

## **MEMORANDUM**

**To:** NorthPoint Development

From: Darshan Shivaiah, Michael Baker International

Date: November 28, 2023

**Subject:** SPR 23-012 – Air Quality Assessment

### **PURPOSE**

The purpose of this technical memorandum is to evaluate potential short- and long-term air quality impacts that would result from the construction and operation of the proposed SPR 23-012 Project (project), located in the City of Lancaster (City), California.

### **PROJECT LOCATION**

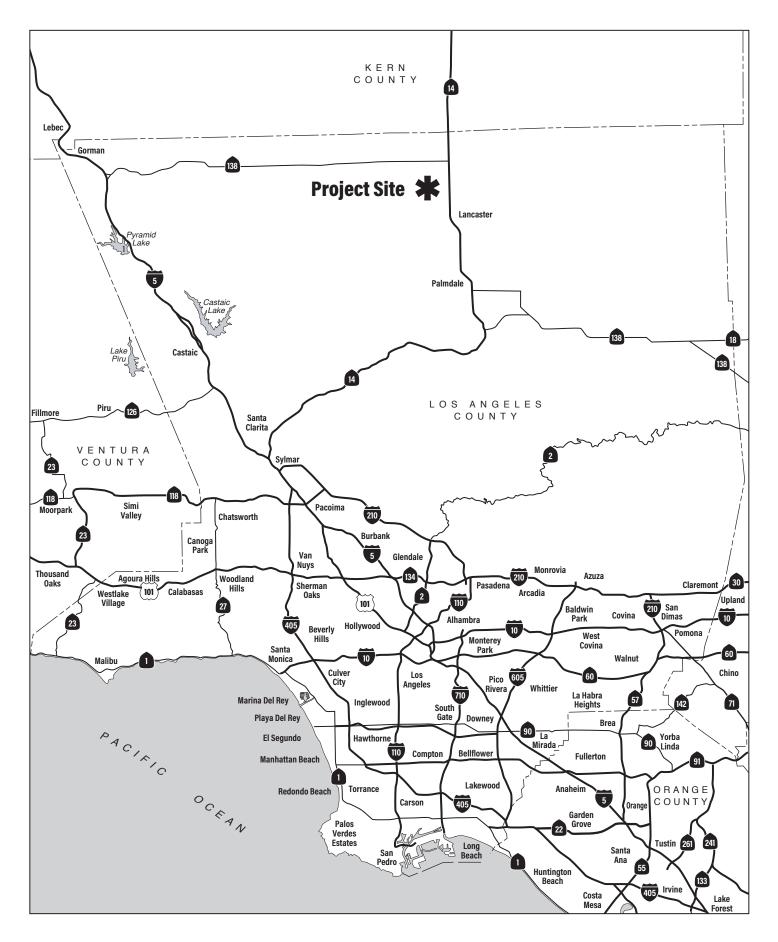
The project site is in the County of Los Angeles (County), within the City of Lancaster; refer to <u>Exhibit 1</u>, <u>Regional Vicinity Map</u>. The City is in the Antelope Valley in northern Los Angeles County, approximately 70 miles north of downtown Los Angeles. Unincorporated Los Angeles County surrounds the City on all sides. Additional surrounding jurisdictions include unincorporated Kern County further to the north and the City of Palmdale to the south.

The project site is situated approximately 0.4-mile west of State Route 14 (SR-14). Specifically, the site is located within the northeastern corner of the intersection of Avenue G and 30th Street West. Regional access to the site is available via SR-14 at the Avenue G exit, approximately 0.4-mile east of the project site; refer to Exhibit 2, Site Vicinity Map. Local access to the site is provided via Avenue G and 30th Street West.

The project site consists of three parcels (Assessor's Parcel Numbers [APNs] 3114-010-002, -003, and -011).

## **EXISTING SITE CONDITIONS**

The approximately 76.8-acre site currently consists of vacant land. No existing structures or paved roads are present on-site.







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Source: Google Earth Pro, October 2023





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The project site is designated "Light Industry (LI)" with a "Specific Plan" overlay based on the *General Plan Land Use Map* in the *Lancaster General Plan 2030*. The project site is zoned "SP 95-01 Fox Field Industrial Corridor Specific Plan" based on the *City of Lancaster Zoning Map*. Based on the *Fox Field Industrial Corridor Specific Plan*, the project site is located within focused area "Fox Field East" and designated "Light Industrial" and "Manufacturing/Distribution (MFG)."

The project site is surrounding on all sides by vacant undeveloped land. Scattered single-family residences are located further north of the site, further east is SR-14, further south is the Antelope Valley Fair and Event Center, and further west is the General William J. Fox Airfield and Apollo Community Regional Park.

### PROJECT DESCRIPTION

The proposed project involves construction of a cold storage warehouse. The tilt-up concrete warehousing with elements of insulated metal panels would be approximately 1,227,596 square feet in size with approximately 40,000 square feet to be used for offices. The proposed warehouse would be approximately 50 feet in height; refer to Exhibit 3, Site Plan. Other ancillary improvements would include road improvements along Ave G and 30th street west, lighting and utility improvements, among others. The facility is anticipated to operate 24-hours per day. Access to the project site would be provided via two full access driveways along 30th Street West. The project would include a total of 415 trailer parking spaces and 564 passenger vehicle parking spaces. Of the 564 passenger vehicle spaces, 169 spaces would be electric vehicle (EV) parking spaces with 56 electrical charging stations installed, and 113 spaces would be made EV charging capable. The project would also include 28 bicycle parking spaces. Three total detention basins are proposed, two to the east and one to the west of the building. Additionally, approximately 21.2 acres (27.93 percent landscaping coverage of the net site area) is proposed as landscape area throughout the site.

The approximately 18-month construction is anticipated to begin in June 2024 and conclude by February 2026. Construction activities would occur from 7:00 a.m. to 8:00 p.m. Monday through Saturday. Construction activities would primarily include grading (including excavation for the detention basins), building construction, paving, and architectural coating. The project is expected to export 1,000 cubic yards of earthwork material during grading phase.

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<sup>&</sup>lt;sup>1</sup> City of Lancaster, Lancaster General Plan 2030, General Plan Land Use Map, adopted July 14, 2009, updated September 1, 2015.

<sup>&</sup>lt;sup>2</sup> City of Lancaster, City of Lancaster Zoning Map, adopted July 13, 2010, revised October 26, 2022.

<sup>&</sup>lt;sup>3</sup> City of Lancaster, Fox Field Industrial Corridor Specific Plan, May 31, 1996.



Source: NorthPoint Development, October 2023





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**Site Plan** 

### **CRITERIA AIR POLLUTANTS**

Air quality is a general description of how levels of air pollution and other atmospheric conditions can affect public health and the environment. Under the Federal Clean Air Act (FCAA), the U.S. Environmental Protection Agency (EPA) has identified six air pollutants that are environmentally prevalent and produced by human activities to be of concern with respect to health, the environment and welfare of the public. These specific pollutants, known as criteria air pollutants, are pollutants for which the federal and state governments have established ambient air quality standards—or criteria—for outdoor concentrations to protect public health. These pollutants are common byproducts of human activities and have been documented through scientific research to cause various adverse health effect outcomes. The federal ambient concentration criteria are known as the National Ambient Air Quality Standards (NAAQS), and the California ambient concentration criteria are referred to as the California Ambient Air Quality Standards (CAAQS). The criteria air pollutants regulated at the federal jurisdiction include carbon monoxide (CO), ground-level ozone (O<sub>3</sub>), nitrogen dioxide (NO<sub>2</sub>), respirable particulate matter ten microns or less in diameter (PM<sub>2.5</sub>), sulfur dioxide (SO<sub>2</sub>), and lead (Pb).

<u>Carbon Monoxide (CO)</u> – Common product of incomplete combustion. A criteria pollutant with state and federal standards. Not a primary photochemical reaction compound but involved in photochemical reactions. Dissipates rapidly and is therefore only important on a local scale near sources.

<u>Oxides of Nitrogen ( $NO_x$ )</u> – Common product of combustion in the presence of nitrogen. Includes  $NO_2$ , which is a criteria pollutant with state and federal standards. Locally and regionally important due to its involvement in the photochemical formation of ozone.

Oxides of Sulfur  $(SO_x)$  – Common product of combustion in the presence of sulfur. Associated primarily with diesel and coal burning. Includes  $SO_2$ , a criteria pollutant with state and federal standards. Primarily of concern near sources.

Ozone  $(O_3)$  – A gas mainly produced by a photochemical reaction between reactive organic gases and oxides of nitrogen in the presence of sunlight (also produced by molecular oxygen in the presence of ultraviolet light or electrical discharge). A strong oxidant that is damaging at ground level but necessary at high altitude (in the stratosphere, where it absorbs dangerous ultraviolet light). Also considered an important greenhouse gas. A criteria pollutant with state and federal standards.

Respirable Particulate Matter (coarse or  $PM_{10}$ , and fine or  $PM_{2.5}$ ) – That portion of particulate matter that tends to penetrate the human lung. The subscript refers to aerodynamic diameter. Criteria pollutants with state and federal standards. Locally and regionally important.

<u>Reactive/Volatile Organic Compounds/Gases (ROG, VOC, NMOG, NMOC)</u> – A portion of total organic compounds or gases, excludes methane, ethane and acetone (due to low photochemical reactivity). "ROG" is generally used by the California Air Resources Board, "VOC" is generally used by the United States Environmental Protection Agency, but all four terms are interchangeable for most uses. Regionally important due to its involvement in the photochemical reaction that produces ozone.

### **VALLEY FEVER**

Coccidioidomycosis, more commonly known as "Valley Fever," is primarily a disease of the lungs caused by the spores of the *Coccidioides immitis* fungus. The spores are found in soils, become airborne when the soil is disturbed, and are subsequently inhaled into the lungs. After the fungal spores have settled in the lungs, they change into a multicellular structure called a spherule. Fungal growth in the lungs occurs as the spherule grows and bursts, releasing endospores, which then develop into more spherules.

Valley Fever symptoms occur within two to three weeks of exposure. Approximately 60 percent of Valley Fever cases are mild and display flu-like symptoms or no symptoms at all. Of those who are exposed and seek medical treatment, the most common symptoms include fatigue, cough, loss of appetite, rash, headache, and joint aches. In some cases, painful red bumps may develop on the skin. One important fact to mention is that these symptoms are not unique to Valley Fever and may be caused by other illnesses as well. Identifying and confirming this disease require specific laboratory tests such as: (1) microscopic identification of the fungal spherules in infected tissue, sputum, or body fluid sample; (2) growing a culture of Coccidioides immitis from a tissue specimen, sputum, or body fluid; (3) detection of antibodies (serological tests specifically for Valley Fever) against the fungus in blood serum or other body fluids; and (4) administering the Valley Fever Skin Test (called coccidioidin or spherulin), which indicate prior exposure to the fungus. Valley Fever is not contagious, and therefore, cannot be passed on from person to person. Most of those who are infected would recover without treatment within six months and would have a life-long immunity to the fungal spores. In severe cases, especially in those patients with rapid and extensive primary illness, those who are at risk for dissemination of disease, and those who have disseminated disease, antifungal drug therapy is used. The type of medication used, and the duration of drug therapy are determined by the severity of disease and response to the therapy. The medications used include ketoconazole, itraconazole and fluconazole in chronic, mild-to-moderate disease, and amphotericin B, given intravenously or inserted into the spinal fluid, for rapidly progressive disease. Although these treatments are often helpful, evidence of disease may persist, and years of treatment may be required. The usual course of Valley Fever in healthy people is complete recovery within six months. In most cases, the body's immune response is effective, and no specific course of treatment is necessary. About five percent of cases of Valley Fever result in pneumonia (infection of the lungs), while another five percent of patients develop lung cavities after their initial infection with Valley Fever. These cavities occur most often in older adults, usually without symptoms, and about 50 percent of them disappear within two years. Occasionally, these cavities rupture, causing chest pain and difficulty breathing, and require surgical repair. Only one to two percent of those exposed who seek medical attention would develop a disease that disseminates (spreads) to other parts of the body other than the lungs.

Factors that affect the susceptibility to coccidioidal dissemination are race, sex, pregnancy, age, and immunosuppression. While there are no racial or gender differences in susceptibility to primary infection with coccidioidomycosis, differences in risk of disseminated infection do appear to exist. Men have a higher rate of dissemination than do women and several studies have shown that the rate of dissemination in African Americans and Filipinos is several times higher than in the rest of the U.S. population. Native Americans, Hispanics, and Asians may also have a higher rate of dissemination than the general population, but these population differences are not well defined.

The *Coccidioides immitis* fungal spores are often found in the soil around rodent burrows, Indian ruins, and burial grounds. The spores become airborne when the soil is disturbed by winds, construction, farming, and soil disturbing activities. This type of fungus is endemic to the southwestern United States and is common in the Antelope Valley. The City is in an area designated as suspected endemic for Valley

Fever by the Center for Disease Control and Prevention (CDC). <sup>4</sup> Annual morbidity reports for 2011 through 2016 from Los Angeles County Public Health (LACPH) indicate that the Los Angeles County has the reported incidence rate of approximately 10 per 100,000 persons as of 2017. <sup>5</sup>

### **EXISITNG SETTING**

### **Regional Topography**

The State of California is divided geographically into 15 air basins. The City is in the Mojave Desert Air Basin (MDAB). The MDAB includes the desert portion of Los Angeles and San Bernardino Counties, the eastern desert portion of Kern County, and the northeastern desert portion of Riverside County. The MDAB primarily contains pollutants from other air basins, dust raised by construction, travel on unpaved roads, and paved roads with silty debris.

Air quality in the MDAB is a function of the area's natural physical characteristics (weather and topography) as well as man-made influences (development patterns and lifestyle). Factors such as wind, sunlight, temperature, humidity, rainfall, and topography all affect the accumulation and/or dispersion of air pollutants throughout the MDAB.

### Climate

The general region lies in the semipermanent high-pressure zone of the eastern Pacific. As a result, the climate is mild, tempered by cool sea breezes. The climate consists of a semiarid environment with mild winters, warm summers, moderate temperatures, and comfortable humidity. Precipitation is limited to a few winter storms. The usually mild climatological pattern is interrupted infrequently by periods of extremely hot weather, winter storms, or Santa Ana winds. The average annual temperature varies little throughout the MDAB, averaging 75 degrees Fahrenheit (°F). However, with a less-pronounced oceanic influence, the eastern inland portions of the MDAB show greater variability in annual minimum and maximum temperatures. All portions of the MDAB have recorded temperatures over 100°F in recent years.

The Antelope Valley Air Quality Management District (AVAQMD) covers a western portion of the MDAB. The MDAB is an assemblage of mountain ranges interspersed with long broad valleys that often contain dry lakes. Many of the lower mountains which dot the vast terrain rise from 1,000 to 4,000 feet above the valley floor. Prevailing winds in the MDAB are out of the west and southwest. These prevailing winds are due to the proximity of the MDAB to coastal and central regions and the blocking nature of the Sierra Nevada mountains to the north; air masses pushed onshore in southern California by differential heating are channeled through the MDAB. The MDAB is separated from the southern California coastal and central California valley regions by mountains (highest elevation approximately 10,000 feet), whose passes form the main channels for these air masses. The Antelope Valley is bordered in the northwest by the Tehachapi Mountains, separated from the Sierra Nevada Mountains in the north by the Tehachapi Pass (3,800 feet elevation). The Antelope Valley is bordered in the south by the San Gabriel Mountains, bisected by

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<sup>&</sup>lt;sup>4</sup> Centers for Disease Control and Prevention, *More information about the estimated areas with blastomycosis, coccidioidomycosis (Valley fever), and histoplasmosis in the United States,* https://www.cdc.gov/fungal/pdf/more-information-about-fungal-maps-508.pdf, accessed September 27, 2023.

Los Angeles County Department of Public Health, Annual Morbidity and Special Studies Report 2017, Table I. Annual Incidence Rates of Selected Notifiable Diseases and Conditions by Year of Onset LAC, 2012–2017, http://publichealth.lacounty.gov/acd/Publications.htm.

Soledad Canyon (3,300 feet).

During the summer, the MDAB is generally influenced by a Pacific Subtropical High cell that sits off the coast, inhibiting cloud formation and encouraging daytime solar heating. The MDAB is rarely influenced by cold air masses moving south from Canada and Alaska, as these frontal systems are weak and diffuse by the time the reach the desert. Most desert moisture arrives from infrequent warm, moist and unstable air masses from the south. The MDAB is classified as a dry-hot desert climate, with portions classified as dry-very hot desert to indicate at least three months have maximum average temperatures over 100.4° F.<sup>6</sup>

The City experiences average high temperatures of up to 98°F during the month of July and August, and average low temperatures of 30°F during the month of December. The annual average precipitation in the City is 7.38 inches. Rainfall occurs most frequently in February with an average rainfall of 1.78 inches.

## **Local Ambient Air Quality**

CARB monitors ambient air quality at approximately 250 air monitoring stations across the State. Air quality monitoring stations usually measure pollutant concentrations ten feet above ground level; therefore, air quality is often referred to in terms of ground-level concentrations. The closest monitoring station to the City is the Lancaster – Division Street Monitoring Station. The air pollutants measured at Lancaster – Division Street Monitoring Station include ozone (O<sub>3</sub>), carbon monoxide (CO), particulate matter (PM<sub>10</sub>), nitrogen oxide (NO<sub>2</sub>), and fine particulates (PM<sub>2.5</sub>). The air quality data monitored at the Lancaster – Division Street Monitoring Station from 2020 to 2022 are presented in <u>Table 1</u>, <u>Measured Air Quality Levels</u>. This table lists the monitored maximum concentrations and number of exceedances of Federal/State air quality standards for each year recorded by the monitoring station.

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Antelope Valley Air Quality Management District, California Environmental Quality Act (CEQA) and Federal Conformity Guidelines, August 2016.

<sup>7</sup> U.S. Climate Data, Monthly, Climate Lancaster - California, https://www.usclimatedata.com/climate/lancaster/california/%20united-states/usca0591, accessed September 27, 2023.

Table 1
Measured Air Quality Level

	Primar	y Standard		Maximum	Number of Days	
Pollutant	California Federal		Year	Concentration <sup>1</sup>	State/Federal Std. Exceeded	
Carbon Monoxide	20 ppm	35 ppm	2020	1.617 ppm	0/0	
(CO) <sup>2</sup>	for 1 hour	for 1 hour	2021	1.416 ppm	0/0	
(1-Hour)	ioi i iloui	ioi i iloui	2022	1.380 ppm	0/0	
Ozone (O <sub>3</sub> ) <sup>2</sup>	0.09 ppm		2020	0.096 ppm	1/0	
(1-Hour)	for 1 hour	N/A	2021	0.099 ppm	4 / 0	
(1-Hour)	ioi i iloui		2022	0.098 ppm	3/0	
Ozone (O <sub>3</sub> ) <sup>2</sup>	0.070 ppm	0.070 nnm	2020	0.082 ppm	14 / 13	
(8-Hour)	for 8 hours	0.070 ppm for 8 hours	2021	0.084 ppm	8/8	
(0-11001)	101 0 110015	101 0 110018	2022	0.083 ppm	36 / 33	
Nitrogen Dioxide	0.18 ppm	0.100 ppm	2020	0.049 ppm	0/0	
(NO <sub>2</sub> ) <sup>2</sup>	for 1 hour	for 1 hour	2021	0.052 ppm	0/0	
(1402)-	ioi i iloui	ioi i iloui	2022	0.046 ppm	0/0	
Particulate Matter	50 ug/m3	150 µg/m³	2020	165.1 µg/m³	*/2	
	50 μg/m <sup>3</sup>	for 24 hours	2021	192.3 µg/m³	* / 1	
$(PM_{10})^{2,3,4}$	for 24 hours	101 24 110015	2022	76.2 µg/m³	*/0	
Fine Particulate	No Separate	35 ug/m3	2020	13.6 µg/m³	*/0	
Fine Particulate Matter (PM <sub>2.5</sub> ) <sup>2,4</sup>	State Standard	35 µg/m³ for 24 hours	2021	74.7 µg/m³	*/9	
	State Standard	101 Z4 110u1S	2022	15.1 µg/m³	*/0	
ppm = parts per million		PM <sub>10</sub> = particulate n	natter 10 micron	s in diameter or less		

ppm = parts per million μg/m³ = micrograms per cubic meter  $PM_{10}$  = particulate matter 10 microns in diameter or less  $PM_{2.5}$  = particulate matter 2.5 microns in diameter or less

\* = Data Not Provided N/A = Not Applicable

#### Notes:

- 1. Maximum concentration is measured over the same period as the California Standard.
- 2. Measurements taken at the Lancaster Division Street monitoring station located at 43301 Division Street, Lancaster, California 93535.
- 3. PM<sub>10</sub> exceedances are based on State thresholds established prior to amendments adopted on June 20, 2002.
- 4. PM<sub>10</sub> and PM<sub>2.5</sub> exceedances are derived from the number of samples exceeded, not days.

### Sources

California Air Resources Board, ADAM Air Quality Data Statistics, http://www.arb.ca.gov/adam/, accessed November 20, 2023.

California Air Resources Board, AQMIS2: Air Quality Data, https://www.arb.ca.gov/aqmis2/aqdselect.php, accessed November 20, 2023.

### **Sensitive Receptors**

Residences, schools, daycare centers, playgrounds, medical facilities, among others, are considered sensitive receptor land uses.

The nearest sensitive receptor to the project site is an existing single-family residential use located approximately 1,990 feet to the north of the project site. Other sensitive receptors in the vicinity of the project include a park (Apollo Community Regional Park), located approximately 4,070 feet to the west of the project site.

### **REGULATORY SETTING**

### **Federal**

### Federal Clean Air Act

The FCAA of 1970 and the FCAA Amendments of 1971 required the EPA to establish National Ambient Air Quality Standards (NAAQS), which required the EPA to adopt more stringent air quality standards or to include standards for other specific pollutants. The FCAA was amended in 1990 to address a large number of air pollutants that are known to cause or may reasonably be anticipated to cause adverse effects to human health or adverse environmental effects. A total of 188 specific pollutants and chemical groups were initially identified as hazardous air pollutants, and the list has been modified over time. The FCAA Amendments included new regulatory programs to control acid deposition and regulate the issuance of stationary source operating permits. 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 health and welfare; refer to Table 2, National and California Ambient Air Quality Standards.

#### State

## California Clean Air Act

Clean Air Act permitting in California is the shared responsibility of the CARB, its 35 air pollution control agencies (districts), and EPA Region 9. Generally, CARB plays an oversight role for permitting and does not issue any pre-construction or operating permits. However, the State agency provides significant support to agencies that need permitting assistance.

## California Air Resource Board

CARB administers the air quality policy in California. The California Ambient Air Quality Standards (CAAQS) were established in 1969 pursuant to the Mulford-Carrell Act. These standards, shown with the NAAQS in Table 2, 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, hydrogen sulfide, and sulfates. The California Clean Air Act (CCAA), which was approved in 1988, requires that each local air district prepare and maintain an Air Quality Management Plan (AQMP) to achieve compliance with the CAAQS. These AQMP's also serve as the basis for the preparation of the State Implementation Plan (SIP) for the State of California.

Table 2
National and California Ambient Air Quality Standards

		California	1	Federal <sup>2</sup>				
Pollutant	Averaging Time	Standard <sup>3</sup>	Attainment Status <sup>4</sup>	Standards <sup>3</sup>	Attainment Status <sup>4</sup>			
Ozone (O <sub>3</sub> )	1 Hour	0.09 ppm (180 μg/m <sup>3</sup> )	Nonattainment	N/A	Nonattainment			
O2011e (O3)	8 Hours	0.070 ppm (137 μg/m <sup>3</sup> )	Nonattainment	0.070 ppm (137 μg/m <sup>3</sup> )	Nonattainment			
Particulate Matter	24 Hours	50 μg/m <sup>3</sup>		150 μg/m³	Unclassified/			
(PM <sub>10</sub> )	Annual Arithmetic Mean	20 μg/m³	Nonattainment	N/A	Attainment			
Fine Particulate Matter	24 Hours	No Separate State Standard	Unclassified	35 μg/m³	Unclassified/			
(PM <sub>2.5</sub> )	Annual Arithmetic Mean	12 μg/m³	Unclassified	12 μg/m³	Attainment			
Carbon Monoxide	8 Hours	9 ppm (10 mg/m <sup>3</sup> )	Attainment	9 ppm (10 mg/m <sup>3</sup> )	Unclassified/			
(CO)	1 Hour	20 ppm (23 mg/m <sup>3</sup> )	Attairinent	35 ppm (40 mg/m <sup>3</sup> )	Attainment			
Nitrogen Dioxide	Annual Arithmetic Mean	0.030 ppb (57 μg/m³)	Attainment	0.053 ppm (100 μg/m³)	Unclassified/ Attainment			
(NO <sub>2</sub> ) <sup>5</sup>	1 Hour	0.18 ppm (339 μg/m <sup>3</sup> )		100 ppb	Attainment			
	Annual Arithmetic Mean	N/A		0.030 ppm (80 μg/m³)				
Sulfur Dioxide (SO <sub>2</sub> ) <sup>6</sup>	24 Hours	0.04 ppm (105 μg/m³)	Attainment	0.14 ppm (365 μg/m³)	Unclassified/ Attainment			
,	3 Hours	N/A		0.5 ppm (1300 μg/m <sup>3</sup> )	7			
	1 Hour	0.25 ppm (655 μg/m <sup>3</sup> )		75 ppb (196 μg/m <sup>3</sup> )				
	30 days Average	1.5 μg/m <sup>3</sup>		N/A				
Lead (Pb)7,8	Calendar Quarter	N/A	Attainment	1.5 μg/m <sup>3</sup>	Unclassified/			
Leau (i b)	Rolling 3-Month Average	N/A	Attairinent	0.15 μg/m³	Attainment			
Visibility-Reducing Particles <sup>9</sup>	8 Hours	Extinction Coefficient of 0.24 per kilometer - visibility of ten miles or more due to particles when relative humidity is less than 70 percent	Unclassified	No Federal Star	ndards			
Sulfates	24 Hour	25 μg/m³	Attainment					
Hydrogen Sulfide	1 Hour	0.03 ppm (42 μg/m <sup>3</sup> )	Unclassified					
Vinyl Chloride <sup>7</sup>	24 Hour	0.01 ppm (26 μg/m <sup>3</sup> )	Unclassified					

μg/m³ = micrograms per cubic meter; ppm = parts per million; ppb = parts per billion; km = kilometer(s); RH = relative humidity; PST = Pacific Standard Time; N/A = Not Applicable

- 4. The United States Environmental Protection Agency and the California Air Resources Board designate attainment or non-attainment status for different geographic areas based on their ability to meet local or national standards. Portions of the AVAQMD have been designated non-attainment for a variety of pollutants, and some of those designations have an associated classification.
- 5. To attain the 1-hour national standard, the 3-year average of the annual 98th percentile of the 1-hour daily maximum concentrations at each site must not exceed 100 ppb. Note that the national 1-hour standard is in units of parts per billion (ppb). California standards are in units of parts per million (ppm). To directly compare the national 1-hour standard to the California standards the units can be converted from ppb to ppm. In this case, the national standard of 100 ppb is identical to 0.100 ppm.
- 6. On June 2, 2010, a new 1-hour SO<sub>2</sub> standard was established and the existing 24-hour and annual primary standards were revoked. To attain the 1-hour national standard, the 3-year average of the annual 99th percentile of the 1-hour daily maximum concentrations at each site must not exceed 75 ppb. The 1971 SO<sub>2</sub> national standards (24-hour and annual) remain in effect until one year after an area is designated for the 2010 standard, except that in areas designated non-attainment for the 1971 standards, the 1971 standards remain in effect until implementation plans to attain or maintain the 2010 standards are approved. Note that the 1-hour national standard is in units of ppb. California standards are in units of parts per million (ppm). To directly compare the 1-hour national standard to the California standard the units can be converted to ppm. In this case, the national standard of 75 ppb is identical to 0.075 ppm.
- CARB has identified lead and vinyl chloride as 'toxic air contaminants' with no threshold level of exposure for adverse health effects determined. These actions allow for the implementation of
  control measures at levels below the ambient concentrations specified for these pollutants.
- 3. The national standard for lead was revised on October 15, 2008, to a rolling 3-month average. The 1978 lead standard (1.5 µg/m³ as a quarterly average) remains in effect until one year after an area is designated for the 2008 standard, except that in areas designated non-attainment for the 1978 standard, the 1978 standard remains in effect until implementation plans to attain or maintain the 2008 standard are approved.
- In 1989, CARB converted both the general statewide 10-mile visibility standard and the Lake Tahoe 30-mile visibility standard to instrumental equivalents, which are "extinction of 0.23 per kilometer" and "extinction of 0.07 per kilometer" for the statewide and Lake Tahoe Air Basin standards, respectively.

Source: Antelope Valley Air Quality Management District, AVAQMD Attainment Status, https://avaqmd.ca.gov/files/e0986ab83/AVAQMD+2017+Attainment+Status+Table.pdf, accessed October 30, 2023.

California standards for ozone, carbon monoxide (except 8-hour Lake Tahoe), sulfur dioxide (1- and 24-hour), nitrogen dioxide, and particulate matter (PM<sub>10</sub>, PM<sub>2.5</sub>, and visibility reducing particles), are values that are not to be exceeded. All others are not to be equaled or exceeded. California ambient air quality standards are listed in the Table of Standards in Section 70200 of Title 17 of the California Code of Regulations.

National standards (other than ozone, particulate matter, and those based on annual arithmetic mean) are not to be exceeded more than once a year. The ozone standard is attained when the fourth highest 8-hour concentration measured at each site in a year, averaged over three years, is equal to or less than the standard. For PM<sub>10</sub>, the 24-hour standard is attained when the expected number of days per calendar year with a 24-hour average concentration above 150 μg/m³ is equal to or less than one. For PM<sub>2.5</sub>, the 24-hour standard is attained when 98 percent of the daily concentrations, averaged over three years, are equal to or less than the standard.

Concentration expressed first in units in which it was promulgated. Equivalent units given in parentheses are based upon a reference temperature of 25°C and a reference pressure of 760 torr; ppm in this table refers to ppm by volume, or micromoles of pollutant per mole of gas.

Like the EPA, CARB also designates areas within California as either attainment or non-attainment for each criteria pollutant based on whether the CAAQS have been achieved. Under the CCAA, areas are designated as non-attainment for a pollutant if air quality data show that a state standard for the pollutant was violated at least once during the previous three calendar years. Exceedances that are affected by highly irregular or infrequent events are not considered violations of a state standard and are not used as a basis for designating areas as non-attainment.

# **Air Toxics Programs**

Toxic air contaminants are another group of pollutants of concern in southern California. There are hundreds of different types of toxic air contaminants, with varying degrees of toxicity. Sources of toxic air contaminants include industrial processes such as petroleum refining and chrome plating operations, commercial operations such as gasoline stations and dry cleaners, and motor vehicle engine exhaust. Public exposure to toxic air contaminants can result from emissions from normal operations, as well as accidental releases of hazardous materials during upset spill conditions. Health effects of toxic air contaminants include cancer, birth defects, neurological damage, and death.

California regulates toxic air contaminants through its air toxics program, mandated in Chapter 3.5 (Toxic Air Contaminants) of the Health and Safety Code (Health and Safety Code Section 39660 et seq.) and Part 6 (Air Toxics "Hot Spots" Information and Assessment) (Health and Safety Code Section 44300 et seq.). CARB, working in conjunction with the State Office of Environmental Health Hazard Assessment, identifies toxic air contaminants. Air toxic control measures may then be adopted to reduce ambient concentrations of the identified toxic air contaminant to below a specific threshold, based on its effects on health, or to the lowest concentration achievable through use of best available control technology (BACT) for toxics. The program is administered by CARB. Air quality control agencies, including the Antelope Valley Air Quality Management District (AVAQMD), must incorporate air toxic control measures into their regulatory programs or adopt equally stringent control measures as rules within six months of adoption by CARB.

## Regional

## Southern California Association of Governments

On September 3, 2020, the Regional Council of SCAG formally adopted the *Connect SoCal: 2020–2045 Regional Transportation Plan/Sustainable Communities Strategy* (2020-2045 RTP/SCS). The SCS portion of the 2020-2045 RTP/SCS highlights strategies for the region to reach the regional target of reducing greenhouse gases (GHGs) from autos and light-duty trucks by 8 percent per capita by 2020, and 19 percent by 2035 (compared to 2005 levels). Specially, these strategies are:

- Focus growth near destinations and mobility options;
- Promote diverse housing choices;
- Leverage technology innovations;
- Support implementation of sustainability policies; and
- Promote a green region.

Furthermore, the 2020-2045 RTP/SCS discusses a variety of land use tools to help achieve the statemandated reductions in GHG emissions through reduced per capita VMT. Some of these tools include center-focused placemaking, focusing on priority growth areas, job centers, transit priority areas, as well as high quality transit areas and green regions.

## **Antelope Valley Air Quality Management District**

The project site is located within the MDAB, which is under the jurisdiction of the Antelope Valley Air Quality Management District (AVAQMD).

The EPA designated the Western Mojave Desert Nonattainment Area (WMDONA) as nonattainment for the 2015 70 parts per billion (ppb) 8-hour ozone National Ambient Air Quality Standard (NAAQS) pursuant to the provisions of the Federal Clean Air Act. AVAQMD is included in the WMDONA. Based on this nonattainment status for ozone, the AVAQMD adopted the AVAQMD Federal 70 ppb Ozone Attainment Plan (Western Mojave Desert Nonattainment Area) (AVAQMD 70 ppb Plan) on January 17, 2023.8 The document sets forth a comprehensive program that would lead the area into compliance with Federal and State air quality standards. The AVAQMD 70 ppb Plan includes the latest planning assumptions regarding population, vehicle, and industrial activity and addresses all existing and forecasted ozone precursor-producing activities within the Antelope Valley through the year 2026. According to the AVAQMD 70 ppb Plan, AVAQMD would be in attainment of the 70 ppb ozone NAAQS by August 3, 2033.

## **Evaluation Criteria**

In August 2016, the AVAQMD adopted the California Environmental Quality Act (CEQA) and Federal Conformity Guidelines (AVAQMD CEQA and Federal Conformity Guidelines) to provide direction on the preferred analysis approach in preparing environmental analysis or document review.9 The guidelines characterize the topography and climate of the MDAB, defines cumulative impacts, and provide emission thresholds for construction and operation. The AVAQMD CEQA and Federal Conformity Guidelines establish significance thresholds for projects. Any project is significant if it triggers or exceeds the most appropriate evaluation criteria. The evaluation criteria are: (1) generates total emissions (direct and indirect) in excess of the thresholds given in AVAQMD CEQA and Federal Conformity Guidelines Table 6, Significant Emissions Thresholds; (2) generates a violation of any ambient air quality standard when added to the local background; (3) does not conform with the applicable attainment or maintenance plan(s); and (4) exposes sensitive receptors to substantial pollutant concentrations, including those resulting in a cancer risk greater than or equal to 10 in a million and/or a Hazard Index (HI) (non-cancerous) greater than or equal to 1.

## Air Pollutant Emissions Thresholds

Further, AVAQMD CEQA and Federal Conformity Guidelines also provides significance thresholds for both construction and operation of projects within the AVAQMD jurisdictional boundaries. If these thresholds are exceeded, a potentially significant impact could result. However, ultimately the lead agency determines the thresholds of significance for impacts. If a project generates emissions in excess of the established mass daily emissions thresholds. As outlined in Table 3, AVAQMD Significant Emissions

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Antelope Valley Air Quality Management District, AVAQMD Federal 70 ppb Ozone Attainment Plan (Western Mojave Desert Nonattainment Area), January 17, 2023.

Antelope Valley Air Quality Management District, California Environmental Quality Act (CEQA) and Federal Conformity Guidelines, August 2016.

<u>Thresholds</u>, a significant air quality impact may occur and additional analysis is warranted to fully assess the significance of impacts.

Table 3
AVAQMD Significant Emissions Thresholds

Criteria Pollutant	Annual Threshold (tons/year)	Daily Thresholds (pounds/day)			
Carbon Monoxide (CO)	100	548			
Oxides of Nitrogen (NO <sub>x</sub> )	25	137			
Volatile Organic Compounds (VOCs)	25	137			
Oxides of Sulfur (SO <sub>X</sub> )	25	137			
Particulate Matter (PM <sub>10</sub> )	15	82			
Particulate Matter (PM <sub>2.5</sub> )	15	65			

Source: Antelope Valley Air Quality Management District, California Environmental Quality Act (CEQA) and Federal Conformity Guidelines, Table 6, Significant Emissions Thresholds, August 2016.

## Sensitive Receptor Land Uses

Residences, schools, daycare centers, playgrounds, medical facilities, among others, are considered sensitive receptor land uses. According to the AVAQMD CEQA and Federal Conformity Guidelines, the following project types proposed for sites within the specified distance to an existing or planned (zoned) sensitive receptor land use must be evaluated using significance threshold criteria number (4) regarding sensitive receptors and cancer risk:

- Any industrial project within 1,000 feet of sensitive receptor land use;
- A distribution center (40 or more trucks per day) within 1,000 feet;
- A major transportation project (50,000 or more vehicles per day) within 1,000 feet;
- A dry cleaner using perchloroethylene within 500 feet; and
- A gasoline dispensing facility within 300 feet.

### Local

## Lancaster General Plan 2030

The Lancaster General Plan 2030 (General Plan) was adopted on July 14, 2009, and the horizon year for the adopted General Plan is 2030. The General Plan contains the vision, goals, objectives, policies, and specific actions for the City. The General Plan includes the following elements or plans: natural environment, public health and safety, active living, physical mobility, municipal services and facilities, economic development and vitality and physical development. The following objectives and policies related to air quality in the Plan for the Natural Environment Chapter of the General Plan would be applicable to the project:

# Plan for the Natural Environment

- Objective 3.3: Preserve acceptable air quality by striving to attain and maintain national, State and local air quality standards.
  - Policy 3.3.1: Minimize the amount of vehicular miles traveled.
  - Policy 3.3.2: Facilitate the development and use of public transportation and travel modes such as bicycle riding and walking.
  - Policy 3.3.3: Minimize air pollutant emissions generated by new and existing development.
  - Policy 3.3.4: Protect sensitive uses such as homes, schools and medical facilities, from the impacts of air pollution.
  - Policy 3.3.5: Cooperate with AVAQMD and other agencies to protect air quality in the Antelope Valley.
- Objective 14.2: Promote a roadway system which balances the need to move vehicles while protecting environmental, aesthetic, and quality of life issues.
  - Policy 14.2.1: Support and improve a roadway network that is sensitive to environmental issues such as, biological, land, and water resources, as well as air quality, while permitting continued development within the study area.

### **Lancaster Municipal Code**

## Chapter 12.10, Mobile Source Air Pollution Reduction

Lancaster Municipal Code (Municipal Code) Chapter 12.10, Mobile Source Air Pollution Reduction, supports the AVAQMD's imposition of the vehicle registration fee and to bring the City into compliance with the requirements set forth in Section 44243 of the Health and Safety Code to receive fee revenues for the purpose of implementing programs to reduce air pollution from motor vehicles.

## **CALIFORNIA ENVIRONMENTAL QUALITY ACT THRESHOLDS**

In accordance with the *California Environmental Quality Act Guidelines* (CEQA Guidelines), project impacts are evaluated to determine whether significant adverse environmental impacts would occur. This analysis will focus on the project's potential impacts and provide mitigation measures, if required, to reduce or avoid any potentially significant impacts that are identified. According to Appendix G of the CEQA Guidelines, the proposed project would have a significant impact related to air quality if it would:

- Conflict with or obstruct implementation of the applicable air quality plan (refer to Impact Statement AQ-1);
- 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 (refer to Impact Statement AQ-2);

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- Expose sensitive receptors to substantial pollutant concentrations (refer to Impact Statement AQ-3); and/or
- Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people (refer to Impact Statement AQ-4).

## **AVAQMD Daily and Yearly Emissions Thresholds**

Under CEQA, the AVAQMD is a responsible agency on air quality within its jurisdiction or impacting its jurisdiction. Under the FCAA, the AVAQMD has adopted attainment plans for  $O_3$ . The AVAQMD reviews projects to ensure that they would not: (1) cause or contribute to any new violation of any air quality standard; (2) increase the frequency or severity of any existing violation of any air quality standard; or (3) delay timely attainment of any air quality standard or any required interim emission reductions or other milestones of any Federal attainment plan. The AVAQMD has adopted an attainment plan for ozone pursuant to the FCAA.

For the purposes of this air quality analysis, actions that violate Federal standards for criteria pollutants (i.e., primary standards designed to safeguard the health of people considered to be sensitive receptors, and outdoor and secondary standards designed to safeguard human welfare) are considered significant impacts. Additionally, actions that violate State standards developed by the CARB or criteria developed by the AVAQMD, including thresholds for criteria pollutants, are considered significant impacts.

AVAQMD's CEQA and Federal Conformity Guidelines also provides significance thresholds to assess the impact of project related air pollutant emissions. <u>Table 3</u> provides the significance thresholds set forth by the AVAQMD. A project that generates total emissions (direct and indirect) in excess of the thresholds given in <u>Table 3</u> is considered significant.

## **AVAQMD Conformity Impacts**

With respect to conformity impacts, the AVAQMD CEQA and Federal Conformity Guidelines notes the following:

"A project is non-conforming if it conflicts with or delays implementation of any applicable attainment or maintenance plan. A project is conforming if it complies with all applicable District rules and regulations, complies with all proposed control measures that are not yet adopted from the applicable plan(s), and is consistent with the growth forecasts in the applicable plan(s) (or is directly included in the applicable plan). Conformity with growth forecasts can be established by demonstrating that the project is consistent with the land use plan that was used to generate the growth forecast. An example of a non-conforming project would be one that increases the gross number of dwelling units, increases the number of trips, and/or increases the overall vehicle miles traveled in an affected area (relative to the applicable land use plan)."

### **IMPACT ANALYSIS**

# AQ-1 WOULD THE PROJECT CONFLICT WITH OR OBSTRUCT IMPLEMENTATION OF THE APPLICABLE AIR QUALITY PLAN?

Level of Significance: Less Than Significant Impact.

As discussed above, a potentially significant impact to air quality would occur if the project does not conform with the applicable attainment or maintenance plan(s) pursuant to the AVAQMD CEQA and Federal Conformity Guidelines. It is noted that a project is deemed to not exceed this threshold, and hence not be significant, if it is consistent with the existing land use plan. If a project involves zone changes, specific plans, general plan amendments and similar land use plan changes which do not increase dwelling unit density, do not increase vehicle trips, and do not increase vehicle miles traveled, this project would also be deemed to not exceed this threshold.

This air quality analysis would assess the project's consistency with the AVAQMD Federal 70 ppb Ozone Attainment Plan (Western Mojave Desert Nonattainment Area) (AVAQMD 70 ppb Plan). The purpose of the consistency finding is to determine if a project is inconsistent with the assumptions and objectives of the regional air quality plans, and thus, if it would interfere with the region's ability to comply with Federal and State air quality standards. It is important to note that even if a project is found consistent it could still have a significant impact on air quality under CEQA. Consistency with plans means that a project is consistent with the goals, objectives, and assumptions in the respective plan to achieve the Federal and State air quality standards.

As discussed above, according to AVAQMD CEQA and Federal Conformity Guidelines, a project is non-conforming if it conflicts with or delays implementation of any applicable attainment or maintenance plans. A project is conforming if it complies with all applicable AVAQMD rules and regulations, complies with all proposed control measures that are not adopted from applicable plan(s), and is consistent with the growth forecasts in the applicable plan(s). Conformity with growth forecasts can be established by demonstrating that the project is consistent with the land use plan that was used to generate the growth forecast (i.e., General Plan).

## **Compliance With Applicable District Rules And Regulations**

The project would be required to comply with all AVAQMD rules and regulations to improve air quality. Specifically, adherence with AVAQMD Rule 402 would minimize any discharge of contaminants that could be detrimental or would cause a nuisance; adherence with AVAQMD Rule 403 would reduce the amount of particulate matter entrained in the ambient air as a result of anthropogenic (man-made) fugitive dust sources by requiring actions to prevent, reduce or mitigate fugitive dust emissions; adherence with AVAQMD Rule 1113 would limit the quantity of VOC in architectural coatings; and adherence with AVAQMD Rule 1120 would minimize odor impacts from ROG emissions during asphalt paving activities.

Further, the proposed project would result in less than significant impacts regarding localized and regional air pollutants concentrations during project construction and operations; refer to Impact Statement AQ-2. As such, the project would not delay the timely attainment of air quality standards or AVAQMD 70 ppb Plan emissions reductions goals.

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## **Consistency With Land Use Plans And Growth Forecasts**

As detailed above, the project site is designated "Light Industry (LI)" with a "Specific Plan" overlay based on the General Plan. The "LI" designation on the Genera Plan is intended for clean, non-polluting industrial and office uses with support commercial. The project site is zoned "SP 95-01 Fox Field Industrial Corridor Specific Plan" based on the City's Zoning Map. Based on the Specific Plan, the project site is located within focused area "Fox Field East" and designated "Light Industrial" and "Manufacturing/Distribution (MFG)". The "Light Industrial" and "MFG" land use designations in the Specific Plan are intended to support light industrial and manufacturing/distribution uses. The proposed project would include construction of a high-cube cold storage warehouse. As such, the project would be consistent with the existing land use designations and zoning for the site as envisioned by the General Plan, the Specific Plan, and the Zoning Map.

The project implementation is expected to generate approximately 467 employees.<sup>10</sup> Based on a conservative estimate of all employees and their families relocating to the City and the City's average household size of 3.11, project implementation could result in a population increase of approximately 1,452 persons.<sup>11</sup> As such, population growth associated with the project would represent 0.008 percent increase above the City's estimated 2022 population (175,164 persons) based on the California Department of Finance's data.<sup>12</sup> The Southern California Association of Governments (SCAG) regional growth forecasts are based upon long-range development assumptions (i.e., General Plans and Specific Plans) of the relevant jurisdiction.<sup>13</sup> The project's anticipated population increase (1,452 persons) would represent approximately 0.009 percent of the City's anticipated population by 2016 (157,800 persons), or slightly less than 0.006 percent of the County's projected population of the City by 2045 (213,300 persons) according to SCAG. Although the project would result in direct population growth, the project-generated nominal population growth would not constitute substantial unplanned population growth exceeding existing local conditions or regional populations projections.

Further, the project would be consistent with applicable General Plan policies as it would preserve acceptable air quality and promote a roadway systems network that is sensitive to environmental issues, such as air quality; refer to Table 4, *Consistency with the Lancaster General Plan 2030*.

As the project would be consistent with land uses previously envisioned for the site and would not induce substantial population growth, the project would be considered consistent with the growth forecasts in the AVAQMD 70 ppb Plan. In conclusion, the determination of project consistency with the AVAQMD 70 ppb Plan is primarily concerned with the long-term influence of a project on MDAB air quality. The project would not result in long-term impacts on the region's ability to meet State and federal air quality standards. As discussed above, the proposed project would not conflict with the goals and policies of the AVAQMD 70 ppb Plan. Impacts would be less than significant in this regard.

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Assumes 0.38 employees per 1,000 square feet per project Applicant.

<sup>&</sup>lt;sup>11</sup> California Department of Finance, *Report E-5, Population and Housing Estimates for Cities, Counties, and the State, January* 1, 2021-2022, with 2020 Benchmark, May 2022.

<sup>12</sup> Ibid

Southern California Association of Governments, 2020-2045 RTP/SCS Technical Report, Demographics and Growth Forecast, September 3, 2020.

Table 4
Consistency with Lancaster General Plan 2030

General Objectives and Policies	Project Consistency							
Objectives: Preserve acceptable air quality b	y striving to attain and maintain national, State and local air quality standards.							
Policy 3.3.1: Minimize the amount of vehicular miles traveled.	<b>Consistent</b> . The project would minimize the amount of vehicular miles traveled (VMT) and facilitate the development and use of public transportation and travel modes by providing approximately 28 bicycle parking spaces and installing approximately 169 spaces would							
Policy 3.3.2: Facilitate the development and use of public transportation and travel modes such as bicycle riding and walking.	be electric vehicle (EV) parking spaces with 56 electrical charging stations installed, and 113 spaces would be made EV charging capable.							
Policy 3.3.3: Minimize air pollutant emissions generated by new and existing development.	As detailed in <u>Table 6</u> , <u>Construction Emissions</u> , below, the proposed project would not result in short- or long-term air quality impacts as emissions would not exceed the AVAQMD adopted construction or operational thresholds during construction.							
Policy 3.3.4: Protect sensitive uses such as homes, schools and medical facilities, from the impacts of air pollution.	Further, the project would not be in proximity to existing sensitive uses; the nearest sensitive receptor would be the existing residential use, located approximately 1,990 feet from the project site. As such, the project is not anticipated to result in adverse impacts to nearby sensitive uses.							
Policy 3.3.5: Cooperate with AVAQMD and other agencies to protect air quality in the Antelope Valley.	Lastly, the project would be required to comply with all AVAQMD rules and regulations to improve air quality. Specifically, adherence with AVAQMD Rule 402 would minimize any discharge of contaminants that could be detrimental or would cause a nuisance; adherence with AVAQMD Rule 403 would reduce the amount of particulate matter entrained in the ambient air as a result of anthropogenic (man-made) fugitive dust sources by requiring actions to prevent, reduce or mitigate fugitive dust emissions; adherence with AVAQMD Rule 1113 would limit the quantity of reactive/volatile organic compounds (ROG/VOC) in architectural coatings; and adherence with AVAQMD Rule 1120 would minimize odor impacts from ROG emissions during asphalt paving activities. Additionally, the City would continue to cooperate with AVAQMD and other agencies to protect air quality in the region. As such, the project would be consistent with this General Plan objective.							
quality of life issues.	h balances the need to move vehicles while protecting environmental, aesthetic, and							
Policy 14.2.1: Support and improve a roadway network that is sensitive to environmental issues such as, biological, land, and water resources, as well as air quality, while permitting continued development within the study area.	Consistent. The project would improve sidewalks along both Avenue G and 30th Street West. The project would also improve the curbs along 30th Street West. Further, as discussed above, the project would not exceed AVAQMD air pollutant emissions thresholds; refer to Table 6 below. As such, the project would be consistent with this General Plan objective.							
Source: City of Lancaster, Lancaster General Plan 2030, July 14, 2009.								

Mitigation Measures: No mitigation is required.

AQ-2 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?

Level of Significance: Less Than Significant Impact.

## Construction

The California Emissions Estimator Model (CalEEMod) version 2022.1 was utilized to calculate the project's construction and operational air pollutants emissions. The project would be constructed in a single phase/duration. Construction activities would primarily include grading (including excavation for the detention basin), building construction, paving, and architectural coating the project would include approximately 1,000 cubic yards of export during grading phase.

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<u>Table 5</u>, <u>Construction Emissions</u>, presents the project's anticipated construction emissions. The thresholds of significance recommended by the AVAQMD for construction emissions were developed for individual development projects as outlined in the AVAQMD CEQA and Federal Conformity Guidelines.

Table 5
Construction Emissions

Construction Year	Pollutant (pounds/day) 1,2						Pollutant (tons/year) <sup>1,2</sup>					
Construction Year	ROG	NOx	СО	SOx	PM <sub>10</sub>	PM <sub>2.5</sub>	ROG	NOx	СО	SOx	PM <sub>10</sub>	PM <sub>2.5</sub>
Unmitigated Construction Emissions												
Year 1 (2024)	4.49	34.6	70.2	0.07	9.04	2.84	0.31	1.93	3.81	0.01	0.61	0.20
Year 2 (2025)	118	29.2	89.4	0.09	10.9	3.25	4.22	2.95	7.72	0.01	1.22	0.35
Year 2 (2026)	3.57	19.0	47.7	0.07	8.93	2.45	0.08	0.41	1.09	<0.01	0.19	0.05
Maximum Daily / Yearly Emissions	118	34.6	89.4	0.09	10.9	3.25	4.22	2.95	7.72	0.01	1.22	0.35
AVAQMD Significance Threshold <sup>3</sup>	137	137	548	137	82	65	25	25	100	25	15	12
Is Threshold Exceeded?	No	No	No	No	No	No	No	No	No	No	No	No

Notes: AVAQMD = Antelope Valley Air Quality Management District; CO = carbon monoxide;  $NO_X$  = nitrogen oxide;  $PM_{2.5}$  = particulate matter no more than 2.5 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate mat

- 1. Emissions calculated using California Emissions Estimator Model Version 2022.1 (CalEEMod) computer model. The maximum daily emissions (from either summer or winter conditions) are presented.
- 2. The reduction/credits for construction emissions applied in CalEEMod are based on the application of dust control techniques as required by AVAQMD Rule 403. The dust control techniques include the following: water exposed surfaces three times daily; and limit speeds on unpaved roads to 25 miles per hour.
- 3. Threshold source: Antelope Valley Air Quality Management District, California Environmental Quality Act (CEQA) and Federal Conformity Guidelines Table 6, Significant Emissions Thresholds, August 2016. In developing these thresholds, AVAQMD considered levels at which project emissions are cumulatively considerable. Consequently, exceedances of project-level thresholds would be cumulatively considerable.

Source: Refer to Appendix A, Air Quality Emissions Data for CalEEMod outputs.

## **Fugitive Dust Emissions**

Construction activities are a source of fugitive dust emissions that may have a substantial, temporary impact on local air quality. In addition, fugitive dust may be a nuisance to those living and working in the project area. Fugitive dust emissions are associated with land clearing, ground excavation, cut-and-fill, and truck travel on unpaved roadways (including demolition as well as construction activities). Fugitive dust emissions vary substantially from day to day, depending on the level of activity, specific operations, and weather conditions. Fugitive dust from demolition, grading and construction is expected to be short-term and would cease upon project completion. Most of this material is inert silicates, rather than the complex organic particulates released from combustion sources, which are more harmful to health.

Dust (larger than 10 microns) generated by such activities usually becomes more of a local nuisance than a serious health problem. Of particular health concern is the amount of  $PM_{10}$  generated as a part of fugitive dust emissions.  $PM_{10}$  poses a serious health hazard alone or in combination with other pollutants.  $PM_{2.5}$  is mostly produced by mechanical processes. These include automobile tire wear, industrial processes such as cutting and grinding, and re-suspension of particles from the ground or road surfaces

by wind and human activities such as construction or agriculture.  $PM_{2.5}$  is mostly derived from combustion sources, such as automobiles, trucks, and other vehicle exhaust, as well as from stationary sources. These particles are either directly emitted or are formed in the atmosphere from the combustion of gases such as  $NO_X$  and  $SO_X$  combining with ammonia.  $PM_{2.5}$  components from material in the Earth's crust, such as dust, are also present, with the amount varying in different locations.

The project would implement all required dust control techniques per AVAQMD Rule 403 (i.e., at least three times of watering exposed surfaces per day and limit speeds on unpaved roads to 25 miles per hour) to reduce  $PM_{10}$  and  $PM_{2.5}$  concentrations. As depicted in <u>Table 5</u>, total fugitive dust ( $PM_{10}$  and  $PM_{2.5}$ ) emissions during construction would not exceed applicable AVAQMD thresholds. Thus, impacts in this regard would be less than significant.

# **Construction Equipment and Worker Vehicle Exhaust**

Exhaust emissions from construction activities include emissions associated with the transport of machinery and supplies to and from the project site, employee commutes to the project site, emissions produced on-site as equipment is used, and emissions from trucks transporting materials to/from the site. As presented in <u>Table 5</u>, criteria pollutant emissions associated with the use of construction equipment and worker vehicle exhaust would not exceed the applicable AVAQMD thresholds. Therefore, impacts in this regard would be less than significant.

### **ROG Emissions**

In addition to gaseous and particulate emissions, the application of asphalt and surface coatings creates ROG emissions, which are O<sub>3</sub> precursors. The ROG emissions associated with paving and architectural coating have been quantified with the CalEEMod model. As required, all architectural coatings for the proposed project structures would comply with AVAQMD Rule 1113. Rule 1113 provides specifications on painting practices as well as regulates the ROG content of paint. CalEEMod version 2022.1 has incorporated AVAQMD Rule 1113 within modeling; as such, no additional reduction/credits for construction emissions per AVAQMD Rule 1113 were applied in the modeling for the proposed project.

## **Naturally Occurring Asbestos**

Asbestos is a term used for several types of naturally occurring fibrous minerals that are human health hazards when airborne. The most common type of asbestos is chrysotile, but other types such as tremolite and actinolite are also found in California. Asbestos is classified as a known human carcinogen by State, federal, and international agencies and was identified as a toxic air contaminant by CARB in 1986.

Asbestos can be released from serpentinite and ultramafic rocks when the rock is broken or crushed. At the point of release, the asbestos fibers may become airborne, causing air quality and human health hazards. These rocks have been commonly used for unpaved gravel roads, landscaping, fill projects, and other improvement projects in some localities. Asbestos may be released to the atmosphere due to vehicular traffic on unpaved roads, during grading for development projects, and at quarry operations. All of these activities may have the effect of releasing potentially harmful asbestos into the air. Natural weathering and erosion processes can act on asbestos bearing rock and make it easier for asbestos fibers to become airborne if such rock is disturbed. According to the California Department of Conservation Division of Mines and Geology, A General Location Guide for Ultramafic Rocks in California – Areas More

SPR 23-012 Air Quality Assessment *Likely to Contain Naturally Occurring Asbestos Report* (August 2000), serpentinite and ultramafic rocks are not known to occur within the project area. <sup>14</sup> Thus, there would be no impact in this regard.

# **Cumulative Short-Term Construction Impacts**

The thresholds of significance recommended by the AVAQMD for construction emissions were developed for individual development projects as outlined in the AVAQMD CEQA and Federal Conformity Guidelines. In developing these thresholds, AVAQMD considered levels at which project emissions are cumulatively considerable. Consequently, exceedances of project-level thresholds would be cumulatively considerable.

As discussed above, the project's construction emissions would be below the established thresholds and would result in less than significant air quality impacts. Thus, it can be reasonably inferred that the project's construction emissions would not contribute to a cumulatively considerable air quality impact for nonattainment criteria pollutants (i.e., O<sub>3</sub>) in the MDAB. A less than significant impact would occur in this regard.

### **Operations**

Long-term air quality impacts typically consist of mobile source emissions generated from project-related traffic (i.e., motor vehicle use by employees, deliveries travelling to and from the site), and emissions from stationary, area, and energy sources. Emissions associated with each of these sources were calculated and are discussed below. Operational emissions generated by the proposed project are detailed in <u>Table 6</u>, *Maximum Operational Emissions*.

### Mobile Source

Mobile sources are emissions from motor vehicles, including tailpipe and evaporative emissions. Depending upon the pollutant being discussed, the potential air quality impact may be of either regional or local concern. For example, ROG, NO<sub>x</sub>, SO<sub>x</sub>, PM<sub>10</sub>, and PM<sub>2.5</sub> are all pollutants of regional concern (NO<sub>x</sub> and ROG react with sunlight to form O<sub>3</sub> [photochemical smog], and wind currents readily transport SO<sub>x</sub>, PM<sub>10</sub>, and PM<sub>2.5</sub>). However, CO tends to be a localized pollutant, dispersing rapidly at the source.

Project-generated vehicle emissions have been estimated using CalEEMod. According to the *Fox Field Commerce Center – East Trip Generation Estimates* (Trip Generation Table), prepared by Fehr & Peers, dated November 2023, the proposed cold storage warehouse would generate approximately 2,603 total daily trips. The operational air quality analysis utilizes the total daily trips, which does not account for pass-by trips, to provide a worst-case scenario. In addition, since the proposed project is a warehouse use, it is expected to attract heavy-duty vehicle traffic, mainly in the form of large multi-axle trucks. Consistent with the Trip Generation Table, CalEEMod default fleet mix currently account for the heavy-duty truck traffic that would be generated by the project. As such, the fleet mix for the proposed project is based on the CalEEMod default. The project's mobile source emissions would not exceed the established thresholds; refer to Table 6.

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California Department of Conservation Division of Mines and Geology, A General Location Guide for Ultramafic Rocks in California – Areas More Likely to Contain Naturally Occurring Asbestos Report, August 2000, https://ww3.arb.ca.gov/toxics/asbestos/ofr\_2000-019.pdf, accessed September 27, 2023.

Table 6
Maximum Operational Emissions

S	Pollutant (pounds/day) 1,3							Pollutant (tons/year) <sup>1</sup>					
Source	ROG	NOx	СО	SOx	PM <sub>10</sub>	PM <sub>2.5</sub>	ROG	NOx	СО	SOx	PM <sub>10</sub>	PM <sub>2.5</sub>	
Maximum Opera	Maximum Operational Emissions												
Mobile	17.8	25.6	251	0.54	47.7	12.5	2.97	4.79	37.2	0.09	8.69	2.25	
Area	37.0	0.45	53.4	<0.01	0.09	0.07	5.95	0.04	4.80	<0.01	0.01	0.01	
Stationary Source <sup>2</sup>	0.00	0.00	0.00	0.00	0.00	0.00	0.06	0.26	0.15	<0.01	0.01	0.01	
Total Emissions <sup>4</sup>	54.8	26.05	304.	0.54	47.79	12.57	8.98	5.09	42.15	0.09	8.71	2.27	
AVAQMD Significance Threshold <sup>5</sup>	137	137	548	137	82	65	25	25	100	25	15	12	
Is Threshold Exceeded?	No	No	No	No	No	No	No	No	No	No	No	No	

AVAQMD = Antelope Valley Air Quality Management District; CO = carbon monoxide;  $NO_X$  = nitrogen oxide;  $PM_{2.5}$  = particulate matter no more than 2.5 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  = particulate matter no more than 10 microns in diameter;  $PM_{10}$  =  $PM_{1$ 

### Notes:

- 1. Emissions calculated using California Emissions Estimator Model Version 2022.1 (CalEEMod) computer model. The maximum daily emissions (from either summer or winter conditions) are presented.
- 2. The project would include one emergency generator and one firewater pump. As a conservative analysis, it is assumed that the emergency generator and firewater pump would operate for 24 hours per year during emergencies.
- 3. Criteria air pollutant emissions from electricity use were not quantified since criteria pollutants emissions occur at the site of the power plant, which is off-site.
- 4. Totals may be off due to rounding.
- 5. Threshold Source: Antelope Valley Air Quality Management District, California Environmental Quality Act (CEQA) and Federal Conformity Guidelines Table 6, Significant Emissions Thresholds, August 2016. In developing these thresholds, AVAQMD considered levels at which project emissions are cumulatively considerable. Consequently, exceedances of project-level thresholds would be cumulatively considerable.

Source: Refer to Appendix A, Air Quality Emissions Data for CalEEMod outputs.

### **Area Source Emissions**

Area source emissions would be generated from consumer products, architectural coatings, and landscaping. The project's criteria pollutant emissions from area sources would not exceed the established thresholds; refer to Table 6.

### **Energy Source Emissions**

The primary use of electricity by the project would be for space heating and cooling, water heating, ventilation, lighting, appliances, landscaping equipment, and electronics.

The proposed cold storage facility is assumed to be comprised entirely of frozen storage, at -10 degrees Fahrenheit; according to the project Applicant, refrigeration of the warehouse would be fully powered by electricity and no natural gas would be used in this regard. As such, electricity consumption to maintain a primarily frozen storage warehouse has been accounted for in the CalEEMod modeling. Specifically, additional electricity consumption to maintain a freezer has been computed to accommodate a 40 degrees temperature reduction from temperature of a refrigerator (CalEEMod's default for refrigerated warehouse), which is approximately 38 degrees Fahrenheit, assuming a 25 percent increase in electricity

usage per 10 degrees of temperature decrease. <sup>15</sup> Criteria air pollutant emissions from electricity use were not quantified since criteria pollutants emissions occur at the site of the power plant, which is off-site. As the project is not proposing to use natural gas, the project would not generate criteria pollutant emissions from energy source and would not exceed established thresholds.

## **Stationary Source Emissions**

The project proposes one diesel emergency generator and one firewater pump. As a conservative analysis, it is assumed that the emergency generator and firewater pump would operate for 24 hours per year during emergencies. Criteria air pollutant emissions from these stationary sources would be minimal due to the small size and minimal usage of these equipment. Therefore, the project's criteria pollutant emissions from stationary sources would not exceed established thresholds; refer to <u>Table 6</u>.

## **Total Operational Emissions**

As shown in <u>Table 6</u>, both daily and annual total operational emissions would not exceed established AVAQMD thresholds. Therefore, impacts in this regard would be less than significant.

## **Cumulative Long-Term Operational Impacts**

The thresholds of significance recommended by the AVAQMD for construction emissions were developed for individual development projects. In developing these thresholds, AVAQMD considered levels at which project emissions are cumulatively considerable. Consequently, exceedances of project-level thresholds would be cumulatively considerable.

As discussed above, the project's operational emissions would be below the established thresholds and would result in less than significant air quality impacts. Thus, it can be reasonably inferred that the project's operational emissions would not contribute to a cumulatively considerable air quality impact for nonattainment criteria pollutants (i.e.,  $O_3$ ) in the MDAB. A less than significant impact would occur in this regard.

As discussed above, the project's operational emissions would be below the established thresholds and would not result in long-term operational air quality impacts. Additionally, adherence to applicable AVAQMD rules and regulations would alleviate potential impacts related to cumulative conditions on a project-by-project basis. Emission reduction technology, strategies, and plans are constantly being developed. As a result, the proposed project would not contribute a cumulatively considerable net increase of any nonattainment criteria pollutants (i.e., O<sub>3</sub>) in the MDAB. Therefore, no cumulative operational impacts associated with implementation of the proposed project would result.

## **Air Quality Health Impacts**

Adverse health effects induced by criteria pollutant emissions are highly dependent on a multitude of interconnected variables (e.g., cumulative concentrations, local meteorology and atmospheric conditions, and the number and character of exposed individual [e.g., age, gender]). In particular, O<sub>3</sub> precursors, VOCs

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Edison International, 9 Ways to Make Your Refrigerator More Efficient, https://energized.edison.com/stories/9-ways-to-make-your-refrigerator-more-

efficient#:~:text=Take%20Its%20Temperature&text=Set%20them%20to%20whichever%20setting,to%2025%20percent%2 Omore%20energy, accessed May 26, 2023.

and  $NO_x$ , affect air quality on a regional scale. Health effects related to  $O_3$  are therefore the product of emissions generated by numerous sources throughout a region. Existing models have limited sensitivity to small changes in criteria pollutant concentrations and, as such, translating project-generated criteria pollutants to specific health effects or additional days of nonattainment would produce meaningless results. In other words, the project's less than significant increases in regional air pollution from criteria air pollutants during construction would have negligible impacts on human health.

As noted in the Brief of Amicus Curiae by the South Coast Air Quality Management District (SCAQMD), the SCAQMD acknowledged it would be extremely difficult, if not impossible to quantify health impacts of criteria pollutants for various reasons including modeling limitations as well as where in the atmosphere air pollutants interact and form. <sup>16</sup> Further, as noted in the Brief of Amicus Curiae by the San Joaquin Valley Air Pollution Control District (SJVAPCD), SJVAPCD has acknowledged that currently available modeling tools are not equipped to provide a meaningful analysis of the correlation between an individual development project's air emissions and specific human health impacts. <sup>17</sup>

The SCAQMD acknowledges that health effects quantification from  $O_3$ , as an example, is correlated with the increases in ambient level of  $O_3$  in the air (concentration) that an individual person breathes. SCAQMD's Brief of Amicus Curiae states that it would take a large amount of additional emissions to cause a modeled increase in ambient  $O_3$  levels over the entire region. The SCAQMD further states that based on their own modeling in the SCAQMD's 2012 Air Quality Management Plan, a reduction of 432 tons (864,000 pounds) per day of  $NO_x$  and a reduction of 187 tons (374,000 pounds) per day of  $VOC_x$  would reduce  $O_3$  levels at highest monitored site by only nine parts per billion. As such, the SCAQMD concludes that it is not currently possible to accurately quantify  $O_3$ -related health impacts caused by  $VO_x$  or  $VOC_x$  emissions from relatively small projects (defined as projects with regional scope) due to photochemistry and regional model limitations.

Similarly, attempt in quantifying  $O_3$ -related health impacts caused by  $NO_x$  or VOC emissions from relatively small projects (i.e., the proposed cold storage warehouse project) would be highly speculative. Nonetheless, the project would not exceed AVAQMD established thresholds for construction and operational air emissions. Further, the nearest sensitive use is located more than 1,000 feet away. As such, the project is not anticipated to expose sensitive receptors to substantial pollutant concentrations, including those resulting in a cancer risk greater than or equal to 10 in a million and/or a Hazard Index (HI) (non-cancerous) greater than or equal to 1; refer to Impact Statement AQ-3 below for further discussion. Consequently, air quality health impacts resulting from the proposed project are anticipated to be less than significant.

## **Cumulative Conclusion**

The AVAQMD neither recommends quantified analyses of cumulative construction emissions, nor does it provide separate methodologies or thresholds of significance to be used to assess cumulative construction impacts. The AVAQMD significance thresholds for construction are intended to meet the objectives of the AQMP to ensure the NAAQS and CAAQS are not exceeded. As the City has no control over the timing or

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South Coast Air Quality Management District, Application of the South Coast Air Quality Management District for Leave to File Brief of Amicus Curiae in Support of Neither Party and Brief of Amicus Curiae. In the Supreme Court of California. Sierra Club, Revive the San Joaquin, and League of Women Voters of Fresno v. County of Fresno, April 3, 2015.

San Joaquin Valley Air Pollution Control District, Application for Leave to File Brief of Amicus Curiae Brief of San Joaquin Valley Unified Air Pollution Control District in Support of Defendant and Respondent, County of Fresno and Real Party In Interest and Respondent, Friant Ranch, L.P. In the Supreme Court of California. Sierra Club, Revive the San Joaquin, and League of Women Voters of Fresno v. County of Fresno, April 13, 2015.

sequencing of cumulative development in Lancaster, any quantitative analysis to ascertain the daily construction emissions that assumes multiple, concurrent construction would be speculative. In addition, construction-related criteria pollutant emissions are temporary in nature and cease following project completion.

Per AVAQMD rules and mandates, as well as the CEQA requirement that significant impacts be mitigated to the extent feasible, these same requirements (i.e., Rule 403 compliance, the implementation of all feasible mitigation measures, and compliance with adopted AQMP emissions control measures) would also be imposed on construction projects throughout the MDAB, which would include future development in accordance with the General Plan buildout.

As discussed previously, the proposed project would not result in short- or long-term air quality impacts, as emissions would not exceed the AVAQMD adopted construction or operational thresholds. Additionally, adherence to AVAQMD rules and regulations would alleviate potential impacts related to cumulative conditions on a project-by-project basis. As a result, the proposed project would not contribute to a cumulatively considerable net increase of any nonattainment criteria pollutant. Further, construction- and operation-related emissions associated with other development projects in the surrounding area would be required to comply with the applicable AVAQMD rules and regulations. Therefore, the project's incremental construction and operational impacts would not be considered cumulatively considerable, and impacts would be less than significant.

Mitigation Measures: No mitigation is required.

# AQ-3 WOULD THE PROJECT EXPOSE SENSITIVE RECEPTORS TO SUBSTANTIAL POLLUTANT CONCENTRATIONS?

Level of Significance: Less Than Significant Impact With Mitigation Incorporated.

Sensitive receptors are defined as facilities or land uses that include members of the population that are particularly sensitive to the effects of air pollutants, such as children, the elderly, and people with illnesses. CARB has identified the following groups of individuals as the most likely to be affected by air pollution: the elderly over 65, children under 14, athletes, and persons with cardiovascular and chronic respiratory diseases such as asthma, emphysema, and bronchitis. Residences, schools, daycare centers, playgrounds, medical facilities, among others, are considered sensitive receptor land uses by the AVAQMD.

According to the AVAQMD CEQA and Federal Conformity Guidelines, the following project types proposed for sites within the specified distance to an existing or planned (zoned) sensitive receptor land use must be evaluated using significance threshold criteria number (4) regarding sensitive receptors and cancer risk:

- Any industrial project within 1,000 feet of sensitive receptor land use;
- A distribution center (40 or more trucks per day) within 1,000 feet;
- A major transportation project (50,000 or more vehicles per day) within 1,000 feet;
- A dry cleaner using perchloroethylene within 500 feet; and
- A gasoline dispensing facility within 300 feet.

The project proposes the construction of a cold storage warehouse; as such, it shall be considered a distribution center. The nearest sensitive receptor to the project site is the existing single-family

SPR 23-012 Air Quality Assessment residential use located approximately 1,990 feet to the north of the project site. As the project is not located with 1,000 of any sensitive receptors, the project is not anticipated to expose sensitive receptors to substantial pollutant concentrations, including those resulting in a cancer risk greater than or equal to 10 in a million and/or a Hazard Index (HI) (non-cancerous) greater than or equal to 1.

## **Carbon Monoxide Hotspots**

CO emissions are a function of vehicle idling time, meteorological conditions, and traffic flow. Under certain extreme meteorological conditions, CO concentrations near a congested roadway or intersection may reach unhealthful levels (i.e., adversely affecting residents, school children, hospital patients, the elderly, etc.).

The MDAB is designated as an attainment/maintenance area for the Federal CO standards and an attainment area for State standards. There has been a decline in CO emissions even though vehicle miles traveled on U.S. urban and rural roads have increased. Nationwide estimated anthropogenic CO emissions have decreased 68 percent between 1990 and 2014. In 2014, mobile sources accounted for 82 percent of the nation's total anthropogenic CO emissions. CO emissions have continued to decline since this time. The MDAB was re-designated as attainment and is no longer addressed in the AVAQMD's AQMP. Three major control programs have contributed to the reduced per-vehicle CO emissions: exhaust standards, cleaner burning fuels, and motor vehicle inspection/maintenance programs.

Localized concentrations of CO are typically associated with the idling of vehicles, particularly in highly congested areas. For this reason, the areas of primary concern are congested roadway intersections that experience high levels of vehicle traffic with degraded levels of service (LOS). With regard to potential increases in CO concentrations that could potentially exceed applicable ambient air quality standards, signalized intersections that are projected to operate at an unacceptable LOS E or F are of particular concern.

A detailed CO analysis was conducted in the Federal Attainment Plan for Carbon Monoxide (CO Plan) for the SCAQMD's 2003 Air Quality Management Plan. The locations selected for microscale modeling in the CO Plan include the worst-case intersections (those with heavy traffic volumes) in the MDAB, and these intersections would likely experience the highest CO concentrations. Of these locations, the Wilshire Boulevard/Veteran Avenue intersection in Los Angeles experienced the highest CO concentration (4.6 parts per million [ppm]), which is well below the 35-ppm 1-hr CO Federal standard. The Wilshire Boulevard/Veteran Avenue intersection is one of the most congested intersections in Southern California with an average daily trip (ADT) of approximately 100,000 vehicles per day.

As the CO hotspots were not experienced at the Wilshire Boulevard/Veteran Avenue intersection (100,000 vehicle trips per day), it can be reasonably inferred that CO hotspots would not be experienced at any intersections with lower volume of traffic. As discussed above, the project site is located within the northeastern corner of the intersection of Avenue G and 30th Street. Although there is no data available for this intersection, it is in a rural area with limited traffic, and it is acknowledged that the proposed cold storage warehouse would generate approximately 2,603 total daily trips<sup>18</sup>, which is significantly lower than ADT at the Wilshire Boulevard/Veteran Avenue intersection. As such, it is unlike that the proposed project would contribute to a significant increase in CO concentrations that could potentially exceed

Fehr & Peers, Fox Field Commerce Center – East Trip Generation Estimates, November 2023.

applicable ambient air quality standards within project vicinity. Impacts would be less than significant in this regard.

### **Toxic Air Contaminants**

Toxic Air Contaminants (TACs) (also referred to as hazardous air pollutants [HAPs]), are pollutants that result in an increase in mortality, a serious illness, or pose a present or potential hazard to human health. Health effects of TACs may include cancer, birth defects, and immune system and neurological damage.

Project construction may result in temporary increases in emissions of diesel particulate matter (DPM) associated with the use of off-road diesel equipment. Health-related risks associated with diesel-exhaust emissions are primarily associated with long-term exposure and associated risk of contracting cancer. As such, the calculation of cancer risk associated with exposure of to TACs are typically calculated based on a long-term (e.g., 70-year) period of exposure. The use of diesel-powered construction equipment, however, would be temporary and episodic and would occur over a relatively large area. As such, exposure to construction generated DPM would not be anticipated to exceed applicable thresholds (i.e., incremental increase in cancer risk of 1 in one million) during project construction.

The proposed project is anticipated to generate approximately 2,603 total daily trips.<sup>19</sup> As such, the amount of TACs may be significant near the project site. However, as the amount to which the receptors are exposed (a function of concentration and duration of exposure) is the primary factor used to determine health risk (i.e., potential exposure to TAC emission levels that exceed applicable standards), the project is not anticipated to result in significant impacts in this regard as the project site is located approximately 1,990 feet from the nearest sensitive receptor. As such, project operation is not anticipated to result in significant exposure to TAC and impacts in this regard would be less than significant.

## **Valley Fever**

As discussed under "Valley Fever" above, the City is in an area designated as suspected endemic for Valley Fever by the CDC, with a reported incidence rate of approximately 10 per 100,000 persons for the County as of 2017.

There is the potential that Coccidioides spores would be stirred up during excavation, grading, and earthmoving activities, exposing construction workers and nearby sensitive receptors to these spores and thereby, to the potential of contracting Valley Fever. Project construction would be required to comply with AVAQMD Rules 401 and 403 emissions during construction. With project adherence to AVAQMD Rules 401 and 403, dust from potential future construction activity would be limited and would not expose nearby sensitive receptors to the Valley Fever fungus. Further, the project would be required to comply with Mitigation Measure AQ-1, which requires the project Applicant to develop a Valley Fever Training Handout and to provide training for all construction personnel prior to beginning ground disturbing work. Mitigation Measure AQ-1 would also require the project Applicant to prepare a Valley Fever Dust Management Plan in consultation with the Los Angeles County Public Health to minimize personnel and public exposure to potential Coccidioides spores during project construction. In addition, the project site is located approximately 1,990 feet from the nearest sensitive receptor. With compliance with AVAQMD Rules and implementation of Mitigation Measure AQ-2, impacts in this regard would be reduced to less than significant levels.

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<sup>19</sup> Ibid.

Overall, as the project is located approximately 1,990 feet from the nearest sensitive receptor, the project is not anticipated to expose nearby sensitive receptors to substantial pollutant concentrations. Impacts would be less than significant in this regard.

*Mitigation Measures:* The following mitigation measure would be required:

- MM AQ-1 Prior to ground disturbance activities, the project Applicant shall provide evidence to the City of Lancaster Development Services Director that the project Applicant and/or construction manager has developed a "Valley Fever Training Handout", training, and schedule of sessions for education to be provided to all construction personnel. All evidence of the training session materials, handout(s) and schedule shall be submitted to the Development Services Director within 24 hours of the first training session. Multiple training sessions may be conducted if different work crews will come to the site for different stages of construction; however, all construction personnel shall be provided training prior to beginning work. The evidence submitted to the Development Services Director regarding the "Valley Fever Training Handout" and session(s) shall include the following:
  - A sign-in sheet (to include the printed employee names, signature, and date) for all employees who attended the training session.
  - Distribution of a written flier or brochure that includes educational information regarding the health effects of exposure to criteria pollutant emissions and Valley Fever.
  - Training on methods that may help prevent Valley Fever infection.
  - A demonstration to employees on how to use personal protective equipment, such as respiratory equipment (masks), to reduce exposure to pollutants and facilitate recognition of symptoms and earlier treatment of Valley Fever. Wear respirators as required; the equipment shall be readily available and shall be provided to employees for use during work. Proof that the demonstration is included in the training shall be submitted to the City. This proof can be via printed training materials/agenda, DVD, digital media files, or photographs.

The project Applicant also shall consult with the Los Angeles County Department of Public Health (DPH) to develop a Valley Fever Dust Management Plan that addresses the potential presence of the Coccidioides spore and mitigates for the potential for Coccidioidomycosis (Valley Fever). Prior to issuance of permits, the project Applicant shall submit the Valley Fever Dust Management Plan to the DPH for review and comment. The plan shall include a program to evaluate the potential for exposure to Valley Fever from construction activities and to identify appropriate safety procedures that shall be implemented, as needed, to minimize personnel and public exposure to potential Coccidioides spores. Measures in the Plan shall include the following:

- Provide HEP-filters for heavy equipment equipped with factory enclosed cabs capable
  of accepting the filters. Cause contractors utilizing applicable heavy equipment to
  furnish proof of worker training on proper use of applicable heavy equipment cabs, such
  as turning on air conditioning prior to using the equipment.
- Provide communication methods, such as two-way radios, for use in enclosed cabs.
- Require National Institute for Occupational Safety and Health (NIOSH)-approved halfface respirators equipped with minimum N-95 protection factor for use during worker

- collocation with surface disturbance activities, as required per the hazard assessment process.
- Cause employees to be medically evaluated, fit-tested, and properly trained on the use
  of the respirators, and implement a full respiratory protection program in accordance
  with the applicable California Division of Occupational Safety and Health (Cal/OSHA)
  Respiratory Protection Standard (8 CCR 5144).
- Provide separate, clean eating areas with hand-washing facilities.
- Install equipment inspection stations at each construction equipment access/egress point. Examine construction vehicles and equipment for excess soil material and clean, as necessary, before equipment is moved off-site.
- Train workers to recognize the symptoms of Valley Fever, and to promptly report suspected symptoms of work-related Valley Fever to a supervisor.
- Work with a medical professional to develop a protocol to medically evaluate employees who develop symptoms of Valley Fever.
- Work with a medical professional, in consultation with the DPH, to develop an educational handout for on-site workers and include the following information on Valley Fever: what are the potential sources/ causes, what are the common symptoms, what are the options or remedies available should someone be experiencing these symptoms, and where testing for exposure is available. Prior to construction permit issuance, this handout shall have been created by the project operator and reviewed by the project operator and reviewed by the Development Services Director.
- When possible, position workers upwind or crosswind when digging a trench or performing other soil-disturbing tasks.
- Prohibit smoking at the worksite outside of designated smoking areas; designated smoking areas will be equipped with handwashing facilities.
- Post warnings on-site and consider limiting access to visitors, especially those without adequate training and respiratory protection.
- Audit and enforce compliance with relevant Cal/OSHA health and safety standards on the job site.

# AQ-4 WOULD THE PROJECT RESULT IN OTHER EMISSIONS (SUCH AS THOSE LEADING TO ODORS) ADVERSELY AFFECTING A SUBSTANTIAL NUMBER OF PEOPLE?

**Level of Significance:** Less Than Significant Impact.

# Construction

Construction activities associated with the project may generate detectable odors from heavy-duty equipment exhaust and architectural coatings. However, construction-related odors would be short-term in nature and cease upon project completion. In addition, the project would be required to comply with the California Code of Regulations, Title 13, Sections 2449(d)(3) and 2485, which minimizes the idling time of construction equipment either by shutting it off when not in use or by reducing the time of idling to no more than five minutes. This would reduce detectable odors from heavy-duty equipment exhaust. The project would also comply with the AVAQMD Rule 1113, which would minimize odor impacts from ROG emissions during architectural coating. Project adherence with AVAQMD Rule 1120 would minimize odor impacts from ROG emissions during asphalt paving activities. As such, the project would not result in other emissions (such as those leading to odors) adversely affecting a substantial number of people, and less than significant impacts would occur in this regard.

## **Operations**

Land uses associated with odor complaints typically include agricultural uses, wastewater treatment plants, food processing plants, chemical plants, composting, refineries, landfills, dairies, and fiberglass molding. The proposed project involves the construction of a cold storage warehouse. As such, the project would not involve land uses typically associated with odor complaints. In relation to truck operations, the proposed project would be required to comply with the California Code of Regulations, Title 13, Sections 2485(C)(1) which limits the idling time of trucks to no more than five minutes and would further minimize emissions and possible odors. As discussed above, project adherence with AVAQMD Rule 402 would minimize any discharge of contaminants that could be detrimental or would cause a nuisance. As such, less than significant impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

#### REFERENCES

### **Documents**

- 1. Antelope Valley Air Quality Management District, *AVAQMD Attainment Status*, https://avaqmd.ca.gov/files/e0986ab83/AVAQMD+2017+Attainment+Status+Table.pdf, accessed October 30, 2023.
- 2. Antelope Valley Air Quality Management District, AVAQMD Federal 70 ppb Ozone Attainment Plan (Western Mojave Desert Nonattainment Area), January 17, 2023.
- 3. Antelope Valley Air Quality Management District, *California Environmental Quality Act (CEQA) and Federal Conformity Guidelines*, August 2016.
- 4. California Air Resources Board, *ADAM Air Quality Data Statistics*, http://www.arb.ca.gov/adam/, accessed November 20, 2023.
- 5. California Air Resources Board, *AQMIS2: Air Quality Data*, https://www.arb.ca.gov/aqmis2/aqdselect.php, accessed November 20, 2023.
- California Department of Conservation Division of Mines and Geology, A General Location Guide for Ultramafic Rocks in California – Areas More Likely to Contain Naturally Occurring Asbestos Report, August 2000, https://ww3.arb.ca.gov/toxics/asbestos/ofr\_2000-019.pdf, accessed September 27, 2023.
- 7. California Department of Finance, Report E-5, Population and Housing Estimates for Cities, Counties, and the State, January 1, 2021-2022, with 2020 Benchmark, May 2022.
- 8. Centers for Disease Control and Prevention, *More information about the estimated areas with blastomycosis, coccidioidomycosis (Valley fever), and histoplasmosis in the United States,* https://www.cdc.gov/fungal/pdf/more-information-about-fungal-maps-508.pdf, accessed September 27, 2023.
- 9. City of Lancaster, City of Lancaster Zoning Map, adopted July 13, 2010, revised October 26, 2022.
- 10. City of Lancaster, Fox Field Industrial Corridor Specific Plan, May 31, 1996.
- 11. City of Lancaster, Lancaster General Plan 2030, July 14, 2009.
- 12. City of Lancaster, *Lancaster General Plan 2030, General Plan Land Use Map*, adopted July 14, 2009, updated September 1, 2015.
- 13. Fehr & Peers, Fox Field Commerce Center East Trip Generation Estimates, November 2023.
- 14. Los Angeles County Department of Public Health, Annual Morbidity and Special Studies Report 2017, Table I. Annual Incidence Rates of Selected Notifiable Diseases and Conditions by Year of Onset LAC, 2012–2017, http://publichealth.lacounty.gov/acd/Publications.htm.

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- 15. San Joaquin Valley Air Pollution Control District, Application for Leave to File Brief of Amicus Curiae Brief of San Joaquin Valley Unified Air Pollution Control District in Support of Defendant and Respondent, County of Fresno and Real Party In Interest and Respondent, Friant Ranch, L.P. In the Supreme Court of California. Sierra Club, Revive the San Joaquin, and League of Women Voters of Fresno v. County of Fresno, April 13, 2015.
- 16. Southern California Association of Governments, 2020-2045 RTP/SCS Technical Report, Demographics and Growth Forecast, September 3, 2020.
- 17. South Coast Air Quality Management District, Application of the South Coast Air Quality Management District for Leave to File Brief of Amicus Curiae in Support of Neither Party and Brief of Amicus Curiae. In the Supreme Court of California. Sierra Club, Revive the San Joaquin, and League of Women Voters of Fresno v. County of Fresno, April 3, 2015.
- 18. U.S. Climate Data, *Monthly, Climate Lancaster California*, https://www.usclimatedata.com/climate/lancaster/california/%20united-states/usca0591, accessed September 27, 2023.

## **Programs**

- 1. Google Earth Pro, 2023.
- 2. California Air Pollution Control Officers Association, California Emissions Estimator Model (CalEEMod), version 2022.1.

**Appendix A**Air Quality Emissions Data

# SPR 23-012 Cold Storage Detailed Report

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# 1. Basic Project Information

#### 1.1. Basic Project Information

Data Field	Value
Project Name	SPR 23-012 Cold Storage
Construction Start Date	6/1/2024
Operational Year	2026
Lead Agency	_
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	5.00
Precipitation (days)	13.0
Location	34.74001446139063, -118.18355042820825
County	Los Angeles-Mojave Desert
City	Lancaster
Air District	Antelope Valley AQMD
Air Basin	Mojave Desert
TAZ	3673
EDFZ	7
Electric Utility	Southern California Edison
Gas Utility	Southern California Gas
App Version	2022.1.1.20

## 1.2. Land Use Types

Land Us	se Subtype	Size	Unit	Lot Acreage	Building Area (sq ft)	Landscape Area (sq	Special Landscape	Population	Description
						ft)	Area (sq ft)		

Refrigerated Warehouse-No Rail	1,227	1000sqft	28.2	1,227,000	823,472		_	27.93 percent landscaping coverage of the net site area
Parking Lot	274	1000sqft	6.29	0.00	_	_	_	Estimated areas for trailer parking spaces (55' by 12') and loading docks (60' by 13')
Parking Lot	564	Space	5.08	0.00	_	_	_	_

#### 1.3. User-Selected Emission Reduction Measures by Emissions Sector

Sector	#	Measure Title
Construction	C-10-A	Water Exposed Surfaces
Construction	C-11	Limit Vehicle Speeds on Unpaved Roads
Construction	C-12	Sweep Paved Roads
Transportation	T-14*	Provide Electric Vehicle Charging Infrastructure
Transportation	T-34*	Provide Bike Parking
Waste	S-1/S-2	Implement Waste Reduction Plan

<sup>\*</sup> Qualitative or supporting measure. Emission reductions not included in the mitigated emissions results.

## 2. Emissions Summary

## 2.1. Construction Emissions Compared Against Thresholds

Un/Mit.	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Unmit.	6.63	118	34.6	89.4	0.09	1.45	10.00	11.0	1.33	3.73	5.07	_	19,235	19,235	0.56	1.20	54.4	19,660

Mit.	6.63	118	34.6	89.4	0.09	1.45	10.00	10.9	1.33	2.42	3.25	_	19,235	19,235	0.56	1.20	54.4	19,660
% Reduced		_	_	_	_	_	_	1%	_	35%	36%	_	_	_	_	_	_	_
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Unmit.	6.28	118	29.2	69.1	0.09	0.90	10.00	10.9	0.83	2.42	3.25	_	18,222	18,222	0.58	1.20	1.41	18,596
Mit.	6.28	118	29.2	69.1	0.09	0.90	10.00	10.9	0.83	2.42	3.25	_	18,222	18,222	0.58	1.20	1.41	18,596
% Reduced		_	_	_	_	_	_	_	_		_	_	_	_	_	_	_	_
Average Daily (Max)	_	_	_	_	_	_	_	_	_	_		_	_	_	_	_	_	_
Unmit.	3.56	23.1	16.1	42.3	0.05	0.44	6.26	6.70	0.41	1.52	1.93	_	11,462	11,462	0.34	0.82	15.2	11,730
Mit.	3.56	23.1	16.1	42.3	0.05	0.44	6.26	6.70	0.41	1.52	1.93	_	11,462	11,462	0.34	0.82	15.2	11,730
% Reduced	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Annual (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Unmit.	0.65	4.22	2.95	7.72	0.01	0.08	1.14	1.22	0.07	0.28	0.35	_	1,898	1,898	0.06	0.14	2.52	1,942
Mit.	0.65	4.22	2.95	7.72	0.01	0.08	1.14	1.22	0.07	0.28	0.35	_	1,898	1,898	0.06	0.14	2.52	1,942
% Reduced	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

## 2.2. Construction Emissions by Year, Unmitigated

Year	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily - Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
2024	5.21	4.49	34.6	70.2	0.07	1.45	9.52	11.0	1.33	3.73	5.07	_	16,131	16,131	0.43	1.17	49.8	16,542

2025	6.63	118	28.5	89.4	0.09	0.90	10.00	10.9	0.83	2.42	3.25	_	19,235	19,235	0.56	1.20	54.4	19,660
Daily - Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	-	_	_	_
2024	4.70	4.17	21.4	52.8	0.07	0.59	8.46	9.04	0.55	2.05	2.60	_	15,290	15,290	0.45	1.17	1.29	15,652
2025	6.28	118	29.2	69.1	0.09	0.90	10.00	10.9	0.83	2.42	3.25	_	18,222	18,222	0.58	1.20	1.41	18,596
2026	4.32	3.57	19.0	47.7	0.07	0.47	8.46	8.93	0.39	2.05	2.45	_	14,819	14,819	0.43	1.13	1.12	15,167
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
2024	1.92	1.69	10.6	20.9	0.03	0.35	3.63	3.98	0.32	1.05	1.37	_	5,467	5,467	0.17	0.36	6.53	5,586
2025	3.56	23.1	16.1	42.3	0.05	0.44	6.26	6.70	0.41	1.52	1.93	_	11,462	11,462	0.34	0.82	15.2	11,730
2026	0.50	0.44	2.22	5.96	0.01	0.05	0.97	1.02	0.05	0.24	0.28	_	1,732	1,732	0.05	0.13	2.15	1,774
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
2024	0.35	0.31	1.93	3.81	0.01	0.06	0.66	0.73	0.06	0.19	0.25	_	905	905	0.03	0.06	1.08	925
2025	0.65	4.22	2.95	7.72	0.01	0.08	1.14	1.22	0.07	0.28	0.35	_	1,898	1,898	0.06	0.14	2.52	1,942
2026	0.09	0.08	0.41	1.09	< 0.005	0.01	0.18	0.19	0.01	0.04	0.05	_	287	287	0.01	0.02	0.36	294

## 2.3. Construction Emissions by Year, Mitigated

Year	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily - Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
2024	5.21	4.49	34.6	70.2	0.07	1.45	8.46	9.04	1.33	2.05	2.84	_	16,131	16,131	0.43	1.17	49.8	16,542
2025	6.63	118	28.5	89.4	0.09	0.90	10.00	10.9	0.83	2.42	3.25	_	19,235	19,235	0.56	1.20	54.4	19,660
Daily - Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
2024	4.70	4.17	21.4	52.8	0.07	0.59	8.46	9.04	0.55	2.05	2.60	_	15,290	15,290	0.45	1.17	1.29	15,652
2025	6.28	118	29.2	69.1	0.09	0.90	10.00	10.9	0.83	2.42	3.25	_	18,222	18,222	0.58	1.20	1.41	18,596

2026	4.32	3.57	19.0	47.7	0.07	0.47	8.46	8.93	0.39	2.05	2.45	_	14,819	14,819	0.43	1.13	1.12	15,167
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
2024	1.92	1.69	10.6	20.9	0.03	0.35	2.97	3.32	0.32	0.79	1.11	_	5,467	5,467	0.17	0.36	6.53	5,586
2025	3.56	23.1	16.1	42.3	0.05	0.44	6.26	6.70	0.41	1.52	1.93	_	11,462	11,462	0.34	0.82	15.2	11,730
2026	0.50	0.44	2.22	5.96	0.01	0.05	0.97	1.02	0.05	0.24	0.28	_	1,732	1,732	0.05	0.13	2.15	1,774
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
2024	0.35	0.31	1.93	3.81	0.01	0.06	0.54	0.61	0.06	0.14	0.20	_	905	905	0.03	0.06	1.08	925
2025	0.65	4.22	2.95	7.72	0.01	0.08	1.14	1.22	0.07	0.28	0.35	_	1,898	1,898	0.06	0.14	2.52	1,942
2026	0.09	0.08	0.41	1.09	< 0.005	0.01	0.18	0.19	0.01	0.04	0.05	_	287	287	0.01	0.02	0.36	294

## 2.4. Operations Emissions Compared Against Thresholds

Un/Mit.	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	-	_	_
Unmit.	29.5	54.8	23.9	305	0.54	0.47	47.7	48.1	0.43	12.1	12.5	1,165	104,266	105,432	124	4.03	32,917	142,660
Mit.	29.5	54.8	23.9	305	0.54	0.47	47.7	48.1	0.43	12.1	12.5	699	104,266	104,965	77.8	4.03	32,917	141,029
% Reduced	_	_	_	_	_	_	_	_	_	_	_	40%	_	< 0.5%	37%	_	_	1%
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Unmit.	18.3	44.4	25.6	187	0.49	0.38	47.7	48.0	0.35	12.1	12.5	1,165	99,210	100,375	124	4.13	32,705	137,422
Mit.	18.3	44.4	25.6	187	0.49	0.38	47.7	48.0	0.35	12.1	12.5	699	99,210	99,909	77.8	4.13	32,705	135,791
% Reduced	_	_	_	_	_	_	_	_	_	_	_	40%	_	< 0.5%	37%	_	_	1%

Average Daily (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Unmit.	23.5	49.2	27.9	231	0.51	0.47	47.3	47.7	0.44	12.0	12.4	1,165	100,601	101,767	124	4.17	32,794	138,913
Mit.	23.5	49.2	27.9	231	0.51	0.47	47.3	47.7	0.44	12.0	12.4	699	100,601	101,300	77.9	4.17	32,794	137,282
% Reduced	_	_	_	_	_	_	_	_	_	_	_	40%	_	< 0.5%	37%	_	_	1%
Annual (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Unmit.	4.29	8.98	5.09	42.1	0.09	0.09	8.62	8.71	0.08	2.19	2.27	193	16,656	16,849	20.6	0.69	5,429	22,999
Mit.	4.29	8.98	5.09	42.1	0.09	0.09	8.62	8.71	0.08	2.19	2.27	116	16,656	16,771	12.9	0.69	5,429	22,729
% Reduced	_	_	_	-	_	_	_	_	_	_	-	40%	_	< 0.5%	37%	_	_	1%

## 2.5. Operations Emissions by Sector, Unmitigated

Sector	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	-	_
Mobile	20.0	17.8	23.4	251	0.54	0.38	47.7	48.0	0.35	12.1	12.5	_	54,939	54,939	1.83	2.14	217	55,838
Area	9.49	37.0	0.45	53.4	< 0.005	0.09	_	0.09	0.07	_	0.07	_	219	219	0.01	< 0.005	_	220
Energy	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	47,505	47,505	4.53	0.55	_	47,782
Water	_	_	_	_	_	_	_	_	_	_	_	544	1,603	2,147	55.9	1.34	_	3,945
Waste	_	_	_	_	_	_	_	_	_	_	_	622	0.00	622	62.1	0.00	_	2,175
Refrig.	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700
Stationar y	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	29.5	54.8	23.9	305	0.54	0.47	47.7	48.1	0.43	12.1	12.5	1,165	104,266	105,432	124	4.03	32,917	142,660

Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Mobile	18.3	16.1	25.6	187	0.49	0.38	47.7	48.0	0.35	12.1	12.5	_	50,102	50,102	1.86	2.24	5.63	50,821
Area	_	28.3	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Energy	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	_	0.00	-	47,505	47,505	4.53	0.55	_	47,782
Water	_	_	_	_	_	_	_	_	_	_	_	544	1,603	2,147	55.9	1.34	_	3,945
Waste	_	_	_	_	_	_	_	_	_	_	_	622	0.00	622	62.1	0.00	_	2,175
Refrig.	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700
Stationar y	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	18.3	44.4	25.6	187	0.49	0.38	47.7	48.0	0.35	12.1	12.5	1,165	99,210	100,375	124	4.13	32,705	137,422
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	-	_	_	_	_	_
Mobile	18.5	16.3	26.3	204	0.50	0.38	47.3	47.6	0.35	12.0	12.4	-	51,215	51,215	1.88	2.27	93.7	52,032
Area	4.68	32.6	0.22	26.3	< 0.005	0.05	_	0.05	0.04	_	0.04		108	108	< 0.005	< 0.005	_	109
Energy	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	47,505	47,505	4.53	0.55	_	47,782
Water	_	_	_	_	_	_	_	_	_	_	_	544	1,603	2,147	55.9	1.34	_	3,945
Waste	_	_	_	_	_	_	_	_	_	_	_	622	0.00	622	62.1	0.00	_	2,175
Refrig.	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700
Stationar y	0.37	0.33	1.41	0.85	< 0.005	0.05	0.00	0.05	0.05	0.00	0.05	0.00	170	170	0.01	< 0.005	0.00	171
Total	23.5	49.2	27.9	231	0.51	0.47	47.3	47.7	0.44	12.0	12.4	1,165	100,601	101,767	124	4.17	32,794	138,913
Annual	_	_	_	_	_	_	_	-	_	_	_	-	_	_	_	_	_	_
Mobile	3.37	2.97	4.79	37.2	0.09	0.07	8.62	8.69	0.06	2.19	2.25	_	8,479	8,479	0.31	0.38	15.5	8,615
Area	0.85	5.95	0.04	4.80	< 0.005	0.01	_	0.01	0.01	_	0.01	<u> </u>	17.9	17.9	< 0.005	< 0.005	_	18.0
Energy	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	-	7,865	7,865	0.75	0.09	_	7,911
Water	_	_	_	_	_	_	_	_	_	_	_	90.0	265	355	9.26	0.22	_	653
Waste	_	_	_	_	_	_	_	_	_	_	_	103	0.00	103	10.3	0.00	_	360

Refrig.	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	5,414	5,414
Stationar y	0.07	0.06	0.26	0.15	< 0.005	0.01	0.00	0.01	0.01	0.00	0.01	0.00	28.2	28.2	< 0.005	< 0.005	0.00	28.3
Total	4.29	8.98	5.09	42.1	0.09	0.09	8.62	8.71	0.08	2.19	2.27	193	16,656	16,849	20.6	0.69	5,429	22,999

## 2.6. Operations Emissions by Sector, Mitigated

Sector	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Mobile	20.0	17.8	23.4	251	0.54	0.38	47.7	48.0	0.35	12.1	12.5	_	54,939	54,939	1.83	2.14	217	55,838
Area	9.49	37.0	0.45	53.4	< 0.005	0.09	_	0.09	0.07	_	0.07	_	219	219	0.01	< 0.005	_	220
Energy	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	47,505	47,505	4.53	0.55	_	47,782
Water	_	_	_	_	_	_	_	_	_	_	_	544	1,603	2,147	55.9	1.34	_	3,945
Waste	_	_	_	_	_	_	_	_	_	_	_	155	0.00	155	15.5	0.00	_	544
Refrig.	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700
Stationar y	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	29.5	54.8	23.9	305	0.54	0.47	47.7	48.1	0.43	12.1	12.5	699	104,266	104,965	77.8	4.03	32,917	141,029
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	-
Mobile	18.3	16.1	25.6	187	0.49	0.38	47.7	48.0	0.35	12.1	12.5	_	50,102	50,102	1.86	2.24	5.63	50,821
Area	_	28.3	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Energy	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	47,505	47,505	4.53	0.55	_	47,782
Water	_	_	_	_	_	_	_	_	_	_	_	544	1,603	2,147	55.9	1.34	_	3,945
Waste	_	_	_	_	_	_	_	_	_	_	_	155	0.00	155	15.5	0.00	_	544
Refrig.	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700

Stationar	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	18.3	44.4	25.6	187	0.49	0.38	47.7	48.0	0.35	12.1	12.5	699	99,210	99,909	77.8	4.13	32,705	135,791
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Mobile	18.5	16.3	26.3	204	0.50	0.38	47.3	47.6	0.35	12.0	12.4	_	51,215	51,215	1.88	2.27	93.7	52,032
Area	4.68	32.6	0.22	26.3	< 0.005	0.05	_	0.05	0.04	_	0.04	_	108	108	< 0.005	< 0.005	_	109
Energy	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	47,505	47,505	4.53	0.55	_	47,782
Water	_	_	_	_	_	_		_				544	1,603	2,147	55.9	1.34	_	3,945
Waste	_	_	_	_	_	_	_	_				155	0.00	155	15.5	0.00	_	544
Refrig.	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700
Stationar y	0.37	0.33	1.41	0.85	< 0.005	0.05	0.00	0.05	0.05	0.00	0.05	0.00	170	170	0.01	< 0.005	0.00	171
Total	23.5	49.2	27.9	231	0.51	0.47	47.3	47.7	0.44	12.0	12.4	699	100,601	101,300	77.9	4.17	32,794	137,282
Annual	_	_	_	_	_	_	_	_				_	_	_	_	_	_	_
Mobile	3.37	2.97	4.79	37.2	0.09	0.07	8.62	8.69	0.06	2.19	2.25	_	8,479	8,479	0.31	0.38	15.5	8,615
Area	0.85	5.95	0.04	4.80	< 0.005	0.01	_	0.01	0.01		0.01	_	17.9	17.9	< 0.005	< 0.005	_	18.0
Energy	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	7,865	7,865	0.75	0.09	_	7,911
Water	_	_	_	_	_	_	_	_	_	_		90.0	265	355	9.26	0.22	_	653
Waste	_	_	_	_	_	_	_	_	_	_	_	25.7	0.00	25.7	2.57	0.00	_	90.0
Refrig.	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	5,414	5,414
Stationar y	0.07	0.06	0.26	0.15	< 0.005	0.01	0.00	0.01	0.01	0.00	0.01	0.00	28.2	28.2	< 0.005	< 0.005	0.00	28.3
Total	4.29	8.98	5.09	42.1	0.09	0.09	8.62	8.71	0.08	2.19	2.27	116	16,656	16,771	12.9	0.69	5,429	22,729

## 3. Construction Emissions Details

#### 3.1. Grading (2024) - Unmitigated

Location	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	-	_	_	_	-	_	_	-	_	_	_	_	_	_	-
Off-Road Equipmen		3.52	34.3	30.2	0.06	1.45	_	1.45	1.33	_	1.33	_	6,598	6,598	0.27	0.05	_	6,621
Dust From Material Movemen	<u> </u>	_	_		_	_	9.21	9.21	_	3.65	3.65	_		_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.41	4.04	3.55	0.01	0.17	_	0.17	0.16	_	0.16	_	777	777	0.03	0.01	_	780
Dust From Material Movemen	_	_	_	-	_	_	1.08	1.08	_	0.43	0.43	_	-	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.08	0.74	0.65	< 0.005	0.03	_	0.03	0.03	_	0.03	_	129	129	0.01	< 0.005	_	129
Dust From Material Movemen	<u> </u>	_	_	_	_	_	0.20	0.20	_	0.08	0.08	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

Offsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	-	-	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.14	0.12	0.12	2.12	0.00	0.00	0.26	0.26	0.00	0.06	0.06	_	295	295	0.01	0.01	1.25	299
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.01	< 0.005	0.20	0.05	< 0.005	< 0.005	0.05	0.06	< 0.005	0.01	0.02	_	196	196	< 0.005	0.03	0.43	206
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	-
Worker	0.01	0.01	0.02	0.19	0.00	0.00	0.03	0.03	0.00	0.01	0.01	_	31.8	31.8	< 0.005	< 0.005	0.06	32.2
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	_	23.1	23.1	< 0.005	< 0.005	0.02	24.2
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	< 0.005	< 0.005	< 0.005	0.03	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	_	5.26	5.26	< 0.005	< 0.005	0.01	5.33
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	_	3.82	3.82	< 0.005	< 0.005	< 0.005	4.01

#### 3.2. Grading (2024) - Mitigated

Location	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		3.52	34.3	30.2	0.06	1.45	_	1.45	1.33	_	1.33	_	6,598	6,598	0.27	0.05	_	6,621

Dust From Material Movemen	_	_	_	_		_	3.59	3.59	_	1.43	1.43	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.41	4.04	3.55	0.01	0.17	_	0.17	0.16	_	0.16	_	777	777	0.03	0.01	_	780
Dust From Material Movemen	<u> </u>	_	_	_	-	_	0.42	0.42	_	0.17	0.17	_	_	_	-	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.08	0.74	0.65	< 0.005	0.03	_	0.03	0.03	-	0.03	-	129	129	0.01	< 0.005	_	129
Dust From Material Movemen	_	_	_	_	_	_	0.08	0.08	_	0.03	0.03	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.14	0.12	0.12	2.12	0.00	0.00	0.26	0.26	0.00	0.06	0.06	_	295	295	0.01	0.01	1.25	299
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.01	< 0.005	0.20	0.05	< 0.005	< 0.005	0.05	0.06	< 0.005	0.01	0.02	_	196	196	< 0.005	0.03	0.43	206

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Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.01	0.01	0.02	0.19	0.00	0.00	0.03	0.03	0.00	0.01	0.01	_	31.8	31.8	< 0.005	< 0.005	0.06	32.2
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	_	23.1	23.1	< 0.005	< 0.005	0.02	24.2
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	< 0.005	< 0.005	< 0.005	0.03	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	_	5.26	5.26	< 0.005	< 0.005	0.01	5.33
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	<u> </u>	3.82	3.82	< 0.005	< 0.005	< 0.005	4.01

## 3.3. Building Construction (2024) - Unmitigated

Location	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		1.20	11.2	13.1	0.02	0.50	_	0.50	0.46	_	0.46	_	2,398	2,398	0.10	0.02	_	2,406
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		1.20	11.2	13.1	0.02	0.50	_	0.50	0.46	_	0.46	_	2,398	2,398	0.10	0.02	_	2,406
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

Average Daily	_	-	-	-	_	_	_	-	_	_	-	_	-	_	_	_	_	_
Off-Road Equipmen		0.36	3.36	3.93	0.01	0.15	-	0.15	0.14	_	0.14	_	718	718	0.03	0.01	_	720
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_		<u> </u>	_	_	_	<u> </u>	_	_		_	_	_	_	_	_	_
Off-Road Equipmen		0.07	0.61	0.72	< 0.005	0.03	-	0.03	0.03	-	0.03	-	119	119	< 0.005	< 0.005	-	119
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	3.54	3.07	3.16	54.6	0.00	0.00	6.74	6.74	0.00	1.58	1.58	_	7,597	7,597	0.32	0.26	32.2	7,714
Vendor	0.23	0.21	6.44	2.51	0.05	0.09	1.72	1.81	0.09	0.48	0.57	_	6,137	6,137	0.01	0.90	17.6	6,422
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_		_	_	_	_	_	_	_	_
Worker	3.06	2.78	3.41	37.1	0.00	0.00	6.74	6.74	0.00	1.58	1.58	_	6,749	6,749	0.35	0.26	0.84	6,835
Vendor	0.21	0.19	6.80	2.58	0.05	0.09	1.72	1.81	0.09	0.48	0.57	_	6,143	6,143	0.01	0.90	0.46	6,411
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.92	0.84	1.09	12.4	0.00	0.00	2.00	2.00	0.00	0.47	0.47	_	2,079	2,079	0.10	0.08	4.18	2,109
Vendor	0.07	0.06	2.04	0.76	0.01	0.03	0.51	0.54	0.03	0.14	0.17	_	1,838	1,838	< 0.005	0.27	2.27	1,921
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	<u> </u>	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.17	0.15	0.20	2.27	0.00	0.00	0.37	0.37	0.00	0.09	0.09	_	344	344	0.02	0.01	0.69	349

Vendor	0.01	0.01	0.37	0.14	< 0.005	< 0.005	0.09	0.10	< 0.005	0.03	0.03	_	304	304	< 0.005	0.04	0.38	318
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

## 3.4. Building Construction (2024) - Mitigated

Location	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		1.20	11.2	13.1	0.02	0.50	_	0.50	0.46	_	0.46	_	2,398	2,398	0.10	0.02	_	2,406
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		1.20	11.2	13.1	0.02	0.50	_	0.50	0.46	_	0.46	_	2,398	2,398	0.10	0.02	_	2,406
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.36	3.36	3.93	0.01	0.15	_	0.15	0.14	_	0.14	_	718	718	0.03	0.01	_	720
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.07	0.61	0.72	< 0.005	0.03	_	0.03	0.03	_	0.03	_	119	119	< 0.005	< 0.005	_	119
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

Offsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	3.54	3.07	3.16	54.6	0.00	0.00	6.74	6.74	0.00	1.58	1.58	_	7,597	7,597	0.32	0.26	32.2	7,714
Vendor	0.23	0.21	6.44	2.51	0.05	0.09	1.72	1.81	0.09	0.48	0.57	_	6,137	6,137	0.01	0.90	17.6	6,422
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	3.06	2.78	3.41	37.1	0.00	0.00	6.74	6.74	0.00	1.58	1.58	_	6,749	6,749	0.35	0.26	0.84	6,835
Vendor	0.21	0.19	6.80	2.58	0.05	0.09	1.72	1.81	0.09	0.48	0.57	_	6,143	6,143	0.01	0.90	0.46	6,411
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.92	0.84	1.09	12.4	0.00	0.00	2.00	2.00	0.00	0.47	0.47	_	2,079	2,079	0.10	0.08	4.18	2,109
Vendor	0.07	0.06	2.04	0.76	0.01	0.03	0.51	0.54	0.03	0.14	0.17	_	1,838	1,838	< 0.005	0.27	2.27	1,921
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.17	0.15	0.20	2.27	0.00	0.00	0.37	0.37	0.00	0.09	0.09	_	344	344	0.02	0.01	0.69	349
Vendor	0.01	0.01	0.37	0.14	< 0.005	< 0.005	0.09	0.10	< 0.005	0.03	0.03	_	304	304	< 0.005	0.04	0.38	318
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

## 3.5. Building Construction (2025) - Unmitigated

Location	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	_	_	_	_	_	_	_	_	_	_	<u> </u>	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Off-Road Equipmen		1.13	10.4	13.0	0.02	0.43	_	0.43	0.40	_	0.40	_	2,398	2,398	0.10	0.02	_	2,406
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	-	_	_	_
Off-Road Equipmen		1.13	10.4	13.0	0.02	0.43	_	0.43	0.40	_	0.40	-	2,398	2,398	0.10	0.02	_	2,406
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	-	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.80	7.46	9.31	0.02	0.31	<u> </u>	0.31	0.28	_	0.28	-	1,713	1,713	0.07	0.01	_	1,719
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.15	1.36	1.70	< 0.005	0.06	_	0.06	0.05	_	0.05	-	284	284	0.01	< 0.005	_	285
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	-	_	_	_	_	_	_	_	_	_	_	_
Worker	3.22	2.96	2.93	51.1	0.00	0.00	6.74	6.74	0.00	1.58	1.58	_	7,453	7,453	0.31	0.26	30.0	7,567
Vendor	0.23	0.21	6.15	2.36	0.05	0.09	1.72	1.81	0.09	0.48	0.57	_	6,032	6,032	0.01	0.85	17.5	6,303
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	-	-	-	_	_	_	_	_	-	_	_		_	_	-	_	-
Worker	2.94	2.68	3.18	34.6	0.00	0.00	6.74	6.74	0.00	1.58	1.58	_	6,623	6,623	0.34	0.26	0.78	6,709

0.21	0.19	6.51	2.43	0.05	0.09	1.72	1.81	0.09	0.48	0.57	_	6,039	6,039	0.01	0.85	0.46	6,294
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00
_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
2.13	1.94	2.43	27.7	0.00	0.00	4.77	4.77	0.00	1.12	1.12	_	4,867	4,867	0.24	0.18	9.27	4,937
0.16	0.14	4.63	1.72	0.04	0.06	1.22	1.28	0.06	0.34	0.40	_	4,311	4,311	0.01	0.61	5.40	4,498
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
0.39	0.35	0.44	5.06	0.00	0.00	0.87	0.87	0.00	0.20	0.20	_	806	806	0.04	0.03	1.54	817
0.03	0.03	0.85	0.31	0.01	0.01	0.22	0.23	0.01	0.06	0.07	_	714	714	< 0.005	0.10	0.89	745
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
	0.00   2.13  0.16  0.00   0.39  0.03	0.00	0.00       0.00       0.00         —       —         2.13       1.94       2.43         0.16       0.14       4.63         0.00       0.00       0.00         —       —       —         0.39       0.35       0.44         0.03       0.03       0.85	0.00       0.00       0.00       0.00         —       —       —       —         2.13       1.94       2.43       27.7         0.16       0.14       4.63       1.72         0.00       0.00       0.00       0.00         —       —       —         0.39       0.35       0.44       5.06         0.03       0.03       0.85       0.31	0.00       0.00       0.00       0.00       0.00         —       —       —       —       —         2.13       1.94       2.43       27.7       0.00         0.16       0.14       4.63       1.72       0.04         0.00       0.00       0.00       0.00       0.00         —       —       —       —         0.39       0.35       0.44       5.06       0.00         0.03       0.03       0.85       0.31       0.01	0.00       0.00       0.00       0.00       0.00       0.00         —       —       —       —       —       —         2.13       1.94       2.43       27.7       0.00       0.00         0.16       0.14       4.63       1.72       0.04       0.06         0.00       0.00       0.00       0.00       0.00       0.00         —       —       —       —       —         0.39       0.35       0.44       5.06       0.00       0.01         0.03       0.03       0.85       0.31       0.01       0.01	0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       4.77       0.16       0.14       4.63       1.72       0.04       0.06       1.22       0.00	0.00       0.00	0.00       0.00	0.00       1.12       0.00       1.12       0.04       0.06       1.22       1.28       0.06       0.34       0.00	0.00       1.12       1.12       1.12         0.16       0.14       4.63       1.72       0.04       0.06       1.22       1.28       0.06       0.34       0.40         0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.00       0.20       0.20       0.20       0.20       0.03       0.03       0.85       0.31       0.01       0.01       0.02       0.23       0.01       0.06       0.07	0.00       1.12       1.12       —         2.13       1.94       2.43       27.7       0.00       0.00       4.77       4.77       0.00       1.12       1.12       —         0.16       0.14       4.63       1.72       0.04       0.06       1.22       1.28       0.06       0.34       0.40       —         0.00       0.20       0.20       —       —         0.03       0.03       0.85       0.31       0.01       0.01       0.22       0.23       0.01       0.06       0.07       —	0.00       1.12       1.12       —       4,867         0.16       0.14       4.63       1.72       0.04       0.06       1.22       1.28       0.06       0.34       0.40       —       4,311         0.00       0	0.00       0.00	0.00         0.00 <td< td=""><td>0.00         <td< td=""><td>0.00         <th< td=""></th<></td></td<></td></td<>	0.00         0.00 <td< td=""><td>0.00         <th< td=""></th<></td></td<>	0.00         0.00 <th< td=""></th<>

## 3.6. Building Construction (2025) - Mitigated

	TOG	ROG	NOx	СО		PM10E	PM10D	PM10T			PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		1.13	10.4	13.0	0.02	0.43	_	0.43	0.40	_	0.40	_	2,398	2,398	0.10	0.02	_	2,406
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		1.13	10.4	13.0	0.02	0.43	_	0.43	0.40	_	0.40	_	2,398	2,398	0.10	0.02	_	2,406
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

Average Daily	_	_	_	_	_	-	_	_	_	_	_	_	-	_	_	_	_	_
Off-Road Equipmen		0.80	7.46	9.31	0.02	0.31	_	0.31	0.28	_	0.28	_	1,713	1,713	0.07	0.01	_	1,719
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_		_	_	_	_
Off-Road Equipmen		0.15	1.36	1.70	< 0.005	0.06	_	0.06	0.05	-	0.05	_	284	284	0.01	< 0.005	-	285
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_		_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	3.22	2.96	2.93	51.1	0.00	0.00	6.74	6.74	0.00	1.58	1.58	_	7,453	7,453	0.31	0.26	30.0	7,567
Vendor	0.23	0.21	6.15	2.36	0.05	0.09	1.72	1.81	0.09	0.48	0.57	_	6,032	6,032	0.01	0.85	17.5	6,303
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	-	_	_	_
Worker	2.94	2.68	3.18	34.6	0.00	0.00	6.74	6.74	0.00	1.58	1.58	_	6,623	6,623	0.34	0.26	0.78	6,709
Vendor	0.21	0.19	6.51	2.43	0.05	0.09	1.72	1.81	0.09	0.48	0.57	_	6,039	6,039	0.01	0.85	0.46	6,294
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	2.13	1.94	2.43	27.7	0.00	0.00	4.77	4.77	0.00	1.12	1.12	_	4,867	4,867	0.24	0.18	9.27	4,937
Vendor	0.16	0.14	4.63	1.72	0.04	0.06	1.22	1.28	0.06	0.34	0.40	_	4,311	4,311	0.01	0.61	5.40	4,498
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.39	0.35	0.44	5.06	0.00	0.00	0.87	0.87	0.00	0.20	0.20	_	806	806	0.04	0.03	1.54	817

Vendor	0.03	0.03	0.85	0.31	0.01	0.01	0.22	0.23	0.01	0.06	0.07	_	714	714	< 0.005	0.10	0.89	745
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

## 3.7. Building Construction (2026) - Unmitigated

Location	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	_	_	_	<u> </u>	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		1.07	9.85	13.0	0.02	0.38	_	0.38	0.35	_	0.35	_	2,397	2,397	0.10	0.02	_	2,405
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.12	1.14	1.50	< 0.005	0.04	_	0.04	0.04	_	0.04	_	277	277	0.01	< 0.005	_	278
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.02	0.21	0.27	< 0.005	0.01	_	0.01	0.01	_	0.01	_	45.8	45.8	< 0.005	< 0.005	_	46.0
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_		_	_	_	_	_	_	_	_

Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	2.83	2.35	2.94	32.4	0.00	0.00	6.74	6.74	0.00	1.58	1.58	_	6,495	6,495	0.32	0.26	0.72	6,580
Vendor	0.21	0.14	6.23	2.32	0.05	0.09	1.72	1.81	0.05	0.48	0.52	-	5,927	5,927	0.01	0.85	0.40	6,182
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.33	0.30	0.37	4.20	0.00	0.00	0.77	0.77	0.00	0.18	0.18	-	771	771	0.04	0.03	1.39	783
Vendor	0.03	0.02	0.72	0.26	0.01	0.01	0.20	0.21	0.01	0.05	0.06	-	684	684	< 0.005	0.10	0.76	714
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.06	0.05	0.07	0.77	0.00	0.00	0.14	0.14	0.00	0.03	0.03	_	128	128	0.01	< 0.005	0.23	130
Vendor	< 0.005	< 0.005	0.13	0.05	< 0.005	< 0.005	0.04	0.04	< 0.005	0.01	0.01	_	113	113	< 0.005	0.02	0.13	118
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

#### 3.8. Building Construction (2026) - Mitigated

Location	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		1.07	9.85	13.0	0.02	0.38	_	0.38	0.35	_	0.35	_	2,397	2,397	0.10	0.02	_	2,405
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

Average	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	
Daily																		
Off-Road Equipmen		0.12	1.14	1.50	< 0.005	0.04	_	0.04	0.04	_	0.04	_	277	277	0.01	< 0.005	_	278
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.02	0.21	0.27	< 0.005	0.01	_	0.01	0.01	_	0.01	-	45.8	45.8	< 0.005	< 0.005	_	46.0
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Winter (Max)	_	_	-	_	_	_	-	_	_	-	_	-	_	_	_	_	_	_
Worker	2.83	2.35	2.94	32.4	0.00	0.00	6.74	6.74	0.00	1.58	1.58	_	6,495	6,495	0.32	0.26	0.72	6,580
Vendor	0.21	0.14	6.23	2.32	0.05	0.09	1.72	1.81	0.05	0.48	0.52	_	5,927	5,927	0.01	0.85	0.40	6,182
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	-	_	_	_	_	_	_
Worker	0.33	0.30	0.37	4.20	0.00	0.00	0.77	0.77	0.00	0.18	0.18	_	771	771	0.04	0.03	1.39	783
Vendor	0.03	0.02	0.72	0.26	0.01	0.01	0.20	0.21	0.01	0.05	0.06	_	684	684	< 0.005	0.10	0.76	714
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.06	0.05	0.07	0.77	0.00	0.00	0.14	0.14	0.00	0.03	0.03	_	128	128	0.01	< 0.005	0.23	130
Vendor	< 0.005	< 0.005	0.13	0.05	< 0.005	< 0.005	0.04	0.04	< 0.005	0.01	0.01	_	113	113	< 0.005	0.02	0.13	118
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

## 3.9. Paving (2025) - Unmitigated

Location	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	_	<u> </u>	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.80	7.45	9.98	0.01	0.35	_	0.35	0.32	_	0.32	_	1,511	1,511	0.06	0.01	_	1,517
Paving	_	0.46	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.80	7.45	9.98	0.01	0.35	_	0.35	0.32	_	0.32	_	1,511	1,511	0.06	0.01	_	1,517
Paving	_	0.46	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.14	1.33	1.78	< 0.005	0.06	_	0.06	0.06	_	0.06	_	269	269	0.01	< 0.005	_	270
Paving	_	0.08	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.03	0.24	0.32	< 0.005	0.01	_	0.01	0.01	_	0.01	_	44.6	44.6	< 0.005	< 0.005	_	44.7
Paving	_	0.01	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	-	_	_	_	_	_	_	_	_	_	-	_	-	_	_	_	_
Worker	0.09	0.09	0.09	1.49	0.00	0.00	0.20	0.20	0.00	0.05	0.05	_	217	217	0.01	0.01	0.87	220
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	-	_	_	_	_	_	_
Worker	0.09	0.08	0.09	1.01	0.00	0.00	0.20	0.20	0.00	0.05	0.05	_	193	193	0.01	0.01	0.02	195
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.02	0.01	0.02	0.20	0.00	0.00	0.03	0.03	0.00	0.01	0.01	_	35.3	35.3	< 0.005	< 0.005	0.07	35.8
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	-	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	< 0.005	< 0.005	< 0.005	0.04	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	_	5.85	5.85	< 0.005	< 0.005	0.01	5.93
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

## 3.10. Paving (2025) - Mitigated

Location	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_			_	_	_	_	_
Off-Road Equipmen		0.80	7.45	9.98	0.01	0.35	-	0.35	0.32	_	0.32	_	1,511	1,511	0.06	0.01	_	1,517
Paving	_	0.46	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	-	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.80	7.45	9.98	0.01	0.35	_	0.35	0.32	_	0.32	_	1,511	1,511	0.06	0.01	_	1,517
Paving	_	0.46	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	-	_	_	_	-	_	_	_	-	_	_	_	_	_	_
Off-Road Equipmen		0.14	1.33	1.78	< 0.005	0.06	_	0.06	0.06	_	0.06	-	269	269	0.01	< 0.005	_	270
Paving	_	0.08	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.03	0.24	0.32	< 0.005	0.01	_	0.01	0.01	_	0.01	-	44.6	44.6	< 0.005	< 0.005	_	44.7
Paving	_	0.01	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	-	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

												_						
Worker	0.09	0.09	0.09	1.49	0.00	0.00	0.20	0.20	0.00	0.05	0.05	_	217	217	0.01	0.01	0.87	220
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	
Worker	0.09	0.08	0.09	1.01	0.00	0.00	0.20	0.20	0.00	0.05	0.05	_	193	193	0.01	0.01	0.02	195
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	-	_	_	_	_	_	-	_	_	_	_	_
Worker	0.02	0.01	0.02	0.20	0.00	0.00	0.03	0.03	0.00	0.01	0.01	_	35.3	35.3	< 0.005	< 0.005	0.07	35.8
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	< 0.005	< 0.005	< 0.005	0.04	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	_	5.85	5.85	< 0.005	< 0.005	0.01	5.93
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

## 3.11. Architectural Coating (2025) - Unmitigated

				,														
Location	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipmen		0.13	0.88	1.14	< 0.005	0.03	_	0.03	0.03	_	0.03	_	134	134	0.01	< 0.005	_	134

Architect ural Coatings	_	112	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	-	_	_	_	_	_	_
Off-Road Equipment		0.13	0.88	1.14	< 0.005	0.03	_	0.03	0.03	_	0.03	_	134	134	0.01	< 0.005	_	134
Architect ural Coatings	_	112	_	_	_	_	_	_	_	_	_	-	_	_	_	_	-	-
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipment		0.02	0.16	0.20	< 0.005	< 0.005	_	< 0.005	< 0.005	_	< 0.005	_	23.8	23.8	< 0.005	< 0.005	_	23.9
Architect ural Coatings	_	19.9	_	_	-	_	-	_	_	_	_	_	_		_	_	_	-
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	Ī—
Off-Road Equipment		< 0.005	0.03	0.04	< 0.005	< 0.005	-	< 0.005	< 0.005	_	< 0.005	_	3.94	3.94	< 0.005	< 0.005	_	3.95
Architect ural Coatings	_	3.62	_	_		_	-	_	_	_	_	-	_	-	_	-	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.64	0.59	0.59	10.2	0.00	0.00	1.35	1.35	0.00	0.32	0.32	_	1,491	1,491	0.06	0.05	6.01	1,513
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.59	0.54	0.64	6.92	0.00	0.00	1.35	1.35	0.00	0.32	0.32	_	1,325	1,325	0.07	0.05	0.16	1,342
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.11	0.10	0.12	1.38	0.00	0.00	0.24	0.24	0.00	0.06	0.06	_	243	243	0.01	0.01	0.46	246
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.02	0.02	0.02	0.25	0.00	0.00	0.04	0.04	0.00	0.01	0.01	_	40.2	40.2	< 0.005	< 0.005	0.08	40.8
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

## 3.12. Architectural Coating (2025) - Mitigated

Location	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Off-Road Equipment		0.13	0.88	1.14	< 0.005	0.03	_	0.03	0.03	_	0.03	_	134	134	0.01	< 0.005	_	134
Architect ural Coatings	_	112	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	-	_	_	_	_	_
Off-Road Equipment		0.13	0.88	1.14	< 0.005	0.03	_	0.03	0.03	_	0.03	_	134	134	0.01	< 0.005	_	134
Architect ural Coatings	_	112	_	_	_	_	_	_	_	-	_	_	_	_	_	_	_	-
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipment		0.02	0.16	0.20	< 0.005	< 0.005	_	< 0.005	< 0.005	_	< 0.005	_	23.8	23.8	< 0.005	< 0.005	_	23.9
Architect ural Coatings	_	19.9	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Off-Road Equipment		< 0.005	0.03	0.04	< 0.005	< 0.005	-	< 0.005	< 0.005	-	< 0.005	_	3.94	3.94	< 0.005	< 0.005	-	3.95
Architect ural Coatings	_	3.62	_	_	_	_	_	_	_	_	_	_	_	_		_	_	-
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.64	0.59	0.59	10.2	0.00	0.00	1.35	1.35	0.00	0.32	0.32	_	1,491	1,491	0.06	0.05	6.01	1,513
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.59	0.54	0.64	6.92	0.00	0.00	1.35	1.35	0.00	0.32	0.32	_	1,325	1,325	0.07	0.05	0.16	1,342
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Worker	0.11	0.10	0.12	1.38	0.00	0.00	0.24	0.24	0.00	0.06	0.06	_	243	243	0.01	0.01	0.46	246
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	-	-	_	_	_	_	_	_
Worker	0.02	0.02	0.02	0.25	0.00	0.00	0.04	0.04	0.00	0.01	0.01	_	40.2	40.2	< 0.005	< 0.005	0.08	40.8
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00

# 4. Operations Emissions Details

## 4.1. Mobile Emissions by Land Use

#### 4.1.1. Unmitigated

				,	, ,		,			<b>,</b>									
Land	-	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	всо2	NBCO2	CO2T	CH4	N2O	R	CO2e
Use																			

Daily, Summer (Max)	_												_					_
Refrigera ted Warehou se-No Rail	20.0	17.8	23.4	251	0.54	0.38	47.7	48.0	0.35	12.1	12.5	_	54,939	54,939	1.83	2.14	217	55,838
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Total	20.0	17.8	23.4	251	0.54	0.38	47.7	48.0	0.35	12.1	12.5	_	54,939	54,939	1.83	2.14	217	55,838
Daily, Winter (Max)	_	-	-	_	_	_	_	-	_	_	_	_	-	_	_	-	_	_
Refrigera ted Warehou se-No Rail	18.3	16.1	25.6	187	0.49	0.38	47.7	48.0	0.35	12.1	12.5	_	50,102	50,102	1.86	2.24	5.63	50,821
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Total	18.3	16.1	25.6	187	0.49	0.38	47.7	48.0	0.35	12.1	12.5	_	50,102	50,102	1.86	2.24	5.63	50,821
Annual	_	_	_	_	_	_	_	-	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	3.37	2.97	4.79	37.2	0.09	0.07	8.62	8.69	0.06	2.19	2.25	_	8,479	8,479	0.31	0.38	15.5	8,615
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00
Total	3.37	2.97	4.79	37.2	0.09	0.07	8.62	8.69	0.06	2.19	2.25	_	8,479	8,479	0.31	0.38	15.5	8,615

## 4.1.2. Mitigated

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	-	-	_	-	_	_	_	_	_	_	_	_	_	-	-	-	_
Refrigera ted Warehou se-No Rail	20.0	17.8	23.4	251	0.54	0.38	47.7	48.0	0.35	12.1	12.5	_	54,939	54,939	1.83	2.14	217	55,838
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Total	20.0	17.8	23.4	251	0.54	0.38	47.7	48.0	0.35	12.1	12.5	_	54,939	54,939	1.83	2.14	217	55,838
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	-	-	_	_
Refrigera ted Warehou se-No Rail	18.3	16.1	25.6	187	0.49	0.38	47.7	48.0	0.35	12.1	12.5	_	50,102	50,102	1.86	2.24	5.63	50,821
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Total	18.3	16.1	25.6	187	0.49	0.38	47.7	48.0	0.35	12.1	12.5	_	50,102	50,102	1.86	2.24	5.63	50,821
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	3.37	2.97	4.79	37.2	0.09	0.07	8.62	8.69	0.06	2.19	2.25	_	8,479	8,479	0.31	0.38	15.5	8,615
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	0.00	0.00	0.00	0.00
Total	3.37	2.97	4.79	37.2	0.09	0.07	8.62	8.69	0.06	2.19	2.25	_	8,479	8,479	0.31	0.38	15.5	8,615

## 4.2. Energy

### 4.2.1. Electricity Emissions By Land Use - Unmitigated

Land Use	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	-	-	_	-	-	_	_	_	-	-	_	_	_	-	_	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_	_	_	_	_	47,094	47,094	4.49	0.54	_	47,368
Parking Lot	_	_	_	_	_	_	_	_	_	_	_	_	411	411	0.04	< 0.005	_	414
Total	_	_	_	_	_	_	_	_	_	_	_	_	47,505	47,505	4.53	0.55	_	47,782
Daily, Winter (Max)	_	_		_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_	_	_	_	_	47,094	47,094	4.49	0.54	_	47,368
Parking Lot	_	_	_	_	_	_	_	_	_	_	_	_	411	411	0.04	< 0.005	_	414
Total	_	_	_	_	_	_	_	_	_	_	_	_	47,505	47,505	4.53	0.55	_	47,782
Annual	_	_	_	_	_	_	_	_	_	_	_	_	<u> </u>	_	_	_	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_	_	_	_	_	7,797	7,797	0.74	0.09	_	7,842

Parking Lot	_	_	_	_	_	_	_	_	_	_	_	_	68.1	68.1	0.01	< 0.005	_	68.5
Total	_	_	_	_	_	_	_	_	_	_	_	_	7,865	7,865	0.75	0.09	_	7,911

## 4.2.2. Electricity Emissions By Land Use - Mitigated

Land Use	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	-	_
Refrigera ted Warehou se-No Rail	_	-	_	_	_	_	_	_	_	_	_	_	47,094	47,094	4.49	0.54	_	47,368
Parking Lot	_	_	_	-	_	_	_	_	_	_	_	_	411	411	0.04	< 0.005	_	414
Total	_	_	_	_	_	_	_	_	_	_	_	_	47,505	47,505	4.53	0.55	_	47,782
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_	_	_	_	_	47,094	47,094	4.49	0.54	_	47,368
Parking Lot	_	_	_	_	_	_	_	_	_	_	_	_	411	411	0.04	< 0.005	_	414
Total	_	_	_	_	_	_	_	_	_	_	_	_	47,505	47,505	4.53	0.55	_	47,782
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Refrigera ted Warehou se-No		_	_	_	_	_	_	_	_	_	_	_	7,797	7,797	0.74	0.09	_	7,842
Parking Lot	_	_	_	_	_	_		_	_	_	_	_	68.1	68.1	0.01	< 0.005	_	68.5
Total	_	_	_	_	_	_	_	_	_	_	_	_	7,865	7,865	0.75	0.09	_	7,911

## 4.2.3. Natural Gas Emissions By Land Use - Unmitigated

Land Use	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Total	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Total	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00

Annual	_	_	_	-	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00		0.00	_	0.00	0.00	0.00	0.00		0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Total	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00

## 4.2.4. Natural Gas Emissions By Land Use - Mitigated

		,	<i>j</i>	j,				,		, ,								
Land Use	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Total	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00

Total	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00
Total	0.00	0.00	0.00	0.00	0.00	0.00	_	0.00	0.00	_	0.00	_	0.00	0.00	0.00	0.00	_	0.00

## 4.3. Area Emissions by Source

## 4.3.1. Unmitigated

Source	TOG	ROG	NOx			PM10E			PM2.5E			BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Consum er Products	_	26.3	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Architect ural Coatings	_	1.99	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Landsca pe Equipme nt	9.49	8.76	0.45	53.4	< 0.005	0.09	_	0.09	0.07	_	0.07	_	219	219	0.01	< 0.005	_	220
Total	9.49	37.0	0.45	53.4	< 0.005	0.09	_	0.09	0.07	_	0.07	_	219	219	0.01	< 0.005	_	220
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Consum Products		26.3	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Architect ural Coatings	_	1.99	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	28.3	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Consum er Products	_	4.80	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Architect ural Coatings	_	0.36	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Landsca pe Equipme nt	0.85	0.79	0.04	4.80	< 0.005	0.01	_	0.01	0.01	_	0.01	_	17.9	17.9	< 0.005	< 0.005	_	18.0
Total	0.85	5.95	0.04	4.80	< 0.005	0.01	_	0.01	0.01	_	0.01	_	17.9	17.9	< 0.005	< 0.005	_	18.0

## 4.3.2. Mitigated

Source	TOG	ROG		со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Consum er Products	_	26.3	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Architect ural Coatings		1.99	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Landsca pe Equipme nt	9.49	8.76	0.45	53.4	< 0.005	0.09	_	0.09	0.07	_	0.07	_	219	219	0.01	< 0.005	_	220
Total	9.49	37.0	0.45	53.4	< 0.005	0.09	_	0.09	0.07	_	0.07	-	219	219	0.01	< 0.005	_	220
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Consum er Products		26.3	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Architect ural Coatings	_	1.99	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	-
Total	_	28.3	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Consum er Products		4.80	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Architect ural Coatings		0.36	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Landsca pe Equipme nt	0.85	0.79	0.04	4.80	< 0.005	0.01	_	0.01	0.01	_	0.01	_	17.9	17.9	< 0.005	< 0.005	_	18.0
Total	0.85	5.95	0.04	4.80	< 0.005	0.01	_	0.01	0.01	_	0.01	_	17.9	17.9	< 0.005	< 0.005	_	18.0

## 4.4. Water Emissions by Land Use

### 4.4.1. Unmitigated

						. ,												
Land	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Use																		

Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail		_	_	_		_	_	_	_	_	_	544	1,603	2,147	55.9	1.34	_	3,945
Parking Lot		_	_	_	_	_	_	_	_	_	_	0.00	0.00	0.00	0.00	0.00	_	0.00
Total	_	_	_	_	_	_	_	_	_	_	_	544	1,603	2,147	55.9	1.34	_	3,945
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_	_	_	_	544	1,603	2,147	55.9	1.34	_	3,945
Parking Lot	_	_	_	-	_	-	_	_	_	_	_	0.00	0.00	0.00	0.00	0.00	_	0.00
Total	_	_	_	_	_	_	_	_	_	_	_	544	1,603	2,147	55.9	1.34	_	3,945
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_	_	_	_	90.0	265	355	9.26	0.22	_	653
Parking Lot	_	_	_	_	_	_	_	_	_	_	_	0.00	0.00	0.00	0.00	0.00	_	0.00
Total	_	_	_	_	_	_	_	_	_	_	_	90.0	265	355	9.26	0.22	_	653

### 4.4.2. Mitigated

Land Use	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	-	-	-	_	-	_	-	_	-	-	_	_	-	_	-	-	-
Refrigera ted Warehou se-No Rail	_	_	_	_	-	_	_	_	_	_	_	544	1,603	2,147	55.9	1.34	_	3,945
Parking Lot	_	_	_	_	_	_	_	_	_	_	_	0.00	0.00	0.00	0.00	0.00	_	0.00
Total	_	_	_	_	_	_	_	_	_	_	_	544	1,603	2,147	55.9	1.34	_	3,945
Daily, Winter (Max)	_	_	_	-		_	_	_	_	_	_	_	_	_	-	_	-	_
Refrigera ted Warehou se-No Rail	_	_	_	_	-	_	_	-	_	-	_	544	1,603	2,147	55.9	1.34	_	3,945
Parking Lot	_	_	_	_	_	_	_	_	_	_	_	0.00	0.00	0.00	0.00	0.00	_	0.00
Total	_	_	_	_	_	_	_	_	_	_	_	544	1,603	2,147	55.9	1.34	_	3,945
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_	_	_	_	90.0	265	355	9.26	0.22	_	653
Parking Lot	_	-	-	-	-	-	-	_	-	_	-	0.00	0.00	0.00	0.00	0.00	-	0.00
Total	_	_	_	_	_	_	_	_	_	_	_	90.0	265	355	9.26	0.22	_	653

## 4.5. Waste Emissions by Land Use

### 4.5.1. Unmitigated

Cillena						ial) and												
Land Use	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail		_	_	_	_	_		_	_		_	622	0.00	622	62.1	0.00	_	2,175
Parking Lot	_	_	_	_	_	_	_	_	_	_	_	0.00	0.00	0.00	0.00	0.00	_	0.00
Total	_	_	_	_	_	_	_	_	_	_	_	622	0.00	622	62.1	0.00	_	2,175
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail		_	_	_	_	_	_	_	_	_		622	0.00	622	62.1	0.00	_	2,175
Parking Lot	_	_	_	_	_	_	_	_	_	_	_	0.00	0.00	0.00	0.00	0.00	_	0.00
Total	_	_	_	_	_	_	_	_	_	_	_	622	0.00	622	62.1	0.00	_	2,175
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_	_	_	_	103	0.00	103	10.3	0.00	_	360

Parking Lot	_	_	_	_	_	_	_	_	_	_	_	0.00	0.00	0.00	0.00	0.00	_	0.00
Total	_	_	_	_	_	_	_	_	_	_	_	103	0.00	103	10.3	0.00	_	360

## 4.5.2. Mitigated

Land Use	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	-	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_		_	_	_	_	_	155	0.00	155	15.5	0.00	_	544
Parking Lot	_	_	_	_	_	_	_	_	_	_	_	0.00	0.00	0.00	0.00	0.00	_	0.00
Total	_	_	_	_	_	_	_	_	_	_	_	155	0.00	155	15.5	0.00	_	544
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	_	_		_	_		_	_	_	_	_	155	0.00	155	15.5	0.00	_	544
Parking Lot	_	_	_	_	_	_	_	_	_	_	_	0.00	0.00	0.00	0.00	0.00	_	0.00
Total	_	_	_	_	_	_	_	_	_	_	_	155	0.00	155	15.5	0.00	_	544
Annual	_	_	_	_	_	_	_	<u> </u>	_	_	_	_	_	_	_	_	_	_

Refrigera ted Warehou se-No	_	_	_	_	_	_	_	_	_	_	_	25.7	0.00	25.7	2.57	0.00	_	90.0
Parking Lot		_		_	_	_		_	_	_	_	0.00	0.00	0.00	0.00	0.00		0.00
Total	_	_	_	_	_	_	_	_	_	_	_	25.7	0.00	25.7	2.57	0.00	_	90.0

## 4.6. Refrigerant Emissions by Land Use

## 4.6.1. Unmitigated

Land Use	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700
Daily, Winter (Max)	_	_	_	_	-	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Refrigera ted	_	_	_	_			_	_	_	_	_	_	_	_	_		5,414	5,414
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	5,414	5,414

## 4.6.2. Mitigated

		•				uai) and	_											
Land Use	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	-	_	_	_	_	_	_	_	_	_	_	_	_	-	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_			_	_	_	_	_	_	32,700	32,700
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700
Total	_	_	_	-	_	_	_	_	_	_	_	_	_	_	_	_	32,700	32,700
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Refrigera ted Warehou se-No Rail	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	5,414	5,414
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	5,414	5,414

## 4.7. Offroad Emissions By Equipment Type

#### 4.7.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipme nt Type	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

#### 4.7.2. Mitigated

			<u> </u>	· · · · · ·														
Equipme nt Type	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	СО2Т	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	<u> </u>	_	_	_	<u> </u>	_	_	_	_	_	_	<u> </u>
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Annual	_	_	<u> </u>	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

## 4.8. Stationary Emissions By Equipment Type

### 4.8.1. Unmitigated

			y ioi dai			Jai) aliu	<u> </u>	bruay 10										
Equipme nt Type	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Emergen cy Generato r	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Fire Pump	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Emergen cy Generato r		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Fire Pump	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Emergen cy Generato	0.06	0.05	0.24	0.13	< 0.005	0.01	0.00	0.01	0.01	0.00	0.01	0.00	24.5	24.5	< 0.005	< 0.005	0.00	24.6
Fire Pump	0.01	0.01	0.02	0.02	< 0.005	< 0.005	0.00	< 0.005	< 0.005	0.00	< 0.005	0.00	3.66	3.66	< 0.005	< 0.005	0.00	3.67
Total	0.07	0.06	0.26	0.15	< 0.005	0.01	0.00	0.01	0.01	0.00	0.01	0.00	28.2	28.2	< 0.005	< 0.005	0.00	28.3

## 4.8.2. Mitigated

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Equipme nt Type	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Emergen cy Generato r	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Fire Pump	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Emergen cy Generato r	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Fire Pump	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Emergen cy	0.06	0.05	0.24	0.13	< 0.005	0.01	0.00	0.01	0.01	0.00	0.01	0.00	24.5	24.5	< 0.005	< 0.005	0.00	24.6
Fire Pump	0.01	0.01	0.02	0.02	< 0.005	< 0.005	0.00	< 0.005	< 0.005	0.00	< 0.005	0.00	3.66	3.66	< 0.005	< 0.005	0.00	3.67
Total	0.07	0.06	0.26	0.15	< 0.005	0.01	0.00	0.01	0.01	0.00	0.01	0.00	28.2	28.2	< 0.005	< 0.005	0.00	28.3

## 4.9. User Defined Emissions By Equipment Type

## 4.9.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipme nt Type	TOG	ROG				PM10E			PM2.5E			BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

#### 4.9.2. Mitigated

Equipme	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
nt																		
Туре																		
Daily,	_	_	-	_	_	-	_	_	_	_	_	_	_	_	_	_	_	_
Summer																		
(Max)																		

Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_		_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

## 4.10. Soil Carbon Accumulation By Vegetation Type

#### 4.10.1. Soil Carbon Accumulation By Vegetation Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Ontona					1					1								
Vegetatio n	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

#### 4.10.2. Above and Belowground Carbon Accumulation by Land Use Type - Unmitigated

			,	, ,		,		,	, , , , , , , , , , , , , , , , , , ,	,	,							
Land	TOG	ROG	NOx	СО	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Use																		

Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_		_	_	_	_	_	_		_	_	_	_	_
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	<u> </u>	_	_	_		_	_	_	_	_
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

### 4.10.3. Avoided and Sequestered Emissions by Species - Unmitigated

		its (ib/ua																
Species	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Avoided	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Sequest ered	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Remove d	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Avoided	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Sequest	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Remove d	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Avoided	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Sequest ered	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_		_	_	_	_	_
Remove d	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

## 4.10.4. Soil Carbon Accumulation By Vegetation Type - Mitigated

Vegetatio n		ROG		со	SO2	PM10E			PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Total	_	_	 _	_	_	 	 	 	 	 _	 _
iotai											

## 4.10.5. Above and Belowground Carbon Accumulation by Land Use Type - Mitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total		_	<u> </u>	_	_	_	_	_	_	_	_	_	_	_	_		_	_
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Total	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

#### 4.10.6. Avoided and Sequestered Emissions by Species - Mitigated

Species	TOG	ROG		со	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	_	_	_	_	_	_		_	_	_	_	_	_	_	_	_	_	_
Avoided	_	_	_	_	_	_		_	_	_	_	_	_	_	_	_	_	_
Subtotal	_		_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Sequest ered	_	_	_	_	_	_		_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Remove d	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_

Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Daily, Winter (Max)	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Avoided	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Sequest ered	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Remove d	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Annual	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Avoided	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Sequest ered	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
Remove d	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	
Subtotal	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_	_
_	_	_	_	_	_	_	_	_		_	_	_	_	_	_	_	_	_

# 5. Activity Data

## 5.1. Construction Schedule

		0		S		
Phase Name	Phase Type	Start Date	End Date	Days Per Week	Work Days per Phase	Phase Description

Grading	Grading	6/1/2024	7/31/2024	5.00	43.0	_
<b>Building Construction</b>	Building Construction	8/1/2024	2/28/2026	5.00	412	_
Paving	Paving	3/1/2025	5/30/2025	5.00	65.0	_
Architectural Coating	Architectural Coating	3/1/2025	5/30/2025	5.00	65.0	_

# 5.2. Off-Road Equipment

## 5.2.1. Unmitigated

Phase Name	Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
Grading	Graders	Diesel	Average	1.00	8.00	148	0.41
Grading	Excavators	Diesel	Average	2.00	8.00	36.0	0.38
Grading	Tractors/Loaders/Backh oes	Diesel	Average	2.00	8.00	84.0	0.37
Grading	Scrapers	Diesel	Average	2.00	8.00	423	0.48
Grading	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
Building Construction	Forklifts	Diesel	Average	3.00	8.00	82.0	0.20
Building Construction	Generator Sets	Diesel	Average	1.00	8.00	14.0	0.74
Building Construction	Cranes	Diesel	Average	1.00	7.00	367	0.29
Building Construction	Welders	Diesel	Average	1.00	8.00	46.0	0.45
Building Construction	Tractors/Loaders/Backh oes	Diesel	Average	3.00	7.00	84.0	0.37
Paving	Pavers	Diesel	Average	2.00	8.00	81.0	0.42
Paving	Paving Equipment	Diesel	Average	2.00	8.00	89.0	0.36
Paving	Rollers	Diesel	Average	2.00	8.00	36.0	0.38
Architectural Coating	Air Compressors	Diesel	Average	1.00	6.00	37.0	0.48

## 5.2.2. Mitigated

Phase Name	Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
I Hase Name	Ledgibilietir Type	I del Type	Lingine riei	Number per Day	Tiouis i ei Day	lingsebowei	Luau i actui

Grading	Graders	Diesel	Average	1.00	8.00	148	0.41
Grading	Excavators	Diesel	Average	2.00	8.00	36.0	0.38
Grading	Tractors/Loaders/Backh oes	Diesel	Average	2.00	8.00	84.0	0.37
Grading	Scrapers	Diesel	Average	2.00	8.00	423	0.48
Grading	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
Building Construction	Forklifts	Diesel	Average	3.00	8.00	82.0	0.20
Building Construction	Generator Sets	Diesel	Average	1.00	8.00	14.0	0.74
<b>Building Construction</b>	Cranes	Diesel	Average	1.00	7.00	367	0.29
<b>Building Construction</b>	Welders	Diesel	Average	1.00	8.00	46.0	0.45
Building Construction	Tractors/Loaders/Backh oes	Diesel	Average	3.00	7.00	84.0	0.37
Paving	Pavers	Diesel	Average	2.00	8.00	81.0	0.42
Paving	Paving Equipment	Diesel	Average	2.00	8.00	89.0	0.36
Paving	Rollers	Diesel	Average	2.00	8.00	36.0	0.38
Architectural Coating	Air Compressors	Diesel	Average	1.00	6.00	37.0	0.48

## 5.3. Construction Vehicles

## 5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Grading	_	_	_	_
Grading	Worker	20.0	18.5	LDA,LDT1,LDT2
Grading	Vendor	_	10.2	HHDT,MHDT
Grading	Hauling	2.91	20.0	HHDT
Grading	Onsite truck	_	_	HHDT
Building Construction	_	_	_	_
Building Construction	Worker	515	18.5	LDA,LDT1,LDT2

Building Construction	Vendor	201	10.2	HHDT,MHDT
Building Construction	Hauling	0.00	20.0	HHDT
Building Construction	Onsite truck	_	_	HHDT
Paving	_	_	_	_
Paving	Worker	15.0	18.5	LDA,LDT1,LDT2
Paving	Vendor	_	10.2	HHDT,MHDT
Paving	Hauling	0.00	20.0	HHDT
Paving	Onsite truck	_	_	HHDT
Architectural Coating	_	_	_	_
Architectural Coating	Worker	103	18.5	LDA,LDT1,LDT2
Architectural Coating	Vendor	_	10.2	HHDT,MHDT
Architectural Coating	Hauling	0.00	20.0	HHDT
Architectural Coating	Onsite truck	_	_	HHDT

## 5.3.2. Mitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Grading	_	_	_	_
Grading	Worker	20.0	18.5	LDA,LDT1,LDT2
Grading	Vendor	_	10.2	HHDT,MHDT
Grading	Hauling	2.91	20.0	HHDT
Grading	Onsite truck	_	_	HHDT
Building Construction	_	_	_	_
Building Construction	Worker	515	18.5	LDA,LDT1,LDT2
Building Construction	Vendor	201	10.2	HHDT,MHDT
Building Construction	Hauling	0.00	20.0	HHDT
Building Construction	Onsite truck	_	_	HHDT
Paving	_	_	_	_

Paving	Worker	15.0	18.5	LDA,LDT1,LDT2
Paving	Vendor	_	10.2	HHDT,MHDT
Paving	Hauling	0.00	20.0	HHDT
Paving	Onsite truck	_	_	HHDT
Architectural Coating	_	_	_	_
Architectural Coating	Worker	103	18.5	LDA,LDT1,LDT2
Architectural Coating	Vendor	_	10.2	HHDT,MHDT
Architectural Coating	Hauling	0.00	20.0	HHDT
Architectural Coating	Onsite truck	_	_	HHDT

#### 5.4. Vehicles

#### 5.4.1. Construction Vehicle Control Strategies

Non-applicable. No control strategies activated by user.

## 5.5. Architectural Coatings

Phase Name	Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
Architectural Coating	0.00	0.00	1,840,500	613,500	29,707

## 5.6. Dust Mitigation

#### 5.6.1. Construction Earthmoving Activities

Phase Name	Material Imported (Cubic Yards)	Material Exported (Cubic Yards)	Acres Graded (acres)	Material Demolished (sq. ft.)	Acres Paved (acres)
Grading	_	1,000	129	0.00	_
Paving	0.00	0.00	0.00	0.00	11.4

#### 5.6.2. Construction Earthmoving Control Strategies

Non-applicable. No control strategies activated by user.

## 5.7. Construction Paving

Land Use	Area Paved (acres)	% Asphalt
Refrigerated Warehouse-No Rail	0.00	0%
Parking Lot	6.29	100%
Parking Lot	5.08	100%

## 5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2024	0.00	349	0.03	< 0.005
2025	0.00	349	0.03	< 0.005
2026	0.00	346	0.03	< 0.005

## 5.9. Operational Mobile Sources

#### 5.9.1. Unmitigated

Land Use Type	Trips/Weekday	Trips/Saturday	Trips/Sunday	Trips/Year	VMT/Weekday	VMT/Saturday	VMT/Sunday	VMT/Year
Refrigerated Warehouse-No Rail	2,603	2,603	2,603	950,080	67,278	67,278	67,278	24,556,305
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

#### 5.9.2. Mitigated

Land Use Type	Trips/Weekday	Trips/Saturday	Trips/Sunday	Trips/Year	VMT/Weekday	VMT/Saturday	VMT/Sunday	VMT/Year
Refrigerated Warehouse-No Rail	2,603	2,603	2,603	950,080	67,278	67,278	67,278	24,556,305

Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

## 5.10. Operational Area Sources

5.10.1. Hearths

5.10.1.1. Unmitigated

5.10.1.2. Mitigated

#### 5.10.2. Architectural Coatings

Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
0	0.00	1,840,500	613,500	29,707

#### 5.10.3. Landscape Equipment

Season	Unit	Value
Snow Days	day/yr	0.00
Summer Days	day/yr	180

## 5.10.4. Landscape Equipment - Mitigated

Season	Unit	Value
Snow Days	day/yr	0.00
Summer Days	day/yr	180

## 5.11. Operational Energy Consumption

### 5.11.1. Unmitigated

#### Electricity (kWh/yr) and CO2 and CH4 and N2O and Natural Gas (kBTU/yr)

Land Use	Electricity (kWh/yr)	CO2	CH4	N2O	Natural Gas (kBTU/yr)
Refrigerated Warehouse-No Rail	49,651,496	346	0.0330	0.0040	0.00
Parking Lot	240,024	346	0.0330	0.0040	0.00
Parking Lot	193,693	346	0.0330	0.0040	0.00

#### 5.11.2. Mitigated

#### Electricity (kWh/yr) and CO2 and CH4 and N2O and Natural Gas (kBTU/yr)

Land Use	Electricity (kWh/yr)	CO2	CH4	N2O	Natural Gas (kBTU/yr)
Refrigerated Warehouse-No Rail	49,651,496	346	0.0330	0.0040	0.00
Parking Lot	240,024	346	0.0330	0.0040	0.00
Parking Lot	193,693	346	0.0330	0.0040	0.00

## 5.12. Operational Water and Wastewater Consumption

#### 5.12.1. Unmitigated

Land Use	Indoor Water (gal/year)	Outdoor Water (gal/year)
Refrigerated Warehouse-No Rail	283,743,750	13,327,314
Parking Lot	0.00	0.00
Parking Lot	0.00	0.00

#### 5.12.2. Mitigated

Land Use	Indoor Water (gal/year)	Outdoor Water (gal/year)
Refrigerated Warehouse-No Rail	283,743,750	13,327,314
Parking Lot	0.00	0.00

Parking Lot		0.00	0.00
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## 5.13. Operational Waste Generation

### 5.13.1. Unmitigated

Land Use	Waste (ton/year)	Cogeneration (kWh/year)
Refrigerated Warehouse-No Rail	1,153	_
Parking Lot	0.00	_
Parking Lot	0.00	_

#### 5.13.2. Mitigated

Land Use	Waste (ton/year)	Cogeneration (kWh/year)
Refrigerated Warehouse-No Rail	288	_
Parking Lot	0.00	_
Parking Lot	0.00	_

## 5.14. Operational Refrigeration and Air Conditioning Equipment

### 5.14.1. Unmitigated

Land Use Type	Equipment Type	Refrigerant	GWP	Quantity (kg)	Operations Leak Rate	Service Leak Rate	Times Serviced
Refrigerated Warehouse-No Rail	Cold storage	R-404A	3,922	7.50	7.50	7.50	25.0

### 5.14.2. Mitigated

Land Use Type	Equipment Type	Refrigerant	GWP	Quantity (kg)	Operations Leak Rate	Service Leak Rate	Times Serviced
Refrigerated Warehouse-No Rail	Cold storage	R-404A	3,922	7.50	7.50	7.50	25.0

## 5.15. Operational Off-Road Equipment

#### 5.15.1. Unmitigated

Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
111 2 2 21	71.					

#### 5.15.2. Mitigated

 Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horoopowor	Load Factor
Equipment type	ruei Type	Engine Her	Number per Day	nouls Pel Day	Horsepower	Load Factor
	21					, and the second se

## 5.16. Stationary Sources

#### 5.16.1. Emergency Generators and Fire Pumps

Equipment Type	Fuel Type	Number per Day	Hours per Day	Hours per Year	Horsepower	Load Factor
Emergency Generator	Diesel	1.00	0.00	24.0	2,682	0.73
Fire Pump	Diesel	1.00	0.00	24.0	400	0.73

#### 5.16.2. Process Boilers

Eq	uipment Type	Fuel Type	Number	Boiler Rating (MMBtu/hr)	Daily Heat Input (MMBtu/day)	Annual Heat Input (MMBtu/yr)
	11 71 71	71		J ( ) , , , ,		1

#### 5.17. User Defined

Equipment Type Fuel Type

## 5.18. Vegetation

5.18.1. Land Use Change

5.18.1.1. Unmitigated

Vegetation Land Use Type Vegetation Soil Type **Final Acres Initial Acres** 5.18.1.2. Mitigated Vegetation Land Use Type Vegetation Soil Type **Initial Acres Final Acres** 5.18.1. Biomass Cover Type 5.18.1.1. Unmitigated Biomass Cover Type Initial Acres Final Acres 5.18.1.2. Mitigated Biomass Cover Type **Initial Acres** Final Acres 5.18.2. Sequestration

#### 5.18.2.1. Unmitigated

Tree Type   Number   Electricity Saved (kWh/year)   Natural Gas Saved (btu/year)
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#### 5.18.2.2. Mitigated

Tree Type	Number	Electricity Saved (kWh/year)	Natural Gas Saved (btu/year)

## 6. Climate Risk Detailed Report

#### 6.1. Climate Risk Summary

Cal-Adapt midcentury 2040–2059 average projections for four hazards are reported below for your project location. These are under Representation Concentration Pathway (RCP) 8.5 which assumes GHG emissions will continue to rise strongly through 2050 and then plateau around 2100.

Climate Hazard	Result for Project Location	Unit
Temperature and Extreme Heat	35.5	annual days of extreme heat
Extreme Precipitation	1.35	annual days with precipitation above 20 mm
Sea Level Rise	_	meters of inundation depth
Wildfire	0.00	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about 3/4 an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (Radke et al., 2017, CEC-500-2017-008), and consider inundation location and depth for the San Francisco Bay, the Sacramento-San Joaquin River Delta and California coast resulting different increments of sea level rise coupled with extreme storm events. Users may select from four scenarios to view the range in potential inundation depth for the grid cell. The four scenarios are: No rise, 0.5 meter, 1.41 meters

Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

#### 6.2. Initial Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	5	0	0	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	0	0	N/A
Wildfire	1	0	0	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	0	0	0	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

#### 6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	5	1	1	4
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	1	1	2
Wildfire	1	1	1	2
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	1	1	1	2

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

#### 6.4. Climate Risk Reduction Measures

## 7. Health and Equity Details

#### 7.1. CalEnviroScreen 4.0 Scores

The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Exposure Indicators	_
AQ-Ozone	88.7
AQ-PM	5.81
AQ-DPM	4.06
Drinking Water	85.4
Lead Risk Housing	21.0

Pesticides	38.2
Toxic Releases	69.3
Traffic	8.11
Effect Indicators	_
CleanUp Sites	78.1
Groundwater	2.11
Haz Waste Facilities/Generators	88.6
Impaired Water Bodies	0.00
Solid Waste	75.7
Sensitive Population	_
Asthma	74.6
Cardio-vascular	53.5
Low Birth Weights	13.2
Socioeconomic Factor Indicators	_
Education	42.3
Housing	38.1
Linguistic	32.0
Poverty	61.8
Unemployment	26.9

## 7.2. Healthy Places Index Scores

The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Economic	_
Above Poverty	67.56063134
Employed	13.29398178
Median HI	45.83600667

Education	_
	38.31643783
Bachelor's or higher	
High school enrollment	100
Preschool enrollment	48.45374054
Transportation	_
Auto Access	66.18760426
Active commuting	14.50019248
Social	_
2-parent households	65.622995
Voting	65.36635442
Neighborhood	_
Alcohol availability	88.70781471
Park access	23.43128449
Retail density	4.080585141
Supermarket access	30.32208392
Tree canopy	85.67945592
Housing	_
Homeownership	75.37533684
Housing habitability	76.05543436
Low-inc homeowner severe housing cost burden	38.73989478
Low-inc renter severe housing cost burden	63.54420634
Uncrowded housing	83.16437829
Health Outcomes	_
Insured adults	61.15744899
Arthritis	73.2
Asthma ER Admissions	41.1
High Blood Pressure	77.3

Cancer (excluding skin)	55.0
Asthma	43.1
Coronary Heart Disease	72.1
Chronic Obstructive Pulmonary Disease	62.6
Diagnosed Diabetes	68.9
Life Expectancy at Birth	4.1
Cognitively Disabled	94.6
Physically Disabled	49.3
Heart Attack ER Admissions	35.9
Mental Health Not Good	46.4
Chronic Kidney Disease	79.8
Obesity	42.9
Pedestrian Injuries	90.4
Physical Health Not Good	57.2
Stroke	70.4
Health Risk Behaviors	_
Binge Drinking	11.9
Current Smoker	43.1
No Leisure Time for Physical Activity	66.6
Climate Change Exposures	_
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	88.7
Elderly	25.8
English Speaking	89.3
Foreign-born	8.1
Outdoor Workers	46.5

Climate Change Adaptive Capacity	_
Impervious Surface Cover	93.4
Traffic Density	4.7
Traffic Access	23.0
Other Indices	_
Hardship	48.4
Other Decision Support	_
2016 Voting	51.0

#### 7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	46.0
Healthy Places Index Score for Project Location (b)	49.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	Yes
Project Located in a Community Air Protection Program Community (Assembly Bill 617)	No

a: The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

#### 7.4. Health & Equity Measures

No Health & Equity Measures selected.

#### 7.5. Evaluation Scorecard

Health & Equity Evaluation Scorecard not completed.

#### 7.6. Health & Equity Custom Measures

No Health & Equity Custom Measures created.

## 8. User Changes to Default Data

b: The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

Screen	Justification
Construction: Construction Phases	As per the information provided.
Operations: Vehicle Data	Based on the Fox Field Commerce Center – East Trip Generation Estimates
Operations: Water and Waste Water	All landscape area has been added under Refrigerated Warehouse-No Rail
Operations: Energy Use	Adjusted for temperature of -10 degree F. The project does not use natural gas.