST for larger sites if it is demonstrated that the calculated Project emissions would be less than the five-acre site emissions limits. The SCAQMD released guidance titled "Fact Sheet for Applying CalEEMod to Localized Significance Thresholds" which provides clarification that acreage is based on the daily soil disturbance area for each piece of equipment during each construction phase. If a project exceeds the LST look-up values, then the SCAQMD recommends that project-specific localized air quality modeling be performed. . Based on this methodology, the Project's construction would not disturb more than 5 acres per day, making it appropriate to apply the LST look-up tables to the Project Site.

When quantifying mass emissions for localized analysis, only emissions that occur on site are considered (SCAQMD 2008). Consistent with the SCAQMD's Final Localized Significance Threshold Methodology, emissions related to offsite delivery/haul truck activity and employee trips are not considered in the evaluation of localized impacts (SCAQMD 2008). The LST methodology was developed to be used as a tool to assist lead agencies to analyze localized impacts associated with project-specific level proposed projects. The LST methodology and associated mass rates are not designed to evaluate localized impacts from mobile sources traveling over the roadways. (SCAQMD 2008).

The LST analysis for the Project Site is shown in Table 4.2-8, Localized Construction Pollutant Emissions. As shown in Table 4.2-8, localized emissions would be less than their respective SCAQMD LSTs for all four pollutants. Thus, impacts would be less than significant.

TABLE 4.2-8
LOCALIZED CONSTRUCTION POLLUTANT EMISSIONS
(LBS/DAY)

	NOx	CO	PM10	PM2.5
Surcharge (Site Preparation) [2020] Emissions	109	74	11	7
SCAQMD LSTs for Surcharge (Site Preparation)*	**119**	**2,045**	**44**	**11**
Exceeds SCAQMD Thresholds?	**No**	**No**	**No**	**No**
Surcharge (Site Preparation) [2021] Emissions	99	70	10	6
SCAQMD LSTs for Surcharge (Site Preparation)*	**119**	**2,045**	**44**	**11**
Exceeds SCAQMD Thresholds?	**No**	**No**	**No**	**No**
Grading (2024) Emissions	68	58	8	5
SCAQMD LSTs for Site Grading*	**119**	**2,045**	**44**	**11**
Exceeds SCAQMD Thresholds?	**No**	**No**	**No**	**No**
Grading (2025) Emissions	59	54	8	5
SCAQMD LSTs for Site Grading*	**119**	**2,045**	**44**	**11**
Exceeds SCAQMD Thresholds?	**No**	**No**	**No**	**No**
Building Construction (2025) Emissions	19	21	<1	<1
SCAQMD LSTs for Building Construction*	**119**	**2,045**	**44**	**11**
Exceeds SCAQMD Thresholds?	**No**	**No**	**No**	**No**
Building Construction (2026) Emissions	19	21	<1	<1
SCAQMD LSTs for Building Construction*	**119**	**2,045**	**44**	**11**
Exceeds SCAQMD Thresholds?	**No**	**No**	**No**	**No**
Paving (2026) Emissions	4	5	<1	<1
SCAQMD LSTs for Paving*	**119**	**2,045**	**44**	**11**
Exceeds SCAQMD Thresholds?	**No**	**No**	**No**	**No**
Architectural Coatings (2026) Emissions	3	4	<1	<1
SCAQMD LSTs for Architectural Coatings*	**119**	**2,045**	**44**	**11**
Exceeds SCAQMD Thresholds?	**No**	**No**	**No**	**No**

lbs/day: pounds per day; NOx: nitrogen oxides; CO: carbon monoxide; PM10: respirable particulate matter with a diameter of 10 microns or less; PM2.5: fine particulate matter with a diameter of 2.5 microns or less; SCAQMD: South Coast Air Quality Management District; LST: Localized Significance Threshold.

* Thresholds for Source Receptor Area 4, South Coast LA County, 5-acre site disturbance, 55-meter receptor distance for all construction phases. The 55-meter receptor distance was used to account for the distance between the closest point at which construction activities would occur and the nearest sensitive receptor.

Source: SCAQMD 2009.

Operations Phase Localized Significance Thresholds

The SCAQMD has also developed LSTs to assess potential local impacts to nearby sensitive receptors from on-site emissions of NO_2, CO, PM10, and PM2.5 generated during the operations phase. The operations phase LST analysis was assessed at the closest receptor to the Project Site, which includes the single-family residences, located 160 feet to the east of the Project Site along the east side of Del Mar Avenue. Other sensitive receptors located within close proximity to the Project Site include Los Cerritos Elementary School, located 170 feet to the east of the Project Site and Los Cerritos Park, located 345 feet east of the Project Site. The emissions thresholds are for receptors within 55 meters (180 feet) of the Project Site; the thresholds for

receptors farther away would be higher, and the Project emissions would be a smaller fraction of the thresholds. Table 4.2-9, Operations Phase Localized Significance Threshold Emissions, shows the maximum daily on-site emissions for operational activities compared with the SCAQMD LSTs with receptors within 55 meters.

TABLE 4.2-9
OPERATIONS PHASE
LOCALIZED SIGNIFICANCE THRESHOLD EMISSIONS

Emissions and Thresholds	Emissions (lbs/day)			
	NOx	CO	PM10	PM2.5
Project maximum daily on-site emissions				
Area	<1	<1	<1	<1
Energy	<1	<1	<1	<1
Mobile[1]	<1	<1	<1	<1
Total	**<1**	**1**	**<1**	**<1**
Localized Significance Threshold	**119**	**2,045**	**10**	**3**
Exceed threshold?	**No**	**No**	**No**	**No**

lbs/day: pounds per day; NOx: nitrogen oxides; CO: carbon monoxide; PM10: respirable particulate matter 10 microns or less in diameter; PM2.5: fine particulate matter 2.5 microns or less in diameter;

[1] Onsite mobile emissions are conservatively assumed to be 5% of the total on- and off-site emissions.

Note: Data is for SCAQMD Source Receptor Area 4, South Los Angeles County Coastal

Source: SCAQMD 2009 (thresholds); see Attachment A for CalEEMod model outputs.

As shown in Table 4.2-9, local emissions generated during Project operations would be below the LSTs; therefore, no significant impacts would result.

Toxic Air Contaminant Emissions from On-Site Construction and Project Operations

A Health Risk Assessment (HRA) was prepared for the Project and can be found in Appendix C-2. According to the HRA, construction activities would result in short-term, Project-generated emissions of DPM from the exhaust of off-road, heavy-duty diesel equipment used for site preparation (e.g., demolition, excavation, and grading); paving; building construction; and the application of architectural coatings. The operations phase would also result in the emissions of DPM associated with diesel-fueled recreational vehicles. CARB identified DPM as a TAC in 1998 (CARB 2008). The dose to which receptors are exposed is the primary factor used to determine health risk. Dose is a function of the concentration of a substance or substances in the environment and the duration of exposure to the substance. Thus, the risks estimated for a maximally exposed individual (MEI) are higher if a fixed exposure occurs over a longer time period. According to the Office of Environmental Health Hazard Assessment, health risk assessments—which determine the exposure of sensitive receptors to TAC emissions—should be based on a 30-year exposure period; however, such assessments should be limited to the period/duration of activities associated with the Project.

The results of the HRA from the Project's unmitigated construction and operations related emissions are summarized below in Table 4.2-10, Unmitigated Health Risk at the Maximally Impacted Sensitive Receptor. This table shows the maximum cancer risk levels and the chronic non-cancer exposure for construction activities, prior to implementation of mitigation, as well as for Project operation at the Maximally Exposed Impacted Resident (MEIR).

Cancer risk associated with construction activities is due to the diesel exhaust from the operation of large offroad construction vehicles. The operations phase of the Project would involve the use

of diesel associated with RVs. The amount of vehicular diesel usage assumed in the quantification for the HRA is conservative considering that the State of California is phasing out the sale of new gasoline and diesel vehicles as part of the CARB's Advanced Clean Car II Rule. Unmitigated cancer and noncancer health risk were assessed based on emissions occurring during the construction and operations phases of the Project, prior to implementation of mitigation.

The MEIR describes the highest impacted residential use nearest to the Project Site. The MEIR is located to the northeast of the Project Site at residences closest to the Project Site and would be exposed to a total risk level of 25 in a million prior to implementation of mitigation, which is greater than the SCAQMD's significance threshold of 10 in a million.[7] . In addition, the HRA analyzed the potential for noncancer health effects and found that these effects would be below the SCAQMD's thresholds for both the construction and operations phases of the Project.

TABLE 4.2-10
UNMITIGATED HEALTH RISK AT THE MAXIMALLY IMPACTED SENSITIVE RECEPTOR

Receptor	Maximum Cancer Risk (Risk per Million)	Chronic Non-Cancer Exposure
Maximally Exposed Impacted Resident		
Unmitigated Construction Activities	25	<0.1
Operations Phase Activities	<0.1	<0.1
SCAQMD Significance Threshold	**10**	**1**
Exceeds Threshold?	**Yes**	**No**
Source: See Attachment C for the HRA model output		

As shown above, while the HRA determined that noncancer health effects would be below the SCAQMD's thresholds for both the construction and operations phases of the Project, without implementation of mitigation, the Project would exceed the SCAQMD's significance threshold for Maximum Cancer Risk resulting in a potentially significant impact.

As further discussed in Section 4.8, Hazards and Hazardous Materials, it is also known that toxics including arsenic and lead are present in the soils onsite, and could be subject to disturbance during construction, resulting in a potentially significant impact.

Mitigation Measures

MM AIR-1 For construction activities that have already occurred (Surcharge Activities) onsite equipment shall be required to meet a minimum of Tier 3 or equivalent off-road engine emissions standards. For all future construction activities, prior to the issuance of each grading permit, the Applicant shall provide construction plans and specifications demonstrating that onsite equipment used for construction of the

[7] **MM AIR-1** as written in the MND required the use of Tier 3 or better engines for construction activities; all engines used in the creation of the surcharge pile were Tier 3 or greater, consistent with this measure. As discussed above, **MM AIR-1** has been amended to require the use of Tier 4 or better engines for all remaining construction activities. The unmitigated air quality results within this EIR represent emissions that would result from the use of average engine tiers for all Project construction activities, both past and future. The mitigated air quality results within this EIR represent emissions resulting from a) the actual equipment types and engine tiers that were used in the creation of the surcharge pile and b) the use of Tier 4 or better engines for all future construction activities, consistent with **MM AIR-1**, as amended.

Project shall be required to meet a minimum of Tier 4 off-road engine emissions standards.

MM HAZ-1 Prior to issuance of a building permit by the City of Long Beach, the applicant shall receive approval from DTSC of, and implement, a Response Plan (RP) prepared for the Project in accordance with CLRRA, which outlines site remediation, engineering controls, future operation and monitoring (O&M) activities, and administrative controls to allow for commercial/industrial development of the site.

Level of Significance after Mitigation

Carbon Monoxide Hotspots: No impact would occur and therefore no mitigation is required.

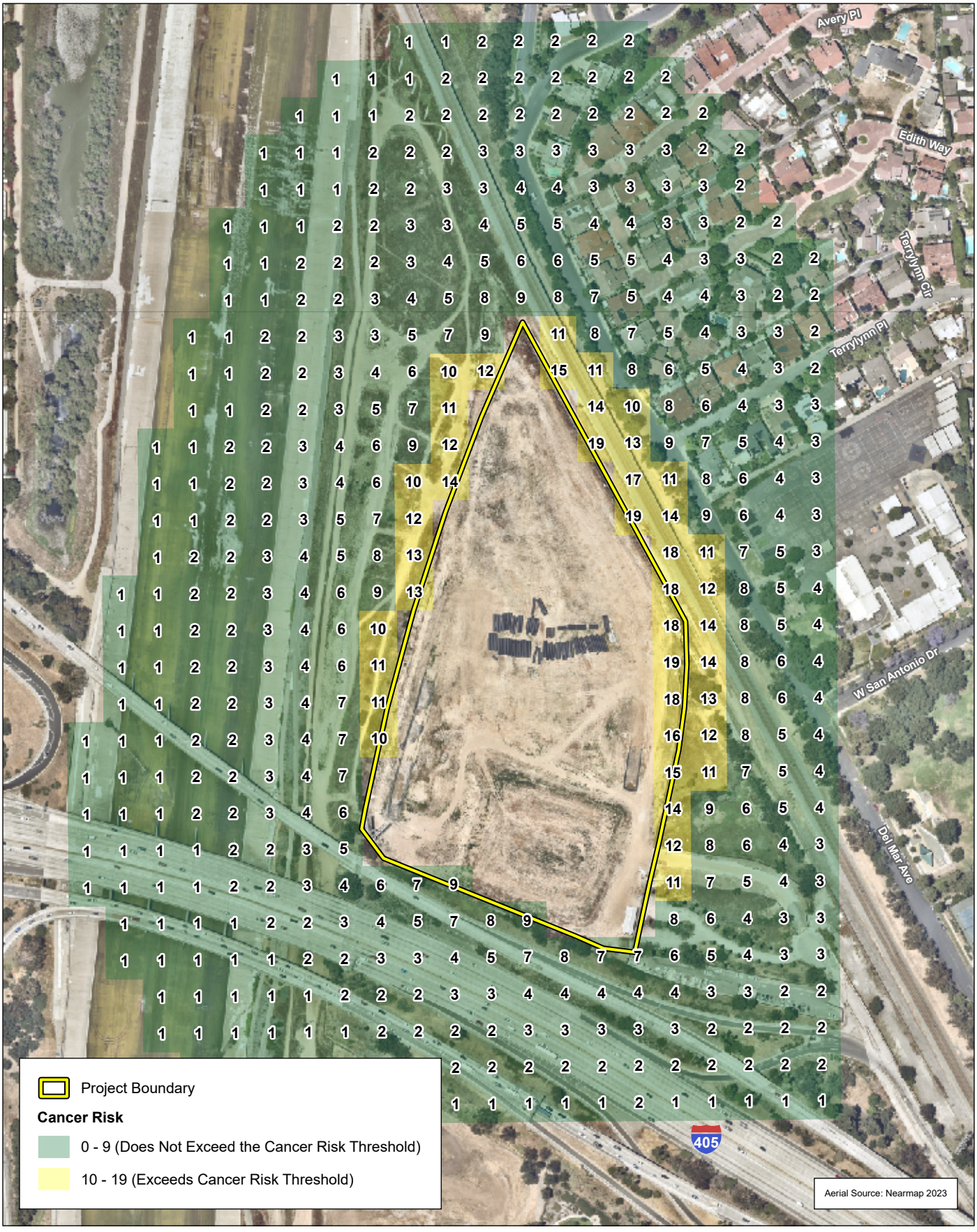
Criteria Pollutants: A less than significant impact would occur and therefore no mitigation is required.

Toxic Air Contaminants: To reduce impacts related to TACs, the Project would be required to implement **MM AIR-1** which requires the use of a minimum of Tier 3 or equivalent off-road engine emission standards for construction activities that have already occurred (Surcharge Activities) and Tier 4 off-road engine emissions standards for construction equipment used in all future construction activities. Mitigated cancer health risk was assessed based on emissions occurring during the construction and operations phases of the Project, with the implementation of **MM AIR-1**.The estimated distribution of mitigated cancer risk is shown below in Exhibit 4.2-1, Estimated Cancer Risk. This exhibit depicts the mitigated cancer risk levels at the MEIR as well as for the areas adjacent to the Project Site. As shown in Exhibit 4.2-1, cancer risk values decrease with distance due to air pollutant dispersion from the construction areas at the Project Site. The MEIR for mitigated conditions is also located to the northeast of the Project Site at residences located closest to the Project Site. As shown below in Table 4.2-11, Mitigated Health Risk at the Maximally Impacted Sensitive Receptor, with implementation of **MM AIR-1**, the MEIR would be exposed to a total risk level of 8 in a million, which is less than the SCAQMD's significance threshold of 10 in a million.[8]

TABLE 4.2-11
MIITGATED HEALTH RISK AT THE MAXIMALLY IMPACTED SENSITIVE RECEPTOR

Receptor	Maximum Cancer Risk (Risk per Million)	Chronic Non-Cancer Exposure
Maximally Exposed Impacted Resident		
Unmitigated Construction Activities	25	<0.1
Mitigated Construction Activities	8	<0.1
Operations Phase Activities	<0.1	<0.1
SCAQMD Significance Threshold	**10**	**1**
Exceeds Threshold?	**No**	**No**
Source: See Attachment C for the HRA model output		

[8] This risk level is considered conservative as the assumption of a 10-hour construction work day was utilized based on City Code and the allowable work hours of 7:00 A.M. to 7:00 P.M., assuming two hours per day for breaks. Actual work hours are expected to be less than this assumption. Therefore, this analysis is conservative and actual emissions/risk levels are expected to be lower than those represented in this analysis.



Estimated Cancer Risk

Exhibit 4.2-1

Pacific Place Project

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PSOMAS

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As such, with implementation of **MM AIR-1**, which requires the use of a minimum of Tier 3 or equivalent off-road engine emission standards for construction activities that have already occurred (Surcharge Activities) and Tier 4 off-road engine emissions standards for construction equipment used in all future construction activities, impacts would be reduced to a less than significant level.

Additionally, specific to air quality, implementation of **MM HAZ-1** would control potential exposures of off-Site receptors to impacted soils and sump materials through implementation of a Soil Management Plan, and Excavation Management Plan, and would be monitored through an Ambient Air Monitoring Plan. Therefore, potential significant impacts related to exposure to TACs and soil-based toxics would be reduced to less than significant with implementation of **MM AIR-**1 and **MM HAZ-1**,

> ***Impact Comparison Summary:*** The EIR concluded that the Project would result in less than significant impacts with mitigation incorporated pursuant to this threshold. The Project would result in similar impacts when compared to the impact conclusion in the MND, which identified less than significant impacts pursuant to this threshold.

Threshold 4.2d: ***Would the project result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?***

The Project would not result in other emissions that would adversely affect a substantial number of people. Objectionable odors are generally associated with agricultural activities; landfills and transfer stations; the generation or treatment of sewage; the use or generation of chemicals; food processing; or other activities that generate unpleasant odors (SCAQMD 1993).

During construction, the Project would operate equipment that may generate odors resulting from onsite construction equipment's diesel exhaust emissions or paving operations. However, these odors would be temporary and would dissipate rapidly from the source with an increase in distance.

The Project would include a dump station for recreational vehicles parked onsite. The dump station would be connected to the City sewer system. The use of the dump station is a potential source of odors due to the transfer of solid waste from the RV to the dump station. However, the release of odors would be minimized due to the use of a dump station cover which would have seals to prevent the escape of objectional odors. The seals would only be opened momentarily when connected to the RV transfer hose. The use of the dump station would also minimize the potential for odors due to the infrequent use of this facility (estimated 2-3 times week) and the substantial distance (approximately 500 feet) of this facility from the nearest offsite school or residence. The Project would also be regulated from nuisance odors and other objectionable emissions by SCAQMD Rule 402 (**SR AQ-2**). Rule 402, Nuisance, prohibits discharge from any source of air contaminants or other material which would cause injury, detriment, nuisance, or annoyance to people or the public. The Project would be required to comply with Rule 402, which would ensure that no significant odor impacts would result. Therefore, other emissions would be considered less than significant.

Mitigation Measures

No mitigation measures are required.

Level of Significance after Mitigation

Other Emissions: A less than significant impact would occur and therefore no mitigation is required.

> ***Impact Comparison Summary*:** The EIR concluded that the Project would result in less than significant impacts pursuant to this threshold. The Project would result in similar impacts when compared to the impact conclusion in the MND, which identified less than significant impacts pursuant to this threshold.

4.2.4 CUMULATIVE IMPACTS

SCAQMD's policy with respect to cumulative impacts associated with criteria pollutants and their precursors is that impacts that would be directly significant would also be cumulatively significant (SCAQMD 2003). The Project would not result in a generation of employment that would exceed the assumptions made by both the SCAQMD and SCAG and consequently would not be cumulative considerable. As shown in Tables 4.2-5 through 4.2-11 and discussed above, the Project's regional and localized construction and operational emissions would be potentially significant prior to implementation of mitigation. Furthermore, odors emanating from the dump station would be less than significant with compliance with SCAQMD Rule 402 (**SR AQ-2**)and would not contribute to a cumulative odor impact. Thus, prior to implementation of mitigation, the cumulative construction and operational impacts of the Project would be potentially significant.

Mitigation Measures:

MM AIR-1 For construction activities that have already occurred (Surcharge Activities) onsite equipment shall be required to meet a minimum of Tier 3 or equivalent off-road engine emissions standards. For all future construction activities, prior to the issuance of each grading permit, the Applicant shall provide construction plans and specifications demonstrating that onsite equipment used for construction of the Project shall be required to meet a minimum of Tier 4 off-road engine emissions standards.

MM HAZ-1 Prior to issuance of a building permit by the City of Long Beach, the applicant shall receive approval from DTSC of, and implement, a Response Plan (RP) prepared for the Project in accordance with CLRRA, which outlines site remediation, engineering controls, future operation and monitoring (O&M) activities, and administrative controls to allow for commercial/industrial development of the site.

Level of Significance after Mitigation:

Cumulative Impacts: The Project, as well as other projects in the area, would be required to comply with all applicable federal, State, and local regulations relating to air quality, Further, the Project and other cumulative projects would be subject to existing and future enforcement by the appropriate regulatory agencies. The Project's contribution of cumulative impacts related to air quality would not be significant because, as discussed in Thresholds 4.2a through 4.2d, above, Project impacts would be reduced to less than significant with implementation of **MM AIR-1** and **MM HAZ-1**. Therefore, with implementation of mitigation, the Project's contribution would not be cumulatively considerable and therefore would not contribute to a significant cumulative impact.

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