

August 5, 2024

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**Subject: Air Quality, Greenhouse Gas, and Noise for a Scrap Metal and Recycling Facility in Adelanto, CA (CUP-23-07, LDP 23-09); APN: 3129-491-08**

Dear Ms. Landeta:

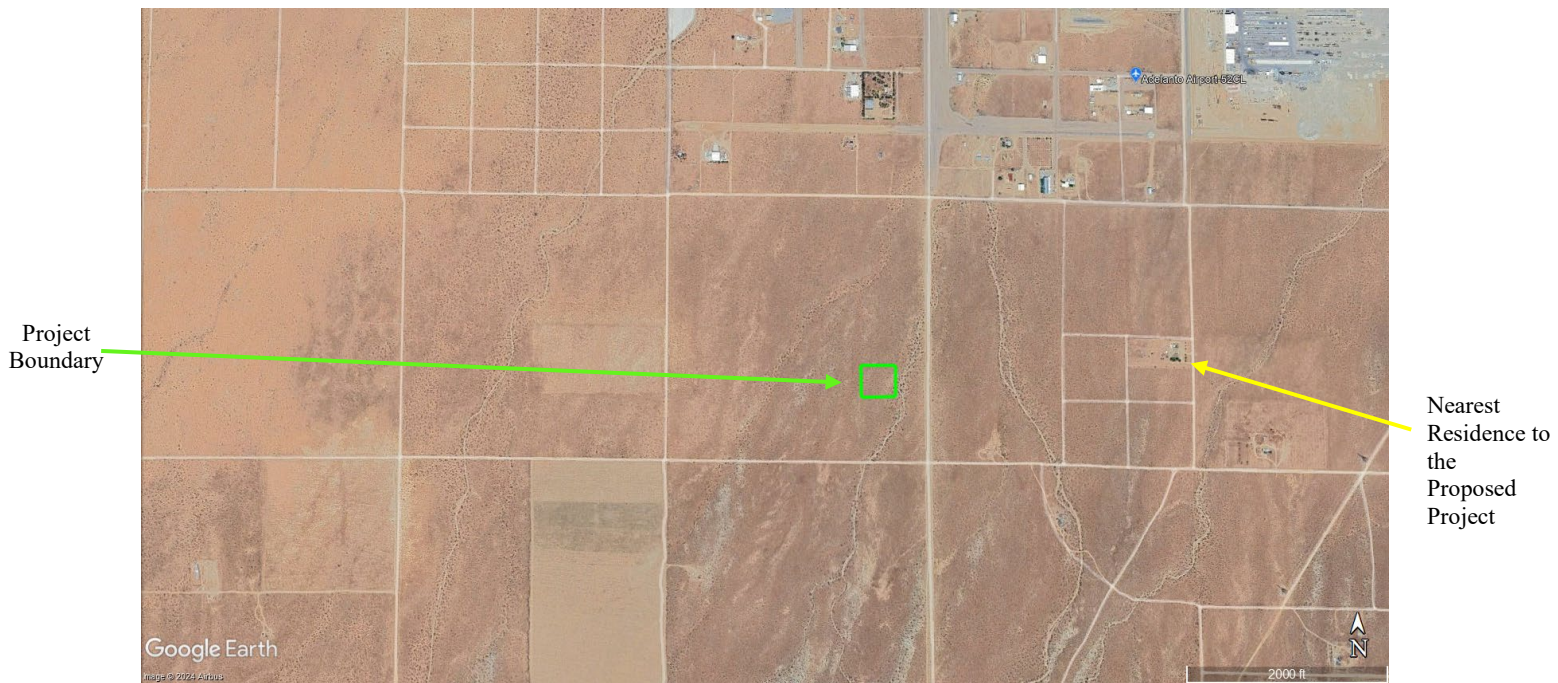
Yorke Engineering, LLC (Yorke) is pleased to provide this Air Quality (AQ), Greenhouse Gas (GHG), and Noise impacts analysis Letter Report. This Letter Report includes CalEEMod emissions estimates, criteria pollutant analysis, GHG analysis, and noise analysis for the proposed scrap metal and recycling facility in the City of Adelanto, California (the City). These evaluations will support a CEQA Categorical Exemption, Initial Study (IS), Negative Declaration (ND), or a Mitigated Negative Declaration (MND), as applicable.

## **PROJECT DESCRIPTION AND LOCATION**

Design-Go is proposing to develop a scrap metal and recycling facility to be located within the Manufacturing/Industrial (MI) Zone of the City of Adelanto (the City), CA 92301, which is within the Mojave Desert Air Quality Management District (MDAQMD) [Assessor's Parcel Number (APN) 3129-491-08]. The project will be constructed on 2.5 acres of vacant land and will include a 1,500-square-foot (sq. ft.) office building, a 2,000-sq.-ft. metal building to serve as a warehouse for California Redemption Value (CRV) and other scrap metal recycling, a 238-sq.-ft. trash enclosure, and a 900-sq.-ft. loading dock with a new ramp. A total of 12 parking spaces will be provided (six required per the Parking Analysis). A total of 16,342 sq. ft. of drought-tolerant landscaping will be incorporated into the site. No demolition will be required for the vacant site.

Figure 1 is satellite imagery showing the location of the proposed Project, surrounding area, and nearest sensitive receptor, approximately 0.5 mile east of the site boundary.

**Figure 1: Project Vicinity Map**



## DATA SOURCES AND ASSUMPTIONS

The following lists sources of information used in developing the emission estimates for the proposed Project using the California Emissions Estimator Model<sup>®</sup> (CalEEMod). Not all CalEEMod defaults are listed, but some defaults which have a particularly important impact on the project are listed.

- The Applicant defined:
  - Basic project design features including size of the proposed Project site;
  - During construction, any exposed soil will be watered two times a day to control fugitive dust.
- CalEEMod defaults were used for:
  - Construction equipment count, load factor, and fleet average age; and
  - Architectural coating areas;
  - Operational vehicle fleet mixes; and
  - Average vehicle trip distances.

## LIST OF TABLES

The project analyses and results are summarized in the following tables:

- Table 1: Land Use Data for CalEEMod Input

- Table 2: MDAQMD CEQA Thresholds of Significance
- Table 3: Construction Emissions Summary and Significance Evaluation
- Table 4: Operational Emissions Summary and Significance Evaluation
- Table 5: Greenhouse Gas Emissions Summary and Significance Evaluation
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- Table 8: City of Adelanto Ambient Noise Levels
- Table 9: City of Adelanto Noise Limits for HVAC Units
- Table 10: FTA Construction Equipment Vibration Reference Levels
- Table 11: FTA Human Response to Different Levels of Ground-Borne Vibration and Noise
- Table 12: Estimated Peak Activity Daytime Vibration Damage Impacts
- Table 13: Estimated Peak Activity Daytime Vibration Annoyance Impacts
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## AIR QUALITY IMPACTS ANALYSES

In order to evaluate the potential for Air Quality impacts of a proposed Project, quantitative significance criteria established by the local air quality agency, such as the MDAQMD, may be relied upon to make significance determinations based on mass emissions of criteria pollutants, as presented in this report. As shown below, approval of the project would not result in any significant effects relating to air quality.

### Project Emissions Estimation

The construction and operation analysis were performed using CalEEMod version 2022.1.1.26, the official statewide land use computer model designed to provide a uniform platform for estimating potential criteria pollutant and GHG emissions associated with both construction and operations of land use projects under CEQA. The model quantifies direct emissions from construction and operations (including vehicle use), as well as indirect emissions, such as GHG emissions from energy use, solid waste disposal, vegetation planting and/or removal, and water use. The mobile source emission factors used in the model – published by the California Air Resources Board (CARB) – include the Pavley standards and Low Carbon Fuel standards. The model also identifies project design features, regulatory measures, and control measures to reduce criteria pollutant and GHG emissions along with calculating the benefits achieved from the selected measures. CalEEMod was developed by the California Air Pollution Control Officers Association (CAPCOA) in collaboration with the South Coast Air Quality Management District (SCAQMD), the Bay Area Air Quality Management District (BAAQMD), the San Joaquin Valley Air Pollution Control District (SJVAPCD), and other California air districts. Default land use data (e.g., emission factors, trip lengths, meteorology, source inventory, etc.) were provided by the

various California air districts to account for local requirements and conditions. As the official assessment methodology for land use projects in California, CalEEMod is relied upon herein for construction and operational emissions quantification, which forms the basis for the impact analysis.

Based on information received from the Applicant, land use data for CalEEMod input is presented in Table 1. The MDAQMD quantitative significance thresholds shown in Table 2 were used to evaluate project emissions impacts (MDAQMD 2020).

Table 1: Land Use Data for CalEEMod Input						
Land Use Type	Land Use Subtype	Unit Amount	Size Metric	Square Feet	Acreage (footprint)	Description
Industrial	Unrefrigerated Warehouse- No Rail	2.000	1,000 sq. ft.	2,000	0.05	Warehouse
Commercial	General Office Building	1.500	1,000 sq. ft.	1,500	0.03	Office
Parking	Other Asphalt surfaces	89.058	1,000 sq. ft.	89,058	2.04	Open parking areas and other paved surfaces
Landscape Area				16,342	0.38	Landscape Area
<b>Project (Lot) Size</b>				<b>108,900</b>	<b>2.50</b>	

Source: Applicant 2024, CalEEMod version 2022.1.1.26

Notes:

Electric Utility: Southern California Edison

Gas Utility: Southwest Gas Corp.

1 acre = 43,560 sq. ft.

Table 2: MDAQMD CEQA Thresholds of Significance		
Criteria Pollutant	Annual Threshold (short tons)	Daily Threshold (lbs)
Greenhouse Gases (CO <sub>2</sub> e)	100,000 (90,718 MT)	548,000
Carbon Monoxide (CO)	100	548
Oxides of Nitrogen (NO <sub>x</sub> )	25	137
Volatile Organic Compounds (VOC)	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> )	12	65
Hydrogen Sulfide (H <sub>2</sub> S)	10	54
Lead (Pb)	0.6	3

Source: MDAQMD 2020

### ***Criteria Pollutants and Toxic Air Contaminants***

Criteria pollutants are a group of six common air pollutants for which the federal and state governments have set national ambient air quality standards (NAAQS) and California ambient air quality standards (CAAQS), respectively. The standards are set to protect public health and welfare and the environment. The federal criteria pollutants are ozone (O<sub>3</sub>), carbon monoxide (CO), lead (Pb), nitrogen dioxide (NO<sub>2</sub>), sulfur dioxide (SO<sub>2</sub>), and particulate matter (PM), which consists of particulates 10 microns in diameter or less (PM<sub>10</sub>) and 2.5 microns in diameter or less (PM<sub>2.5</sub>). MDAQMD has adopted CEQA thresholds for CO, oxides of sulfur (SO<sub>x</sub>), PM<sub>10</sub>, and PM<sub>2.5</sub> and ozone precursors Volatile Organic Compounds (VOC) and oxides of nitrogen (NO<sub>x</sub>).

Toxic air contaminants (TACs) are defined in the California Health and Safety Code as air pollutants which may cause or contribute to an increase in mortality or an increase in serious illness, such as cancer, or which may pose a present or potential hazard to human health (HSC §39655). In addition, substances which are listed as federal hazardous air pollutants (HAPs) are also TACs under the state's air toxics program (42 USC §7412, HSC §39657, 17 CCR §93001). Common TACs include aromatic compounds such as benzene, toluene, ethylbenzene, and xylenes (BTEX), polycyclic aromatic hydrocarbons (PAHs), aldehydes and ketones, glycol ethers, and metal particulates such as arsenic, beryllium, cadmium, hexavalent chromium, copper, manganese, mercury, nickel, lead, selenium, and zinc. Because it contains a combination of toxic substances, diesel particulate matter (DPM) in diesel engine exhaust is a listed TAC.

### ***Construction Emissions***

A project's construction phase produces many types of criteria pollutant emissions. Construction activities are typically short-term or temporary in duration. Fugitive dust emissions can result from a variety of construction activities, including excavation, grading, demolition, vehicle travel on paved and unpaved surfaces, and vehicle exhaust. Construction-related emissions can cause substantial increases in localized concentrations of PM<sub>10</sub>, as well as affecting PM<sub>10</sub> compliance with ambient air quality standards on a regional basis. Particulate emissions from construction activities can lead to adverse health effects as well as nuisance concerns such as reduced visibility and soiling of exposed surfaces. PM<sub>10</sub> emitted during construction can vary greatly depending on the level of activity, the specific operations taking place, the equipment being operated, local soils, weather conditions, and other factors, making quantification difficult.

PM<sub>10</sub> emitted during construction can vary greatly depending on the level of activity, the specific operations taking place, the equipment being operated, local soils, weather conditions, and other factors, making quantification difficult. Despite this variability in emissions, experience has shown that there are several feasible control measures that can be reasonably implemented to significantly reduce fugitive dust emissions from construction. For larger projects, the MDAQMD has determined that compliance with an approved fugitive dust control plan comprising Best Management Practices (BMPs), primarily through frequent water application, constitutes sufficient control to reduce PM<sub>10</sub> impacts to a level considered less than significant. MDAQMD Rule 403.2, Fugitive Dust Control for the Mojave Desert Planning Area, restricts fugitive dust from construction/demolition and other activities in the Mojave Desert Planning Area. Specifies numerous restrictions to operators of construction/demolition for all projects greater than a half-acre in size (e.g., periodic watering, covering loaded haul vehicles, stabilize graded surfaces, cleanup project dust/debris on paved surfaces, reduce non-essential earth moving), and specifies

additional rules for projects disturbing more than 100 acres per day (e.g., dust control plan, stabilized access routes). Compliance with Rule 403.2 will reduce PM<sub>10</sub> impacts of the proposed Project to less than significant.

**Operational Emissions**

The term “project operations” refers to the full range of activities that can or may generate criteria pollutant, GHG, and TAC emissions when the project is functioning in its intended use. For projects, such as office parks, shopping centers, apartment buildings, residential subdivisions, and other indirect sources, motor vehicles traveling to and from the project represent the primary source of air pollutant emissions. For industrial projects and some commercial projects, equipment operation and manufacturing processes, i.e., permitted stationary sources, can be of greatest concern from an emissions standpoint. CEQA significance thresholds address the impacts of operational emission sources on local and regional air quality. Thresholds are also provided for other potential impacts related to project operations, such as odors.

Traffic impacts, i.e., vehicle miles traveled (VMT) for determining mobile source emissions, for applicable land uses are based on default trip generation rates contained in the Institute of Transportation Engineers (ITE) Trip Generation Manual, 10<sup>th</sup> Edition, and primary, diverted, and pass-by trip percentages are based on data from ITE’s Trip Generation Handbook, 3<sup>rd</sup> Edition, which are incorporated in CalEEMod. Default trip lengths in CalEEMod are populated using data from the California Statewide Travel Demand Model (CSTDM) or local Metropolitan Planning Organization Regional Transportation Planning Agency (MPO/RTPA), where available.

**Results of Criteria Emissions Analyses**

CalEEMod outputs are in Attachment 1. Table 3 shows Project criteria construction emissions and evaluates them against MDAQMD significance thresholds. Table 4 shows Project criteria operational emissions and evaluates them against MDAQMD significance thresholds. As shown in Tables 3 and 4, mass emissions of criteria pollutants from construction and operation are below applicable MDAQMD significance thresholds.

IMPACT: Less Than Significant (LTS)

<b>Table 3: Construction Emissions Summary and Significance Evaluation</b>					
<b>Criteria Pollutants</b>	<b>Project</b>		<b>Threshold</b>		<b>Significance</b>
	<b>Daily (lbs/day)</b>	<b>Annual (tons/yr)</b>	<b>Daily (lbs/day)</b>	<b>Annual (tons/yr)</b>	
ROG (VOC)	4.4	0.17	137	25	LTS
NO <sub>x</sub>	14.1	1.26	137	25	LTS
CO	15.1	1.43	548	100	LTS
SO <sub>x</sub>	0.03	0.003	137	25	LTS
Total PM <sub>10</sub>	3.5	0.06	82	15	LTS
Total PM <sub>2.5</sub>	2.0	0.05	65	12	LTS

Sources: MDAQMD 2020, CalEEMod version 2022.1.1.26

Notes:

lbs/day are winter or summer maxima for planned land use

Total PM<sub>10</sub> / PM<sub>2.5</sub> comprises fugitive dust plus engine exhaust

LTS - Less Than Significant

**Table 4: Operational Emissions Summary and Significance Evaluation**

Criteria Pollutants	Project		Threshold		Significance
	Daily (lbs/day)	Annual (tons/yr)	Daily (lbs/day)	Annual (tons/yr)	
ROG (VOC)	0.2	0.0	137	25	LTS
NO <sub>x</sub>	0.2	0.0	137	25	LTS
CO	1.9	0.2	548	100	LTS
SO <sub>x</sub>	0.004	0.001	137	25	LTS
Total PM <sub>10</sub>	0.4	0.1	82	15	LTS
Total PM <sub>2.5</sub>	0.1	0.0	65	12	LTS

Sources: MDAQMD 2020, CalEEMod version 2022.1.1.26

Notes:

lbs/day are winter or summer maxima for planned land use

Total PM<sub>10</sub> / PM<sub>2.5</sub> comprises fugitive dust plus engine exhaust

LTS - Less Than Significant

## GREENHOUSE GAS IMPACTS ANALYSES

The construction and operational related GHG emissions were calculated by CalEEMod using the methodology detailed above in the Air Quality Section.

### *Greenhouse Gas Emissions from Construction and Operation*

GHGs contributing to global warming are carbon dioxide (CO<sub>2</sub>), methane (CH<sub>4</sub>), and nitrous (N<sub>2</sub>O) oxide, and fluorinated compounds, including sulfur hexafluoride (SF<sub>6</sub>), hydrofluorocarbons (HFCs), and perfluorocarbons (PFCs). They are collectively reported as carbon dioxide equivalents (CO<sub>2</sub>e) and are directly emitted from off-road construction equipment and on-road vehicles burning fuels such as gasoline, diesel, biodiesel, propane, or natural gas (compressed or liquefied). Fugitive GHGs (e.g., HFCs) are emitted from refrigerant leaks in air conditioning and refrigeration equipment, and SF<sub>6</sub> is a dielectric gas used in high-voltage transmission switchgear, also subject to fugitive leakage.

California's Building Energy Efficiency Standards are updated on an approximately three-year cycle. The 2022 standards improved upon the 2019 standards for new construction of, and additions and alterations to, residential, commercial, and industrial buildings. The 2022 standards went into effect on January 1, 2023 (CEC 2022).

Since the Title 24 standards require energy conservation features in new construction (e.g., high-efficiency lighting, high-efficiency heating, ventilating, and air-conditioning (HVAC) systems, thermal insulation, double-glazed windows, water conserving plumbing fixtures, etc.), they indirectly regulate and reduce GHG emissions.

Using CalEEMod, direct onsite and offsite GHG emissions were estimated for construction and operation, and indirect offsite GHG emissions were estimated to account for electric power used by the proposed Project, water conveyance, and solid waste disposal. CalEEMod also quantifies common refrigerant GHGs (abbreviated as “R” in the model output) used in air conditioning and refrigeration equipment, some of which are HFCs.

Because emissions from construction activities occur over a relatively short-term period of time (i.e., several months), they contribute a relatively small portion of the overall lifetime GHG emissions for a Project. Thus, the Project’s total construction GHG emissions were amortized over a presumptive 30-year project lifetime (i.e., divided by 30) to determine an approximate annual construction emission estimate comparable to operational emissions.

**Results of Greenhouse Gas Emissions Analyses**

Table 5 shows Project GHG emissions and evaluates them against MDAQMD significance thresholds. Off-site traffic impacts are included in these emissions estimates, along with construction emissions amortized over 30 years.

IMPACT: Less Than Significant (LTS)

Table 5: Greenhouse Gas Emissions Summary and Significance Evaluation					
Greenhouse Gases <sup>3</sup>	Project Construction <sup>1</sup> (MT/yr)	Project Operation (MT/yr)	Project Total <sup>2</sup> (MT/yr)	Threshold (MT/yr)	Significance
CO <sub>2</sub>	8.0	67.8	75.8	—	—
CH <sub>4</sub>	0.0	0.1	0.1	—	—
N <sub>2</sub> O	0.0	0.0	0.0	—	—
R	0.0	0.1	0.1	—	—
CO <sub>2</sub> e	8.1	70.1	78.2	90,718	LTS

Sources: MDAQMD 2020, CalEEMod version 2022.1.1.26

Notes:

<sup>1</sup> Construction emissions amortized over 30 years

<sup>2</sup> Comprises annual operational emissions plus construction emissions amortized over 30 years

<sup>3</sup> CO<sub>2</sub>, CH<sub>4</sub>, N<sub>2</sub>O, and R are collectively reported as CO<sub>2</sub>e.

LTS - Less Than Significant

**NOISE IMPACTS ANALYSES**

**Noise and Vibration Analysis Methodology**

The screening-level noise analysis for project construction was completed based on methodology developed by the U.S. Department of Transportation Federal Highway Administration (DOT FHWA) at the John A. Volpe National Transportation Systems Center and other technical references consistent with CalEEMod outputs (equipment utilization). The FHWA Roadway Construction Noise Model (RCNM) methodology uses actual noise measurement data collected during the Boston “Big Dig” project (1991-2006) as reference levels for a wide variety of construction equipment in common use, such as on the proposed Project. This noise analysis did not include field measurements of ambient noise in the vicinity of the project site.

The RCNM noise model provides relatively conservative predictions because it does not account for site-specific geometry, dimensions of nearby structures, and local environmental conditions that can affect sound transmission, reflection, and attenuation. As a result, actual measured sound levels at receptors may vary somewhat from predictions, typically lower. Additionally, the impacts of noise upon receptors (persons) are subjective because of differences in individual sensitivities and perceptions.



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Noise impacts are evaluated against community noise standards contained in the City or County General Plan or other state or federal agency as applicable to the vicinity of the project site. For this project, the City of Adelanto Municipal Code contains the applicable evaluation criteria.

During construction activities, the project would generate noise due to operation of minimal off-road equipment, portable equipment, and vehicles at or near the project site. No significant increase in traffic is expected due to this relatively small project. No strong sources of vibrations are planned to be used during construction activities.

Doubling the noise source would produce only a 3 dBA increase in the sound pressure level. Therefore, a doubling of traffic volume is required to result in a 3 dBA increase in noise, the point at which changes are barely perceptible. The operation of the proposed Project is not expected to double the traffic volume as discussed in detail below. The noise impacts from truck loading and trash and recyclables collection are also discussed below. The project site is within 0.6 miles of the Adelanto Airport, therefore the potential impacts from the Airport noise are discussed in this report.

## **Environmental Setting**

### ***Noise Descriptors***

Noise is typically described as any dissonant, unwanted, or objectionable sound. Sound is technically described in terms of the loudness (amplitude) and frequency (pitch) of the sound. The standard unit of measurement of the loudness of sound is the decibel (dB). Because the human ear is not equally sensitive to sound at all frequencies, a special frequency-dependent rating scale has been devised to relate noise to human sensitivity, the A-weighted decibel scale (dBA). Table 6 lists common sources of sound and their intensities in dBA.

<b>Table 6: Typical Sound Level Characteristics</b>		
<b>Pressure</b>	<b>Level</b>	<b>Sound Level Characteristic</b>
<b>N/m<sup>2</sup></b>	<b>dba</b>	
2000	160	Rocket Launch
600	150	Military Jet Plane Takeoff
200	140	Threshold of Pain
60	130	Commercial Jet Plane Takeoff
20	120	Industrial Chipper or Punch Press
6	110	Loud Automobile Horn
2	100	Passing Diesel Truck – Curb Line
0.6	90	Factory - Heavy Manufacturing
0.2	80	Factory - Light Manufacturing
0.06	70	Open Floor Office - Cubicles
0.02	60	Conversational Speech
0.006	50	Private Office - Walled
0.002	40	Residence in Daytime
0.0006	30	Bedroom at Night
0.0002	20	Recording or Broadcasting Studio
0.00006	10	Threshold of Good Hearing - Adult
0.00002	0	Threshold of Excellent Hearing - Child

Sources: Fundamentals of Industrial Hygiene (Niland & Elam), 7<sup>th</sup> Edition, 2021

**Notes:**

Reference Level  $P_0 = 0.00002 \text{ N/m}^2 = 0.0002 \text{ } \mu\text{bar}$

$\text{N/m}^2$  = Newtons per square meter (the Newton is the unit of force derived in the metric system); it is equal to the amount of net force required to accelerate one kilogram of mass at a rate of one meter per second squared ( $1 \text{ kg} \cdot 1 \text{ m/s}^2$ ) in the direction of the applied force.

In most situations, a 3-dBA change in sound pressure is considered a “just-detectable” difference. A 5-dBA change (either louder or quieter) is readily noticeable, and 10-dBA change is a doubling (if louder) or halving (if quieter) of the subjective loudness. Sound from a small, localized source (a “point” source) radiates uniformly outward as it travels away from the source in a spherical pattern. The sound level attenuates (drops off) at a rate of 6 dBA for each doubling of the distance.

The duration of noise and the time period at which it occurs are important factors in determining the impact of noise on sensitive receptors. A single number called the equivalent continuous noise level ( $L_{eq}$ ) may be used to describe sound that is changing in level. It is also used to describe the acoustic range of the noise source being measured, which is accomplished through the maximum  $L_{eq}$  ( $L_{max}$ ) and minimum  $L_{eq}$  ( $L_{min}$ ) indicators.

In determining the daily measure of community noise, it is important to account for the difference in human response to daytime and nighttime noise. Noise is more disturbing at night than during the day, and noise indices have been developed to account for the varying duration of noise events over time, as well as community response to them. The Community Noise Equivalent Level (CNEL) adds a 5-dB penalty to the “evening” noise levels (i.e., 7:00 p.m. to 10:00 p.m.) and a 10-dB penalty to the “nighttime” noise levels (i.e., 10:00 p.m. to 7:00 a.m.). The Day-Night Average Level (Ldn) adds a 10-dB penalty to the “nighttime” noise levels (Caltrans 2020, FTA 2018).

### ***Vibration Descriptors***

Vibration is a unique form of noise because its energy is carried through structures and the earth, whereas noise is carried through the air. Thus, vibration is generally felt rather than heard. Typically, ground borne vibration generated by construction activities attenuates rapidly as distance from the source of the vibration increases. Actual human and structural response to different vibration levels is influenced by a combination of factors, including soil type, distance between the source and receptor, duration, and the number of perceived events.

While not a direct health hazard, the energy transmitted through the ground as vibration may result in structural damage, which may be costly to repair and dangerous in the event of structural failure. To assess the potential for structural damage associated with vibration, the vibratory ground motion in the vicinity of the affected structure is measured in terms of point peak velocity/peak particle velocity (PPV) in the vertical and horizontal directions (vector sum). A freight train passing at 100 feet may cause PPVs of 0.1 inch per second, while a strong earthquake may produce PPVs in the range of 10 inches per second. Minor cosmetic damage to buildings may begin in the range of 0.5 inch per second (Caltrans 2020, FTA 2018).

### **Regulatory Setting**

#### ***California***

The State of California does not promulgate statewide standards for environmental noise but requires each city and county to include a noise element in its general plan [California Government Code Section 65302(f)]. In addition, Title 4 of the CCR has guidelines for evaluating the compatibility of various land uses as a function of community noise exposure. In general, the guidelines require that community noise standards:

- Protect residents from the harmful and annoying effects of exposure to excessive noise;
- Prevent incompatible land uses from encroaching upon existing or programmed land uses likely to create significant noise impacts; and
- Encourage the application of state-of-the-art land use planning methodologies in the area of managing and minimizing potential noise conflicts.

Construction vibration is regulated at the state level in accordance with standards established by the *Transportation and Construction Vibration Guidance Manual* revised by Caltrans in 2020. Continuous sources include the use of vibratory compaction equipment and other construction equipment that creates vibration other than in single events. Transient sources create a single isolated vibration event, such as blasting. Thresholds for continuous sources are 0.5 and 0.1 inch per second PPV for structural damage and annoyance, respectively. Thresholds for transient sources are 1.0 and 0.9 PPV for structural damage and annoyance, respectively (Caltrans 2020).

#### ***City of Adelanto General Plan –Noise Element***

The City of Adelanto General Plan, Land Use Compatibility Guidelines Related to Noise Exposures describes the relationship between land use and noise exposure in the Noise Element of the General Plan and applies to land uses citywide. In general, for commercial, manufacturing, production, and recreational land use, noise levels of up to 70 CNEL from operations at the project property line are acceptable. See Table 7.

<b>Table 7: City of Adelanto Land Use Compatibility Guidelines</b>	
<b>Land Use Categories</b>	<b>CNEL 65-70</b>
Residential	Noise Level Reduction Required
Public Use (Schools/Hospitals/Churches/Auditoriums)	Noise Level Reduction Required
Public Use (Gov. Services/Transportation/Parking)	Compatible
Commercial Use	Compatible
Manufacturing and Production	Compatible
Recreational	Compatible

**City of Adelanto Municipal Code**

*Title 9, Chapter 9.110, Noise Control*

The purpose of chapter 9.110 of the City of Adelanto’s Municipal Code is to establish criteria and standards for the regulation of noise levels within the City, as shown in Table 8. The City Council declares and finds that excessive noise levels are detrimental to the public health, welfare, and safety and are contrary to the public interest. It is this chapter’s intent to protect persons from excessive levels of noise from sources including but not limited to; persons, animals, or fowl; automobiles, motorcycles, engines, machines, or other mechanical devices; and loudspeakers, speakers, musical instruments, stereos, radios, televisions, record players or other amplifying devices. This chapter includes standards for the measurement of noise levels to ensure that noise levels do not disturb and interfere with the peace, comfort, or repose of the residents of the neighborhood from which the noise is emitted.

Section 9.110.050 states that all ambient noise measurements shall commence in decibels within the respective zones and times as follows:

<b>Table 8: City of Adelanto Ambient Noise Levels</b>		
<b>Zone</b>	<b>Time</b>	<b>Sound Level Decibels (dBA)</b>
All Residential Zones	10:00 pm Sunday to 7:00 a.m. Monday	45
	10:00 pm Monday to 7:00 a.m. Tuesday	
	10:00 pm Tuesday to 7:00 a.m. Wednesday	
	10:00 pm Wednesday to 7:00 a.m. Thursday	
	10:00 pm Thursday to 7:00 a.m. Friday	
	11:00 pm Friday to 7:00 a.m. Saturday	
	11:00 pm Saturday to 7:00 a.m. Sunday	
All Commercial Zones	Anytime	70
All Industrial Zones	Anytime	75

If the ambient noise level exceeds the applicable limit as noted in the above table, the ambient noise level shall be the standard.

Section 9.110.060 states that unless otherwise permitted, noise levels shall not exceed the ambient noise levels in Section 9.110.050 by the following dB(A) levels for the cumulative period of time specified:

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- A. Less than five dBA for a cumulative period of more than 30 minutes in any hour.
- B. Less than 10 dBA for a cumulative period of more than 15 minutes in any hour.
- C. Less than 15 dBA for a cumulative period of more than five minutes in any hour.
- D. Less than 20 dBA for a cumulative period of more than one minute in any hour.
- E. 20 dBA or more for any period of time.

Section 9.110.070 exempts construction, alteration, and demolition activity on private properties that are determined by the Director of Building and Safety to be essential to the completion of a project, from the provisions of this chapter.

Section 9.110.080 prohibits disturbing noises.

Per Section 9.110.090, the following acts, are declared to be in violation of this Chapter:

- F. Loading, unloading, opening, closing or other handling of boxes, crates, containers, building materials, garbage cans, or similar objects between the hours of 10:00 p.m. and 7:00 a.m. the following day in such a manner as to cause a noise disturbance across a residential real property line or at any time to violate the provisions of Section 9.110.060.
- K.1. Creating or causing the creation of any sound within any noise sensitive zone, so as to exceed the specified land use noise standards set forth in Section 9.110.060; or
- K.2. Creating or causing the creation of any sound within or adjacent to any noise sensitive zone containing a hospital, nursing home, police or sheriff's station, fire station, school (including nursery school and preschool), library, courthouse, or other designated use so as to interfere with the functions of such activity or annoy the patients or participants of such activity(ies).
- M. Operating or permitting the operation of any air-conditioning or air refrigerating equipment in such a manner as to exceed any of the following sound levels measured as specified in the American Society of Heating, Refrigeration and Air Conditioning Engineers Code of Recommended Practices:

<b>Table 9: City of Adelanto Noise Limits for HVAC Units</b>	
<b>Zone</b>	<b>Units Installed After 01-01-80 (dBA)</b>
Any point on neighboring property line, five feet (5') above grade level, no closer than three feet (3') from any wall	55
Center of neighboring patio five feet (5') above grade level, no closer than three feet (3') from any wall	50
Outside the neighboring living area window nearest the equipment location, not more than three feet (3') from the window opening, but at least three feet (3') from any other surface	50

*Title 17, Chapter 17.90, Section 17.90.020 Noise*

The City of Adelanto Noise Ordinance, Section 17.90.020, outlines the requirements for construction and operational noise.

Per Section 17.90.020, Subpart (d):

- Construction activity and equipment maintenance is limited to the hours between 7:00 a.m. to dusk on weekdays. Construction may not occur on weekends or State holidays, without prior consent of the Building Official. Non-noise generating activities (e.g., interior painting) are not subject to these restrictions. City and State construction projects, such as road re-building or resurfacing, and any construction activity that is in response to an emergency, shall be exempt from this requirement.
- Stationary construction equipment that generates noise in excess of 65 dBA at the project boundaries must be acoustically shielded and located at least 100 feet from occupied residences. The equipment area with appropriate acoustic shielding shall be designated on building and grading plans. Equipment and shielding shall remain in the designated location throughout construction activities.
- Construction routes are limited to City of Adelanto designated truck routes.
- All grading equipment shall be kept in good working order per factory specifications.

Section 17.90.020, Subpart (b)(1), states that the noise standards contained in Table 9, shall apply to land uses city-wide and shall be used to define acceptable and unacceptable noise levels.

Section 17.90.020, Subpart (b)(2), states that no person shall operate or cause to operate any source of sound at any location or allow the creation of any noise on property owned, leased, occupied or otherwise controlled by such person, which causes the noise level, when measured on any other property, either incorporated or unincorporated, to exceed:

- A. The noise standard plus three dBA for that receiving land use specified in Table 9 for a cumulative period of more than 30 minutes in any hour; or
- B. The noise standard plus five dBA for a cumulative period of more than five minutes in any hour; or

- C. The noise standard plus 10 dBA for a cumulative period of more than three minutes in any hour; or
- D. The noise standard plus 15 dBA for a cumulative period of more than one minute in any hour; or
- E. The noise standard plus 20 dBA for any period of time.

If the measured ambient level exceeds any of the first four noise limit categories above, the allowable noise exposure standard shall be increased to reflect the ambient noise level. If the ambient noise level exceeds the fifth noise limit category, the maximum allowable noise level under this category shall be increased to reflect the maximum ambient noise level.

If the alleged offense consists entirely of impact noise or simple tone noise, each of the noise levels in Section 17.90.020(b)(2)(A). shall be reduced by five dBA.

### **Construction Noise and Vibration**

#### ***Vibration***

The proposed Project can be characterized as development of a scrap metal and recycling facility. No demolition will be necessary. During construction activities, the project would generate minor levels of vibration due to the operation of off-road equipment, portable equipment, and vehicles at or near the project site. Construction plans do not include intense percussive actions (e.g., hard rock-breaking, large pile-driving). Federal Transit Administration (FTA) has published standard vibration velocities for construction equipment operations. Generally, a PPV vibration threshold of approximately 0.3 in/sec is sufficient to avoid physical damage to engineered structures (FTA 2018). The types of construction vibration impacts include human annoyance and building damage. Human annoyance occurs when construction vibration rises significantly above the threshold of human perception for extended periods of time. Building damage can be cosmetic or structural. Table 10 presents average source levels in terms of velocity for different types of construction equipment.

Table 11 presents the human response to different levels of ground-borne vibration and noise (FTA 2018). The vibration level ( $V_{dB}$ ) is presented with the corresponding frequency assuming that the vibration spectrum peaks at 30 Hz or 60 Hz. The groundborne noise levels (dBA) are estimated for the specified vibration velocity with a peak vibration spectrum of 30 Hz (Low Freq) and 60 Hz (Mid Freq).

Based on the information presented in Table 10, where construction equipment used for the project are characterized as small bulldozers, the nearest offsite structure approximately 0.5 mile away from the site would be exposed to a PPV well below 0.3 in/sec, which is the threshold at which physical damage to engineered buildings may occur. Similarly, the nearest sensitive receptor would be exposed to vibration levels well below 65  $V_{dB}$ , which is the FTA human perception threshold. Thus, the proposed Project construction would result in a less than significant impact. Tables 12 and 13 show the vibration levels of construction equipment at the nearest receptor (0.5 mile away) and compares them to the applicable FTA thresholds.

IMPACT: Less Than Significant (LTS)

Table 10: FTA Construction Equipment Vibration Reference Levels		
Equipment	PPV at 25 feet (in/sec)	L <sub>v</sub> at 25 feet (V <sub>dB</sub> ) <sup>1</sup>
Pile Driver (impact, upper range)	1.518	112
Pile Driver (impact, typical)	0.644	104
Pile Driver (vibratory, upper range)	0.734	105
Pile Driver (vibratory, typical)	0.170	93
Clamshell Shovel Drop (slurry wall)	0.202	94
Hydromill (slurry wall, in soil)	0.008	66
Hydromill (slurry wall, in rock)	0.017	75
Vibratory Roller/Compactor	0.210	94
Hoe Ram/Hydraulic Breaker	0.089	87
Large Bulldozer/Crawler Tractor	0.089	87
Caisson Drilling/Boring	0.089	87
Loaded Dump Trucks	0.076	86
Jackhammer (pneumatic)	0.035	79
Small Bulldozer/Excavator/Backhoe	0.003	58

Source: FTA 2018

Notes:

<sup>1</sup> RMS velocity in decibels, VdB ref. 1 micro-in/sec

25 feet = 7.62 meters

Table 11: FTA Human Response to Different Levels of Ground-Borne Vibration and Noise			
Vibration Velocity Level (V <sub>dB</sub> )	Noise Level (dBA)		Human Response
	Low Freq <sup>1</sup>	Mid Freq <sup>2</sup>	
65	25	40	Approximate threshold of perception for many humans. Low-frequency sound: usually inaudible. Mid-frequency sound: excessive for quiet sleeping areas.
75	35	50	Approximate boundary between barely perceptible and distinctly perceptible. Many people find vibration at this level annoying. Low-frequency noise: tolerable for sleeping areas. Mid-frequency noise: excessive in most quiet occupied areas.
85	45	60	Vibration tolerable only if there are an infrequent number of events per day. Low-frequency noise: excessive for sleeping areas. Mid-frequency noise: excessive even for infrequent events for some activities.

Source: FTA 2018



**Table 12: Estimated Peak Activity Daytime Vibration Damage Impacts**

CalEEMod Construction Detail			FTA Equipment Type	Ref. Level	PPV Equipment	PPV per Phase	Significance Threshold (in/sec)	Exceeds Threshold (Yes/No)?
Phase Name	Equipment Description	Qty.						
Site Preparation (1)	Graders	1	Small Bulldozer	0.003	1.53E-05	0.00005	0.3	No
	Scrapers	1	Small Bulldozer	0.003	1.53E-05			
	Tractors/Loaders/Backhoes	1	Small Bulldozer	0.003	1.53E-05			
Grading (2)	Graders	1	Small Bulldozer	0.003	1.53E-05	0.00006	0.3	No
	Rubber Tired Dozers	1	Small Bulldozer	0.003	1.53E-05			
	Tractors/Loaders/Backhoes	2	Small Bulldozer	0.003	1.53E-05			
Building Construction (3)	Cranes	1	Small Bulldozer	0.003	1.53E-05	0.00012	0.3	No
	Forklifts	2	Small Bulldozer	0.003	1.53E-05			
	Generator Sets	1	Small Bulldozer	0.003	1.53E-05			
	Tractors/Loaders/Backhoes	1	Small Bulldozer	0.003	1.53E-05			
	Welders	3	Small Bulldozer	0.003	1.53E-05			
Paving (4)	Cement and Mortar Mixers	1	Small Bulldozer	0.003	1.53E-05	0.00009	0.3	No
	Pavers	1	Small Bulldozer	0.003	1.53E-05			
	Paving Equipment	1	Small Bulldozer	0.003	1.53E-05			
	Rollers	2	Small Bulldozer	0.003	1.53E-05			
	Tractors/Loaders/Backhoes	1	Small Bulldozer	0.003	1.53E-05			
Architectural Coating (5)	Air Compressors	1	NA	NA	NA	NA	NA	NA

Source: CalEEMod version 2022.1.1.26, FTA 2018

Table 13: Estimated Peak Activity Daytime Vibration Annoyance Impacts						
CalEEMod Construction Detail			Reference Lv at 25 feet (V <sub>dB</sub> )	Attenuated Lv (V <sub>dB</sub> )	Significance Threshold (V <sub>dB</sub> )	Exceeds Threshold (Yes/No)?
Phase Name	Equipment Description	Qty.				
Site Preparation (1)	Graders	1	58	17	65	No
	Scrapers	1	58			
	Tractors/Loaders/Backhoes	1	58			
Grading (2)	Graders	1	58	18	65	No
	Rubber Tired Dozers	1	58			
	Tractors/Loaders/Backhoes	2	58			
Building Construction (3)	Cranes	1	58	21	65	No
	Forklifts	2	58			
	Generator Sets	1	58			
	Tractors/Loaders/Backhoes	1	58			
	Welders	3	58			
Paving (4)	Cement and Mortar Mixers	1	58	20	65	No
	Pavers	1	58			
	Paving Equipment	1	58			
	Rollers	2	58			
	Tractors/Loaders/Backhoes	1	58			
Architectural Coating (5)	Air Compressors	1	NA	NA	NA	NA

Source: CalEEMod version 2022.1.1.26, FTA 2018

### *Noise*

Project construction is expected to take about a year of planned work activities (i.e., from mobilization to substantial completion) comprising five construction phases:

- 1) Site preparation;
- 2) Grading;
- 3) Building construction;
- 4) Paving; and
- 5) Architectural coating.

Deviations from this schedule would not affect the noise analysis because noise does not persist or accumulate in the environment.

Most noise would occur during the site preparation, grading, paving, and building construction when heavy equipment would be operating. During each of the five construction phases there would be a different mix of equipment operating and cumulative noise levels would vary based on the amount of equipment in operation and the location of each activity at the Project site. In general, use of off-road equipment and portable equipment would generate noise due to engine mechanicals, engine exhaust, driveline mechanicals, shaft-driven devices and accessories, hydraulics operation, ground friction and displacement, and gravity drops (dumping, unloading). The nearest sensitive receptor is located approximately 0.5 mile east of the site boundary.

Construction activities typically generate maximum noise levels in the range of 70 dBA to 90 dBA at a distance of 50 feet (15 meters). The FTA Transit Noise and Vibration Impact Assessment methodology provides an 8-hour construction noise level threshold of 80 dBA  $L_{eq}$  during the daytime at residential (noise-sensitive) uses. All proposed construction activities for the project will take place during the permissible hours according to the City's Municipal Code.

Types of equipment (FHWA 2006) to be used during the Project and noise-emitting characteristics (i.e., usage factors, reference dBA, and percussive source) are shown in Table 14 consistent with CalEEMod outputs (Attachment 1).

Table 14: RCNM Noise Reference Levels and Usage Factors						
CalEEMod Construction Detail			RCNM Equipment Type	Usage Factor	Ref. Level	Percussive Source
Phase Name	Equipment Description	Qty.		percent	dBA	Yes/No
Site Preparation	Graders	1	Grader	40%	85	No
	Scrapers	1	Scraper	40%	85	No
	Tractors/Loaders/Backhoes	1	Backhoe (with loader)	40%	80	No
Grading	Graders	1	Grader	40%	85	No
	Rubber Tired Dozers	1	Tractor (rubber tire)	40%	84	No
	Tractors/Loaders/Backhoes	2	Backhoe (with loader)	40%	80	No
Building Construction	Cranes	1	Crane	16%	85	No
	Forklifts	2	Forklift	40%	80	No
	Generator Sets	1	Generator (<25 KVA quiet design)	50%	70	No
	Tractors/Loaders/Backhoes	1	Tractor (rubber tire)	40%	84	No
	Welders	3	Welding Machine (arc welding)	50%	70	No
Paving	Cement and Mortar Mixers	1	Drum Mixer	50%	80	No
	Pavers	1	Paver (asphalt)	50%	85	No
	Paving Equipment	1	Paver (asphalt)	50%	85	No
	Rollers	2	Roller	20%	85	No
	Tractors/Loaders/Backhoes	1	Tractor (rubber tire)	40%	84	No
Architectural Coating	Air Compressors	1	Compressor (air)	40%	80	No

Source: CalEEMod version 2022.1.1.26, FHWA 2006

The City of Adelanto Municipal Code Section 9.110.070 exempts construction activities from the provisions of Section 9.110.050. The FTA Transit Noise and Vibration Impact Assessment provides an eight-hour construction noise level threshold of 80 dBA during the daytime at residential uses. Table 15 shows a comparison of RCNM screening-level estimated daytime exterior noise impacts for peak construction activities at the nearest sensitive receptor (0.5 mile away) with respect to the threshold. If the threshold is not exceeded, then a project should be considered acceptable, i.e., Less Than Significant.

**IMPACT:** Less Than Significant (LTS)

<b>Table 15: Estimated Peak Activity Daytime Noise Impacts</b>				
<b>Construction Phases</b>	<b>Normal Acceptance Criteria</b>			
	<b>Modeled Noise Level (Leq dBA)<sup>b</sup></b>	<b>CalEEMod Duration (days)</b>	<b>Significance Threshold (CNEL dBA)<sup>c, d</sup></b>	<b>Exceeds Threshold (Yes/No)?</b>
Background <sup>a</sup>	45	-	-	No
Site Preparation	51	3	80	No
Grading	51	6	80	No
Building Construction	50	220	80	No
Paving	53	10	80	No
Architectural Coating	46	10	80	No
Long-Term Impact	46	-	50	No

Sources: CalEEMod version 2022.1.1.26, FHWA 2006, FTA 2018, Niland & Elam 2021

**Notes:**

<sup>a</sup> City of Adelanto Municipal Code Section 9.110.050

<sup>b</sup> Combined noise levels at the nearest sensitive receptors are calculated using the distance from the receptor to the boundary of the project site.

<sup>c, d</sup> FTA threshold for Construction; Ambient noise level plus 5 dBA for Operations (Long-Term Impact) Per City of Adelanto Municipal Code Section 9.110.060

## Operational Noise

Upon completion of construction and occupancy of the proposed Project, on-site operational noise would be generated mainly by truck loading, trash and recyclables compactors, HVAC equipment. Large HVAC systems could result in noise levels that average between 50 and 65 dBA Leq at 50 feet from the equipment. The new HVAC equipment associated with the proposed Project would not be perceptible at the nearest sensitive receptor located 0.5 mile away. Delivery trucks at the proposed loading dock and trash and recyclables compactors would generate noise levels of approximately 71 dBA (L<sub>eq</sub>) and 66 dBA (L<sub>eq</sub>) at 50 feet distance, respectively. With the maximum of one truck and one trash and recyclables compactor on site at any one time, the maximum noise levels from the proposed Project at the nearest sensitive receptor located 0.5 mile away will be approximately 37 dBA. Therefore, the nearest receptors would not be impacted by the proposed Project.

When considering the combined effects of operational noise sources, noise levels cannot be added by arithmetic means because decibels are expressed in logarithmic units. Doubling the noise source would produce only a 3 dBA increase in the sound pressure level. Therefore, a doubling of traffic volume is required to result in a 3 dBA increase in noise, the point at which changes are barely perceptible. The net increase of 5-18 average daily trips resulting from the Project to the existing daily vehicle trips on the nearby streets and highways would result in a negligible increase in the existing traffic volume; therefore, the proposed Project would not result in a 3 dBA increase from operational traffic noise.

Thus, noise impacts of the proposed Project would be less than significant.

The Project site is within 0.6 miles of the Adelanto Airport, which is a small private general aviation airport (no jet aircraft). A noise contour map of the Adelanto Airport was not readily

available; however, the project site is expected to lie within the 60-65 dBA area, which is acceptable for industrial land uses. Therefore, the total operational noise levels generated by the Adelanto Airport are not expected to expose people working in the project area to excessive noise levels.

### **Analysis of Noise Significance Criteria**

This study predicts a less than significant impact in accordance with the applicable noise ordinances and General Plans. Would the project result in:

- a) *Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?*

No. As shown in the above analysis, temporary construction noise would be limited to the City's allowable construction hours and would permanently cease upon completion of construction. Aggregated average construction noise will be below the FTA noise level threshold. Therefore, temporary impacts on ambient noise levels during construction would be less than significant.

Operational noise sources for the Project, such as new HVAC equipment, are of quiet design per commercial standards. The noise from truck loading and trash and recyclables collection and compaction activities are not expected to raise the ambient noise levels for the nearest sensitive receptors. The operation of the proposed Project is not expected to double the traffic volume, therefore the noise from traffic increase will not be perceptible at the nearest sensitive receptor. Thus, long-term operational impacts on ambient noise levels would also be less than significant and no mitigation is required.

IMPACT: Less Than Significant (LTS)

- b) *Generation of excessive groundborne vibration or groundborne noise levels?*

No. Construction plans do not include intense percussive actions (e.g., hard rock-breaking, large pile-driving). The PPV at nearest structure would be well below the FTA threshold of 0.3 in/sec. The PPV at nearest structure would be well below the FTA threshold of 0.3 in/sec and the  $L_{dn}$  at nearest sensitive receptor would be well below the FTA threshold of 65 dBA. Therefore, no strong ground-borne vibrations are expected to be generated that could affect nearby structures or be noticeable to their occupants and impacts would be less than significant.

IMPACT: Less Than Significant (LTS)

- c) *For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?*

Design-Go

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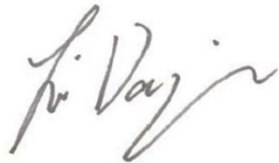
The Project site is within 0.6 miles of the Adelanto Airport, which is a small private general aviation airport (no jet aircraft). A noise contour map of the Adelanto Airport was not readily available; however, the project site is expected to lie within the 60-65 dBA area, which is acceptable for industrial land uses. Therefore, the total operational noise levels generated by the Adelanto Airport are not expected to expose people working in the project area to excessive noise levels. Therefore, the noise impacts on the proposed Project would be less than significant.

IMPACT: Less Than Significant (LTS)

## CLOSING

Thank you very much for the opportunity to be of assistance. Should you have any questions, please contact me at (949) 324-9041 (mobile) or Bradford Boyes at (805) 217-4947 (mobile).

Sincerely,



Tina Darjazanie | Long Beach Office

Senior Engineer

Yorke Engineering, LLC

[TDarjazanie@YorkeEngr.com](mailto:TDarjazanie@YorkeEngr.com)

cc: Bradford Boyes, Yorke Engineering, LLC

Enclosures/Attachments:

1. CalEEMod Outputs

Design-Go

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## ATTACHMENT 1 – CALEEMOD OUTPUTS

# Design-Go Detailed Report

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# 1. Basic Project Information

## 1.1. Basic Project Information

Data Field	Value
Project Name	Design-Go
Construction Start Date	12/9/2024
Operational Year	2026
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	2.80
Precipitation (days)	1.40
Location	34.531158430193116, -117.47068829564707
County	San Bernardino-Mojave Desert
City	Adelanto
Air District	Mojave Desert AQMD
Air Basin	Mojave Desert
TAZ	5104
EDFZ	10
Electric Utility	Southern California Edison
Gas Utility	Southwest Gas Corp.
App Version	2022.1.1.26

## 1.2. Land Use Types

Land Use Subtype	Size	Unit	Lot Acreage	Building Area (sq ft)	Landscape Area (sq ft)	Special Landscape Area (sq ft)	Population	Description
Unrefrigerated Warehouse-No Rail	2.00	1000sqft	0.05	2,000	16,342	—	—	—



General Office Building	1.50	1000sqft	0.03	1,500	0.00	—	—	—
Other Asphalt Surfaces	94.5	1000sqft	2.17	0.00	0.00	—	—	—

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

No measures selected

## 2. Emissions Summary

### 2.1. Construction Emissions Compared Against Thresholds

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

Un/Mit.	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	1.25	10.6	12.0	0.02	0.40	0.02	0.43	0.37	0.01	0.38	—	2,239	2,239	0.09	0.02	0.12	2,247
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	4.38	14.1	15.1	0.03	0.64	2.89	3.54	0.59	1.37	1.96	—	2,814	2,814	0.11	0.03	0.02	2,824
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.94	6.92	7.82	0.01	0.27	0.07	0.34	0.25	0.03	0.27	—	1,457	1,457	0.06	0.01	0.05	1,463
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.17	1.26	1.43	< 0.005	0.05	0.01	0.06	0.04	0.01	0.05	—	241	241	0.01	< 0.005	0.01	242

### 2.2. Construction Emissions by Year, Unmitigated

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

Year	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
------	-----	-----	----	-----	-------	-------	-------	--------	--------	--------	------	-------	------	-----	-----	---	------

Daily - Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	1.25	10.6	12.0	0.02	0.40	0.02	0.43	0.37	0.01	0.38	—	2,239	2,239	0.09	0.02	0.12	2,247
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	4.38	14.1	15.1	0.03	0.64	2.89	3.54	0.59	1.37	1.96	—	2,814	2,814	0.11	0.03	0.02	2,824
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	0.94	6.92	7.82	0.01	0.27	0.07	0.34	0.25	0.03	0.27	—	1,457	1,457	0.06	0.01	0.05	1,463
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	0.17	1.26	1.43	< 0.005	0.05	0.01	0.06	0.04	0.01	0.05	—	241	241	0.01	< 0.005	0.01	242

### 2.4. Operations Emissions Compared Against Thresholds

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

Un/Mit.	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.24	0.20	1.87	< 0.005	0.01	0.36	0.36	< 0.005	0.09	0.10	3.16	514	518	0.34	0.02	1.49	534
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.20	0.21	1.27	< 0.005	< 0.005	0.36	0.36	< 0.005	0.09	0.10	3.16	476	479	0.34	0.02	0.04	494
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.19	0.18	1.19	< 0.005	< 0.005	0.29	0.29	< 0.005	0.07	0.08	3.16	406	409	0.33	0.02	0.52	424
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.04	0.03	0.22	< 0.005	< 0.005	0.05	0.05	< 0.005	0.01	0.01	0.52	67.3	67.8	0.06	< 0.005	0.09	70.1

## 2.5. Operations Emissions by Sector, Unmitigated

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

Sector	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	0.12	0.18	1.70	< 0.005	< 0.005	0.36	0.36	< 0.005	0.09	0.09	—	428	428	0.01	0.02	1.49	435
Area	0.12	< 0.005	0.15	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.63	0.63	< 0.005	< 0.005	—	0.63
Energy	< 0.005	0.02	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	77.0	77.0	0.01	< 0.005	—	77.3
Water	—	—	—	—	—	—	—	—	—	—	1.40	8.35	9.75	0.14	< 0.005	—	14.4
Waste	—	—	—	—	—	—	—	—	—	—	1.77	0.00	1.77	0.18	0.00	—	6.18
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	< 0.005	< 0.005
Total	0.24	0.20	1.87	< 0.005	0.01	0.36	0.36	< 0.005	0.09	0.10	3.16	514	518	0.34	0.02	1.49	534
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	0.11	0.19	1.25	< 0.005	< 0.005	0.36	0.36	< 0.005	0.09	0.09	—	390	390	0.01	0.02	0.04	396
Area	0.09	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Energy	< 0.005	0.02	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	77.0	77.0	0.01	< 0.005	—	77.3
Water	—	—	—	—	—	—	—	—	—	—	1.40	8.35	9.75	0.14	< 0.005	—	14.4
Waste	—	—	—	—	—	—	—	—	—	—	1.77	0.00	1.77	0.18	0.00	—	6.18
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	< 0.005	< 0.005
Total	0.20	0.21	1.27	< 0.005	< 0.005	0.36	0.36	< 0.005	0.09	0.10	3.16	476	479	0.34	0.02	0.04	494
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	0.09	0.16	1.10	< 0.005	< 0.005	0.29	0.29	< 0.005	0.07	0.08	—	321	321	0.01	0.01	0.52	326
Area	0.11	< 0.005	0.08	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.31	0.31	< 0.005	< 0.005	—	0.31
Energy	< 0.005	0.02	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	77.0	77.0	0.01	< 0.005	—	77.3
Water	—	—	—	—	—	—	—	—	—	—	1.40	8.35	9.75	0.14	< 0.005	—	14.4
Waste	—	—	—	—	—	—	—	—	—	—	1.77	0.00	1.77	0.18	0.00	—	6.18

Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	< 0.005	< 0.005
Total	0.19	0.18	1.19	< 0.005	< 0.005	0.29	0.29	< 0.005	0.07	0.08	3.16	406	409	0.33	0.02	0.52	424
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	0.02	0.03	0.20	< 0.005	< 0.005	0.05	0.05	< 0.005	0.01	0.01	—	53.1	53.1	< 0.005	< 0.005	0.09	53.9
Area	0.02	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.05	0.05	< 0.005	< 0.005	—	0.05
Energy	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	12.7	12.7	< 0.005	< 0.005	—	12.8
Water	—	—	—	—	—	—	—	—	—	—	0.23	1.38	1.61	0.02	< 0.005	—	2.38
Waste	—	—	—	—	—	—	—	—	—	—	0.29	0.00	0.29	0.03	0.00	—	1.02
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	< 0.005	< 0.005
Total	0.04	0.03	0.22	< 0.005	< 0.005	0.05	0.05	< 0.005	0.01	0.01	0.52	67.3	67.8	0.06	< 0.005	0.09	70.1

### 3. Construction Emissions Details

#### 3.1. Site Preparation (2025) - Unmitigated

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

Location	ROG	NOx	CO	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 Equipment	1.19	10.9	11.0	0.03	0.47	—	0.47	0.43	—	0.43	—	2,717	2,717	0.11	0.02	—	2,726
Dust From Material Movement	—	—	—	—	—	0.62	0.62	—	0.07	0.07	—	—	—	—	—	—	—
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

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.09	0.09	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	22.3	22.3	< 0.005	< 0.005	—	22.4
Dust From Material Movement	—	—	—	—	—	0.01	0.01	—	< 0.005	< 0.005	—	—	—	—	—	—	—
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	0.02	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	3.70	3.70	< 0.005	< 0.005	—	3.71
Dust From Material Movement	—	—	—	—	—	< 0.005	< 0.005	—	< 0.005	< 0.005	—	—	—	—	—	—	—
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.03	0.04	0.42	0.00	0.00	0.10	0.10	0.00	0.02	0.02	—	96.8	96.8	< 0.005	< 0.005	0.01	98.1
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
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.82	0.82	< 0.005	< 0.005	< 0.005	0.83
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
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

Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.14	0.14	< 0.005	< 0.005	< 0.005	0.14
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
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

### 3.3. Grading (2025) - Unmitigated

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

Location	ROG	NOx	CO	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 Equipment	1.51	14.1	14.5	0.02	0.64	—	0.64	0.59	—	0.59	—	2,455	2,455	0.10	0.02	—	2,463
Dust From Material Movement	—	—	—	—	—	2.76	2.76	—	1.34	1.34	—	—	—	—	—	—	—
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.23	0.24	< 0.005	0.01	—	0.01	0.01	—	0.01	—	40.4	40.4	< 0.005	< 0.005	—	40.5
Dust From Material Movement	—	—	—	—	—	0.05	0.05	—	0.02	0.02	—	—	—	—	—	—	—
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	< 0.005	0.04	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	6.68	6.68	< 0.005	< 0.005	—	6.70
Dust From Material Movement	—	—	—	—	—	0.01	0.01	—	< 0.005	< 0.005	—	—	—	—	—	—	—
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.04	0.05	0.56	0.00	0.00	0.13	0.13	0.00	0.03	0.03	—	129	129	0.01	< 0.005	0.01	131
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
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	2.19	2.19	< 0.005	< 0.005	< 0.005	2.22
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
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.36	0.36	< 0.005	< 0.005	< 0.005	0.37
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
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

### 3.5. Building Construction (2025) - Unmitigated

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

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

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.24	10.6	11.9	0.02	0.40	—	0.40	0.37	—	0.37	—	2,201	2,201	0.09	0.02	—	2,209
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
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.24	10.6	11.9	0.02	0.40	—	0.40	0.37	—	0.37	—	2,201	2,201	0.09	0.02	—	2,209
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.75	6.39	7.15	0.01	0.24	—	0.24	0.22	—	0.22	—	1,327	1,327	0.05	0.01	—	1,331
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.14	1.17	1.30	< 0.005	0.04	—	0.04	0.04	—	0.04	—	220	220	0.01	< 0.005	—	220
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.01	0.01	0.11	0.00	0.00	0.02	0.02	0.00	< 0.005	< 0.005	—	19.3	19.3	< 0.005	< 0.005	0.07	19.5
Vendor	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	—	18.3	18.3	< 0.005	< 0.005	0.05	19.1
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
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—



Worker	0.01	0.01	0.07	0.00	0.00	0.02	0.02	0.00	< 0.005	< 0.005	—	17.0	17.0	< 0.005	< 0.005	< 0.005	17.3
Vendor	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	—	18.3	18.3	< 0.005	< 0.005	< 0.005	19.0
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	0.05	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	10.6	10.6	< 0.005	< 0.005	0.02	10.7
Vendor	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	11.0	11.0	< 0.005	< 0.005	0.01	11.5
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.75	1.75	< 0.005	< 0.005	< 0.005	1.78
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.82	1.82	< 0.005	< 0.005	< 0.005	1.90
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

### 3.7. Paving (2025) - Unmitigated

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

Location	ROG	NOx	CO	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 Equipment	0.70	6.13	8.21	0.01	0.27	—	0.27	0.25	—	0.25	—	1,244	1,244	0.05	0.01	—	1,248
Paving	0.57	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	0.02	0.17	0.23	< 0.005	0.01	—	0.01	0.01	—	0.01	—	34.1	34.1	< 0.005	< 0.005	—	34.2
Paving	0.02	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	0.03	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	5.64	5.64	< 0.005	< 0.005	—	5.66
Paving	< 0.005	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.07	0.08	0.84	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	194	194	0.01	0.01	0.02	196
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
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	0.03	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	5.46	5.46	< 0.005	< 0.005	0.01	5.54
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
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.90	0.90	< 0.005	< 0.005	< 0.005	0.92
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
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

### 3.9. Architectural Coating (2025) - Unmitigated

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

Location	ROG	NOx	CO	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 Equipment	0.13	0.88	1.14	< 0.005	0.03	—	0.03	0.03	—	0.03	—	134	134	0.01	< 0.005	—	134
Architectural Coatings	4.25	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	0.02	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	3.66	3.66	< 0.005	< 0.005	—	3.67
Architectural Coatings	0.12	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.61	0.61	< 0.005	< 0.005	—	0.61
Architectural Coatings	0.02	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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

Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.41	3.41	< 0.005	< 0.005	< 0.005	3.45
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
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.10	0.10	< 0.005	< 0.005	< 0.005	0.10
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
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
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
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

## 4. Operations Emissions Details

### 4.1. Mobile Emissions by Land Use

#### 4.1.1. Unmitigated

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

Land Use	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Unrefrige Warehouse-No Rail	0.02	0.03	0.33	< 0.005	< 0.005	0.07	0.07	< 0.005	0.02	0.02	—	82.4	82.4	< 0.005	< 0.005	0.29	83.7
General Office Building	0.10	0.14	1.37	< 0.005	< 0.005	0.29	0.29	< 0.005	0.07	0.08	—	346	346	0.01	0.01	1.20	351
Other Asphalt Surfaces	0.00	0.00	0.00	0.00	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	0.12	0.18	1.70	< 0.005	< 0.005	0.36	0.36	< 0.005	0.09	0.09	—	428	428	0.01	0.02	1.49	435
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrige rated Warehouse-No Rail	0.02	0.04	0.24	< 0.005	< 0.005	0.07	0.07	< 0.005	0.02	0.02	—	75.1	75.1	< 0.005	< 0.005	0.01	76.1
General Office Building	0.09	0.15	1.01	< 0.005	< 0.005	0.29	0.29	< 0.005	0.07	0.08	—	315	315	0.01	0.01	0.03	320
Other Asphalt Surfaces	0.00	0.00	0.00	0.00	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	0.11	0.19	1.25	< 0.005	< 0.005	0.36	0.36	< 0.005	0.09	0.09	—	390	390	0.01	0.02	0.04	396
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrige rated Warehouse-No Rail	< 0.005	0.01	0.05	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	12.7	12.7	< 0.005	< 0.005	0.02	12.9
General Office Building	0.01	0.02	0.15	< 0.005	< 0.005	0.04	0.04	< 0.005	0.01	0.01	—	40.4	40.4	< 0.005	< 0.005	0.07	41.0
Other Asphalt Surfaces	0.00	0.00	0.00	0.00	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	0.02	0.03	0.20	< 0.005	< 0.005	0.05	0.05	< 0.005	0.01	0.01	—	53.1	53.1	< 0.005	< 0.005	0.09	53.9
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## 4.2. Energy

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

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

Land Use	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrigerated Warehouse-No Rail	—	—	—	—	—	—	—	—	—	—	—	13.5	13.5	< 0.005	< 0.005	—	13.5
General Office Building	—	—	—	—	—	—	—	—	—	—	—	38.2	38.2	< 0.005	< 0.005	—	38.3
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	—	51.6	51.6	< 0.005	< 0.005	—	51.8
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrigerated Warehouse-No Rail	—	—	—	—	—	—	—	—	—	—	—	13.5	13.5	< 0.005	< 0.005	—	13.5
General Office Building	—	—	—	—	—	—	—	—	—	—	—	38.2	38.2	< 0.005	< 0.005	—	38.3

Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	—	51.6	51.6	< 0.005	< 0.005	—	51.8
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrigerated Warehouse-No Rail	—	—	—	—	—	—	—	—	—	—	—	2.23	2.23	< 0.005	< 0.005	—	2.24
General Office Building	—	—	—	—	—	—	—	—	—	—	—	6.32	6.32	< 0.005	< 0.005	—	6.34
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	—	8.55	8.55	< 0.005	< 0.005	—	8.58

4.2.3. Natural Gas Emissions By Land Use - Unmitigated

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

Land Use	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrigerated Warehouse-No Rail	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	12.2	12.2	< 0.005	< 0.005	—	12.2
General Office Building	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	13.2	13.2	< 0.005	< 0.005	—	13.2
Other Asphalt Surfaces	0.00	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	< 0.005	0.02	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	25.4	25.4	< 0.005	< 0.005	—	25.4
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrigerated Warehouse-No Rail	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	12.2	12.2	< 0.005	< 0.005	—	12.2
General Office Building	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	13.2	13.2	< 0.005	< 0.005	—	13.2
Other Asphalt Surfaces	0.00	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	< 0.005	0.02	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	25.4	25.4	< 0.005	< 0.005	—	25.4
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrigerated Warehouse-No Rail	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	2.02	2.02	< 0.005	< 0.005	—	2.02
General Office Building	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	2.18	2.18	< 0.005	< 0.005	—	2.19
Other Asphalt Surfaces	0.00	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	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.20	4.20	< 0.005	< 0.005	—	4.21

### 4.3. Area Emissions by Source

#### 4.3.1. Unmitigated

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

Source	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
--------	-----	-----	----	-----	-------	-------	-------	--------	--------	--------	------	-------	------	-----	-----	---	------



Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Consumer Products	0.08	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	0.01	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	0.02	< 0.005	0.15	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.63	0.63	< 0.005	< 0.005	—	0.63
Total	0.12	< 0.005	0.15	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.63	0.63	< 0.005	< 0.005	—	0.63
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Consumer Products	0.08	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	0.01	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	0.09	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Consumer Products	0.02	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	< 0.005	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	< 0.005	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.05	0.05	< 0.005	< 0.005	—	0.05
Total	0.02	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.05	0.05	< 0.005	< 0.005	—	0.05

### 4.4. Water Emissions by Land Use

#### 4.4.1. Unmitigated

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

Land Use	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrigerated Warehouse-No Rail	—	—	—	—	—	—	—	—	—	—	0.89	6.12	7.00	0.09	< 0.005	—	9.94
General Office Building	—	—	—	—	—	—	—	—	—	—	0.51	2.24	2.75	0.05	< 0.005	—	4.44
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	1.40	8.35	9.75	0.14	< 0.005	—	14.4
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrigerated Warehouse-No Rail	—	—	—	—	—	—	—	—	—	—	0.89	6.12	7.00	0.09	< 0.005	—	9.94
General Office Building	—	—	—	—	—	—	—	—	—	—	0.51	2.24	2.75	0.05	< 0.005	—	4.44
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	1.40	8.35	9.75	0.14	< 0.005	—	14.4

Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrigerated Warehouse-No Rail	—	—	—	—	—	—	—	—	—	—	0.15	1.01	1.16	0.02	< 0.005	—	1.65
General Office Building	—	—	—	—	—	—	—	—	—	—	0.08	0.37	0.45	0.01	< 0.005	—	0.73
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	0.23	1.38	1.61	0.02	< 0.005	—	2.38

### 4.5. Waste Emissions by Land Use

#### 4.5.1. Unmitigated

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

Land Use	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrigerated Warehouse-No Rail	—	—	—	—	—	—	—	—	—	—	1.01	0.00	1.01	0.10	0.00	—	3.54
General Office Building	—	—	—	—	—	—	—	—	—	—	0.75	0.00	0.75	0.08	0.00	—	2.63
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	1.77	0.00	1.77	0.18	0.00	—	6.18

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrigerated Warehouse-No Rail	—	—	—	—	—	—	—	—	—	—	1.01	0.00	1.01	0.10	0.00	—	3.54
General Office Building	—	—	—	—	—	—	—	—	—	—	0.75	0.00	0.75	0.08	0.00	—	2.63
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	1.77	0.00	1.77	0.18	0.00	—	6.18
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unrefrigerated Warehouse-No Rail	—	—	—	—	—	—	—	—	—	—	0.17	0.00	0.17	0.02	0.00	—	0.59
General Office Building	—	—	—	—	—	—	—	—	—	—	0.12	0.00	0.12	0.01	0.00	—	0.44
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	0.29	0.00	0.29	0.03	0.00	—	1.02

### 4.6. Refrigerant Emissions by Land Use

#### 4.6.1. Unmitigated

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

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

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Office Building	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	< 0.005	< 0.005
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	< 0.005	< 0.005
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Office Building	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	< 0.005	< 0.005
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	< 0.005	< 0.005
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Office Building	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	< 0.005	< 0.005
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	< 0.005	< 0.005

### 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)

Equipment Type	ROG	NOx	CO	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

### 4.8. Stationary Emissions By Equipment Type

#### 4.8.1. Unmitigated

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

Equipment Type	ROG	NOx	CO	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

### 4.9. 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)

Equipment Type	ROG	NOx	CO	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. 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)

Vegetation	ROG	NOx	CO	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

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

Land Use	ROG	NOx	CO	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.3. Avoided and Sequestered Emissions by Species - Unmitigated

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

Species	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—



Remove	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

## 5. Activity Data

### 5.1. Construction Schedule

Phase Name	Phase Type	Start Date	End Date	Days Per Week	Work Days per Phase	Phase Description
Site Preparation	Site Preparation	1/7/2025	1/11/2025	5.00	3.00	—
Grading	Grading	1/12/2025	1/20/2025	5.00	6.00	—
Building Construction	Building Construction	1/21/2025	11/25/2025	5.00	220	—
Paving	Paving	11/26/2025	12/10/2025	5.00	10.0	—
Architectural Coating	Architectural Coating	12/11/2025	12/25/2025	5.00	10.0	—

### 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
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Site Preparation	Graders	Diesel	Average	1.00	8.00	148	0.41
Site Preparation	Scrapers	Diesel	Average	1.00	8.00	423	0.48
Site Preparation	Tractors/Loaders/Back hoes	Diesel	Average	1.00	7.00	84.0	0.37
Grading	Graders	Diesel	Average	1.00	8.00	148	0.41
Grading	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
Grading	Tractors/Loaders/Back hoes	Diesel	Average	2.00	7.00	84.0	0.37
Building Construction	Cranes	Diesel	Average	1.00	8.00	367	0.29
Building Construction	Forklifts	Diesel	Average	2.00	7.00	82.0	0.20
Building Construction	Generator Sets	Diesel	Average	1.00	8.00	14.0	0.74
Building Construction	Tractors/Loaders/Back hoes	Diesel	Average	1.00	6.00	84.0	0.37
Building Construction	Welders	Diesel	Average	3.00	8.00	46.0	0.45
Paving	Cement and Mortar Mixers	Diesel	Average	1.00	8.00	10.0	0.56
Paving	Pavers	Diesel	Average	1.00	8.00	81.0	0.42
Paving	Paving Equipment	Diesel	Average	1.00	8.00	89.0	0.36
Paving	Rollers	Diesel	Average	2.00	8.00	36.0	0.38
Paving	Tractors/Loaders/Back hoes	Diesel	Average	1.00	8.00	84.0	0.37
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
Site Preparation	—	—	—	—
Site Preparation	Worker	7.50	18.5	LDA,LDT1,LDT2
Site Preparation	Vendor	—	10.2	HHDT,MHDT

Site Preparation	Hauling	0.00	20.0	HHDT
Site Preparation	Onsite truck	—	—	HHDT
Grading	—	—	—	—
Grading	Worker	10.0	18.5	LDA,LDT1,LDT2
Grading	Vendor	—	10.2	HHDT,MHDT
Grading	Hauling	0.00	20.0	HHDT
Grading	Onsite truck	—	—	HHDT
Building Construction	—	—	—	—
Building Construction	Worker	1.32	18.5	LDA,LDT1,LDT2
Building Construction	Vendor	0.57	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	0.26	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

Control Strategies Applied	PM10 Reduction	PM2.5 Reduction
Water unpaved roads twice daily	55%	55%

Limit vehicle speeds on unpaved roads to 25 mph	44%	44%
Sweep paved roads once per month	9%	9%

### 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	5,250	1,750	5,671

### 5.6. Dust Mitigation

#### 5.6.1. Construction Earthmoving Activities

Phase Name	Material Imported (cy)	Material Exported (cy)	Acres Graded (acres)	Material Demolished (sq. ft.)	Acres Paved (acres)
Site Preparation	—	—	4.50	0.00	—
Grading	—	—	6.00	0.00	—
Paving	0.00	0.00	0.00	0.00	2.17

#### 5.6.2. Construction Earthmoving Control Strategies

Control Strategies Applied	Frequency (per day)	PM10 Reduction	PM2.5 Reduction
Water Exposed Area	2	61%	61%

### 5.7. Construction Paving

Land Use	Area Paved (acres)	% Asphalt
Unrefrigerated Warehouse-No Rail	0.00	0%
General Office Building	0.00	0%
Other Asphalt Surfaces	2.17	100%

### 5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2025	0.00	532	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
Unrefrigerated Warehouse-No Rail	3.48	3.48	3.48	1,270	98.0	98.0	98.0	35,755
General Office Building	14.6	3.32	1.05	4,037	411	93.3	29.6	113,628
Other Asphalt Surfaces	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

5.10.2. 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	5,250	1,750	5,671

5.10.3. Landscape Equipment

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)
Unrefrigerated Warehouse-No Rail	9,237	532	0.0330	0.0040	38,021
General Office Building	26,178	532	0.0330	0.0040	41,160
Other Asphalt Surfaces	0.00	532	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)
Unrefrigerated Warehouse-No Rail	462,500	361,788
General Office Building	266,601	0.00
Other Asphalt Surfaces	0.00	0.00

### 5.13. Operational Waste Generation

#### 5.13.1. Unmitigated

Land Use	Waste (ton/year)	Cogeneration (kWh/year)
Unrefrigerated Warehouse-No Rail	1.88	—
General Office Building	1.40	—
Other Asphalt Surfaces	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
General Office Building	Household refrigerators and/or freezers	R-134a	1,430	0.02	0.60	0.00	1.00
General Office Building	Other commercial A/C and heat pumps	R-410A	2,088	< 0.005	4.00	4.00	18.0

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
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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
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5.16.2. Process Boilers

Equipment Type	Fuel Type	Number	Boiler Rating (MMBtu/hr)	Daily Heat Input (MMBtu/day)	Annual Heat Input (MMBtu/yr)
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5.17. User Defined

Equipment Type	Fuel Type
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5.18. Vegetation

5.18.1. Land Use Change

5.18.1.1. Unmitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres
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5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres
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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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## 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	32.2	annual days of extreme heat
Extreme Precipitation	1.90	annual days with precipitation above 20 mm
Sea Level Rise	—	meters of inundation depth
Wildfire	9.25	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 ¾ 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, 1.0 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	4	0	0	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	0	0	0	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	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	4	1	1	4
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	1	1	1	2
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	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 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	84.6
AQ-PM	6.97
AQ-DPM	3.24
Drinking Water	60.3
Lead Risk Housing	43.3
Pesticides	43.5
Toxic Releases	26.0
Traffic	5.26
Effect Indicators	—
CleanUp Sites	88.3
Groundwater	71.8
Haz Waste Facilities/Generators	94.4
Impaired Water Bodies	51.2
Solid Waste	72.4
Sensitive Population	—
Asthma	88.1

Cardio-vascular	99.6
Low Birth Weights	64.2
Socioeconomic Factor Indicators	—
Education	84.8
Housing	77.6
Linguistic	69.8
Poverty	93.2
Unemployment	88.7

### 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	5.838573078
Employed	0.179648402
Median HI	1.424355191
Education	—
Bachelor's or higher	10.07314256
High school enrollment	100
Preschool enrollment	10.97138458
Transportation	—
Auto Access	34.2871808
Active commuting	2.399589375
Social	—
2-parent households	21.86577698
Voting	16.77146157
Neighborhood	—
Alcohol availability	93.53265751

Park access	6.877967407
Retail density	4.504042089
Supermarket access	2.399589375
Tree canopy	0.089824201
Housing	—
Homeownership	43.48774541
Housing habitability	26.22866675
Low-inc homeowner severe housing cost burden	67.79160785
Low-inc renter severe housing cost burden	0.295136661
Uncrowded housing	44.92493263
Health Outcomes	—
Insured adults	12.17759528
Arthritis	2.7
Asthma ER Admissions	7.4
High Blood Pressure	6.0
Cancer (excluding skin)	32.7
Asthma	1.7
Coronary Heart Disease	2.7
Chronic Obstructive Pulmonary Disease	0.4
Diagnosed Diabetes	6.3
Life Expectancy at Birth	15.8
Cognitively Disabled	24.2
Physically Disabled	71.5
Heart Attack ER Admissions	1.0
Mental Health Not Good	3.8
Chronic Kidney Disease	5.2
Obesity	15.0
Pedestrian Injuries	19.6

Physical Health Not Good	2.6
Stroke	3.3
Health Risk Behaviors	—
Binge Drinking	73.8
Current Smoker	0.7
No Leisure Time for Physical Activity	11.4
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	19.0
Elderly	85.6
English Speaking	37.4
Foreign-born	40.5
Outdoor Workers	7.2
Climate Change Adaptive Capacity	—
Impervious Surface Cover	88.7
Traffic Density	5.6
Traffic Access	23.0
Other Indices	—
Hardship	87.5
Other Decision Support	—
2016 Voting	26.9

### 7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	89.0
Healthy Places Index Score for Project Location (b)	1.00
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	Yes

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.  
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.

### 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

Screen	Justification
Construction: Construction Phases	Vacant site, no demolition