APPENDIX 1.1

CEQA Notices

CITY OF VERNON

4305 S. Santa Fe Avenue, Vernon, CA 90058
Main: (323) 583-8811| Fax: (323) 826-1486| www.cityofvernon.org/home

---

Notice of Preparation
Draft Environmental Impact Report and
Public Scoping Meeting for the
Vernon Westside Specific Plan

TO: Agencies, Organizations, and Interested Parties **DATE:** April 20, 2022

The City of Vernon (City), as the Lead Agency under the California Environmental Quality Act (CEQA), is preparing an Environmental Impact Report (EIR) for the proposed Vernon Westside Specific Plan (Proposed Specific Plan). The City is requesting identification of environmental issues and information that you or your organization believes should be considered in the EIR. The City is also conducting a Scoping Meeting for this Proposed Specific Plan as further described below. The Proposed Specific Plan would include the development of a Specific Plan to guide future growth in the western portion of the City.

PROJECT LOCATION

The Plan Area includes approximately 840 acres located in the western portion of the City of Vernon five miles south of downtown Los Angeles, California, as shown in **Figure 1, Regional Context**. The Plan Area roughly corresponds to a 1.75 by 0.75-mile area bound generally to the north by 27th Street; to the east by the Burlington Northern Santa Fe Railroad and Pacific Boulevard; to the south by Slauson Avenue; and to the west by Alameda Corridor, as shown in **Figure 2, Plan Area**.

The Plan Area is served by the Metro A line Vernon Station and Slauson Station, both located one block west of the Plan Area. The northern portion of the Plan Area is located approximately one-half mile from the I-10 Freeway, providing access to greater Los Angeles region.

The City of Vernon is bordered by the City of Los Angeles to the north and west; Huntington Park, Bell, and Maywood to the South; Commerce to the East; and East Los Angeles to the northeast. The Plan area is in proximity to several rapidly changing areas of Los Angeles. The Plan area is adjacent to the Downtown Los Angeles Warehouse District, and the Arts District has been steadily expanding toward the Plan Area.

PROJECT DESCRIPTION

The Proposed Specific Plan is the preparation of a Specific Plan to spur development of people-centric environments that attract talent and stimulate innovation in the western portion of the City.

The purpose of the Proposed Specific Plan is to reinvigorate the City's competitive advantage as a center of production; strengthen and provide long-term stability to the City's fiscal position; increase the residential population; diversify and reorient the Westside's land uses to take advantage of changes in the economic landscape of Southern California; increase amenities available to local residents and workers; and create a physical environmental that is supportive of diverse land uses, welcoming to the larger region, and enhancing to the City's image and identity.

The Proposed Specific Plan, land use, zoning, and street improvement changes will be established to facilitate new community supporting development. In general, the Proposed Specific Plan land use plan:

- Identifies certain clusters of existing buildings with redevelopment potential and identifies catalytic sites within the clusters to undertake mixed-use development, including:
    - **Cluster 1 (South Santa Fe District):** This cluster is located in the southern portion of the Plan Area and holds creative office buildings and retail uses along with the prevailing industrial development. The Proposed Specific Plan will identify this stretch of Santa Fe Avenue for roadway improvements and live/work, multifamily residential, retail, production retail and creative office development.
    - **Cluster 3 (Civic Center/Santa Fe North):** This cluster is in the northern portion of the Plan Area and is primarily composed of light industrial and commercial uses, and includes the Vernon Civic Center, single-family residential buildings, and religious uses. Many of the existing buildings are older and some have been adapted into light manufacturing, distribution, and office uses. The Plan identifies the intersection of Santa Fe Avenue, Pacific Avenue, and Vernon Avenue to be transformed into a Civic Center, creating a node of office, retail, and residential. The Plan also proposes roadway and streetscape improvements to Santa Fe Avenue.
- Strengthens Santa Fe Avenue as a walkable Main Street that connects clusters and is suitable for a greater diversity of land uses. Proposed changes include eliminating the center turn lane and replacing it with on-street parking; adding large canopy shade trees; improve pedestrian crossings; and separate bike lanes.

- Redirects truck traffic: Create a truck route system which guides most heavy truck traffic off Santa Fe Avenue and improve Alameda East as a primary, functional truck route for the Westside through signal timing and infrastructure changes.

- Provides a streetscape and open spaces framework for connecting catalytic sites and clusters, other development sites, and regional active and public transportation connections.

The Proposed Specific Plan is being developed as part of the implementation of the 2021-2029 Housing Element (currently in draft form) and was included as Program 8: Westside Specific Plan.

ISSUES TO BE ADDRESSED IN THE EIR

Based on the project description and the Lead Agency's understanding of the environmental issues associated with the Proposed Specific Plan, it is anticipated that implementation of the Proposed Specific Plan has the potential to result in significant environmental effects associated with some or all of the following topics, consistent with Appendix G of the *CEQA Guidelines* and analyzed in detail in the EIR:

- Aesthetics
- Air Quality
- Cultural Resources
- Greenhouse Gas Emissions
- Hazards and Hazardous Materials
- Hydrology and Water Quality
- Land Use and Planning
- Noise
- Population and Housing
- Public Services and Recreation
- Transportation
- Tribal Cultural Resources
- Utilities and Service Systems (including Energy)

The EIR will analyze the reasonably foreseeable indirect physical changes to the environment in the above topic areas caused by the Proposed Specific Plan. The City does not anticipate impacts in the following categories and as such, those impacts will not be discussed in detail in the EIR: Agriculture and Forestry Resources, Biological Resources, Geology and Soils, Mineral Resources, and Wildfire. Pursuant to *CEQA Guidelines* Section 15060(d), no initial study was prepared.

Alternatives to be analyzed in the EIR are to be defined and analyzed consistent with the requirements of *CEQA Guidelines*, Section 15126.6. The specific alternatives to be evaluated in the EIR may include, but are not limited to, the "No Project" Alternative, as required by CEQA and alternative land use configurations.

NOTICE OF PUBLIC SCOPING MEETING

Pursuant to California Public Resources Code Sections 21083.9, 21092.2, and California Code of Regulations, Title 14 (*CEQA Guidelines*) Sections 15082 and 15083, the City, as the Lead Agency, will conduct a Scoping Meeting for the purpose of soliciting oral and written comments from interested parties

requesting notice; responsible agencies; agencies with jurisdiction by law; trustee agencies; and involved federal agencies, including transportation agencies, as to the appropriate scope and content of the EIR.

The Scoping Meeting is scheduled as follows:

> **Date:** Wednesday, May 04, 2022 | Time: 9:00 A.M. Pacific Time
> **Zoom Link:**
> https://us02web.zoom.us/j/87605880654
> Webinar ID: 876 0588 0654
> Call in: 1-669-900-6833

ALL INTERESTED PARTIES ARE INVITED TO ATTEND THE PUBLIC SCOPING MEETING TO ASSIST IN IDENTIFYING ISSUES TO BE ADDRESSED IN THE EIR. ATTENDEES WILL HAVE AN OPPORTUNITY TO PROVIDE INPUT TO THE CITY OF VERNON AND CONSULTANT TEAM PREPARING THE EIR.

RESPONSIBLE AND TRUSTEE AGENCIES

The City requests your agency's views on the scope and content of the environmental information relevant to your agency's statutory responsibilities in connection with the Proposed Specific Plan, in accordance with *CEQA Guidelines* Section 15082(b). Your agency will need to use the EIR prepared by the City when considering any permits or other project approvals that your agency must issue. As such, your responses to this Notice of Preparation (NOP), at a minimum, should identify: (1) significant environmental issues and reasonable alternatives and mitigation measures that your agency will need to have explored in the EIR; and (2) whether your agency will be a responsible or trustee agency for this project.

REVIEW AND RESPONSE PERIOD

In accordance with *CEQA Guidelines* Section 15082, this NOP is being circulated for a 30-day comment period. Responses to this NOP must be provided during this response period as outlined below:

Wednesday, April 20, 2022, through Friday, May 20, 2022

DOCUMENT AVAILABILITY

A hardcopy of the NOP will be available at Vernon City Hall, 4305 S. Santa Fe Avenue, Vernon, CA 90058. In addition, a copy can be viewed at the project website (ReimagineVernon.com). For more information about the Vernon Westside Specific Plan, please visit the project website.

SUBMITTAL OF WRITTEN COMMENTS

The Lead Agency solicits comments regarding the scope, content, and specificity of the EIR from all interested parties requesting notice, responsible agencies, agencies with jurisdiction by law, trustee agencies, and involved agencies. The City of Vernon requests that written comments be provided at the earliest possible date, but **no later than Friday, May 20, 2022.**

Please submit comments electronically through the project website or send a hard copy via mail (including name and contact information) to the following:

Project Website: ReimagineVernon.com

Mail:

ATTN: Daniel Wall
City of Vernon
4305 S. Santa Fe Avenue
Vernon, CA 90058

30-DAY NOP COMMENT PERIOD:	**SCOPING MEETING:**
April 20, 2022, through May 20, 2022	**Date:** May 4, 2022 **Time:** 9:00 A.M. Pacific Time **Zoom Link:** *see above*

Attachments:

- Figure 1, Regional Context
- Figure 2, Plan Area

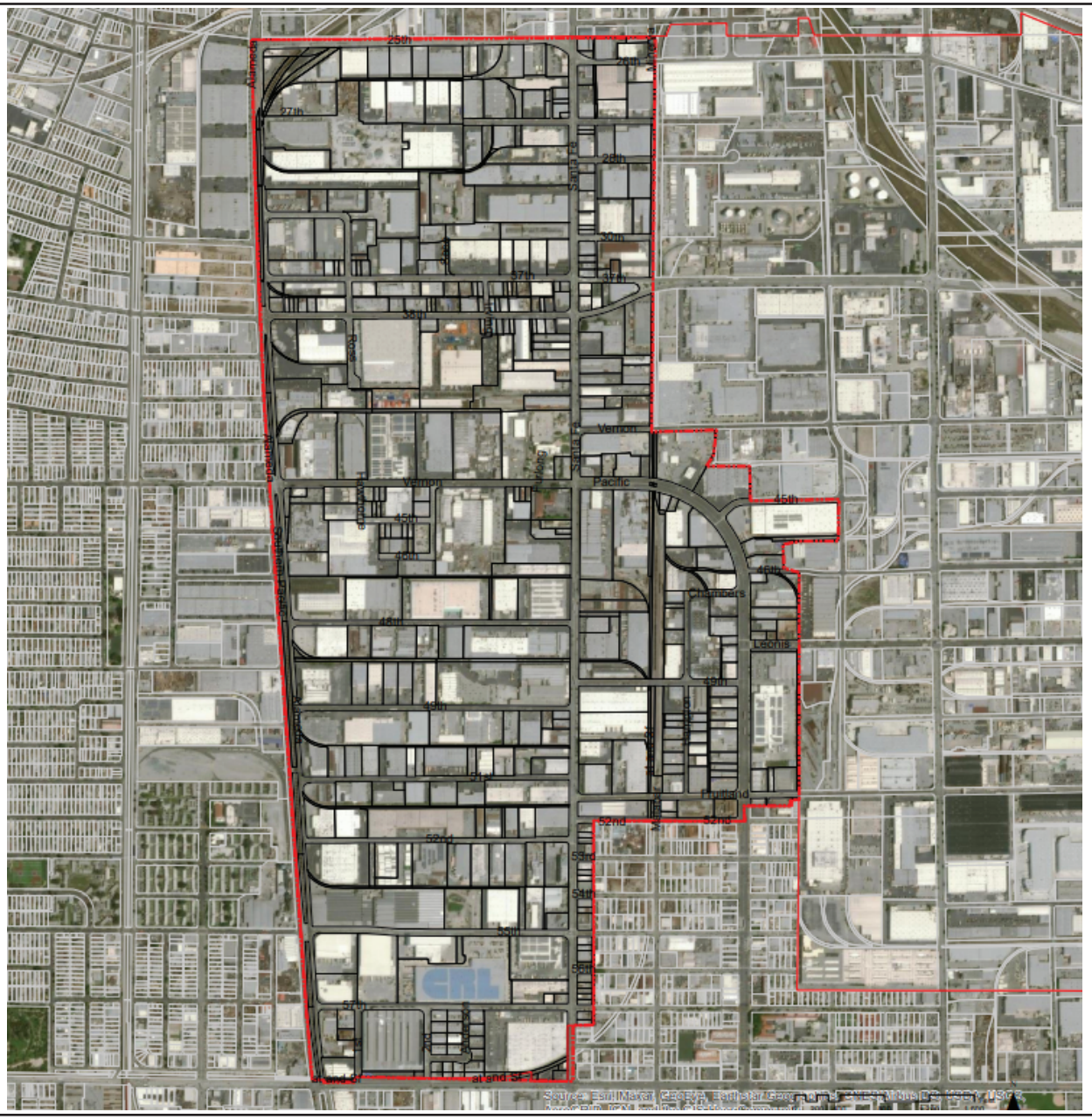
SOURCE: Google Earth, 2020

FIGURE 1

IMPACT SCIENCES

Regional Context

1335.003•03/22



SOURCE: Google Earth, 2020

FIGURE **2**

IMPACT SCIENCES

Plan Area

1335.003•03/22

Response Letter

DEPARTMENT OF TRANSPORTATION
District 7 – Office of Regional Planning
100 S. MAIN STREET, MS 16
LOS ANGELES, CA 90012
PHONE (213) 266-3562
FAX (213) 897-1337
TTY 711
www.dot.ca.gov

Making Conservation a California Way of Life.

May 19, 2022

Daniel Wall
City of Vernon
4305 S. Santa Fe Avenue
Vernon CA, 90058

RE: Vernon Westside Specific Plan – Notice of Preparation of an Environmental Impact Report (NOP)
SCH # 2022040458
GTS # 07-LA-2022-03923

Dear Daniel Wall:

Thank you for including the California Department of Transportation (Caltrans) in the environmental review process for the above referenced NOP. The Proposed Specific Plan is the preparation of a Specific Plan to spur development of people-centric environments that attract talent and stimulate innovation in the western portion of the City of Vernon. The purpose is to reinvigorate the City's competitive advantage as a center of production; strengthen and provide long-term stability to the City's fiscal position; increase the residential population; diversify and reorient the Westside's land uses to take advantage of changes in the economic landscape of Southern California; increase amenities available to local residents and workers; and create a physical environmental that is supportive of diverse land uses, welcoming to the larger region, and enhancing to the City's image and identity. The Proposed Specific Plan is being developed as part of the implementation of the 2021-2029 Housing Element (currently in draft form) and was included as Program 8: Westside Specific Plan. The City of Vernon is the Lead Agency under the California Environmental Quality Act (CEQA).

The Plan Area includes approximately 840 acres located in the western portion of the City of Vernon five miles south of downtown Los Angeles, California.

According to the NOP, it is anticipated that implementation of the Proposed Specific Plan has the potential to result in significant environmental effects to certain topics, including to Transportation, associated with Appendix G of the CEQA Guidelines. Thus, these will be analyzed in detail in the Environmental Impact Report (EIR).

Additionally, Caltrans would request the study of the State facilities on/off-ramps and any arising inadequate weaving or queue spillback onto State facilities. We look forward to reviewing these analyses.

As a reminder, Senate Bill 743 (2013) mandates that Vehicle Miles Traveled (VMT) be used as the primary metric in identifying transportation impacts of all future projects under CEQA, starting July 1, 2020. For information on determining transportation impacts in terms of VMT on

the State Highway System, see the Technical Advisory on Evaluating Transportation Impacts in CEQA by the California Governor's Office of Planning and Research (OPR), dated December 2018. Caltrans has published the VMT-focused Transportation Impact Study Guide (TISG), dated May 20, 2020, and the Caltrans Interim Local Development and Intergovernmental Review (LD-IGR) Safety Review Practitioners Guidance, prepared on December 18, 2020. Caltrans' new TISG is largely based on the OPR 2018 Technical Advisory. You can review these resources online at:

- http://opr.ca.gov/docs/20190122-743_Technical_Advisory.pdf
- https://dot.ca.gov/-/media/dot-media/programs/transportation-planning/documents/sb743/2020-05-20-approved-vmt-focused-tisg-a11y.pdf
- https://dot.ca.gov/-/media/dot-media/programs/transportation-planning/documents/sb743/2020-12-22-updated-interim-ldigr-safety-review-guidance-a11y.pdf

We encourage the Lead Agency to evaluate the potential of Transportation Demand Management (TDM) strategies and Intelligent Transportation System (ITS) applications to better manage the transportation network, as well as transit service and bicycle or pedestrian connectivity improvements. For TDM strategies, please refer to the Federal Highway Administration's Integrating Demand Management into the Transportation Planning Process: A Desk Reference (Chapter 8). This reference is available online at: http://www.ops.fhwa.dot.gov/publications/fhwahop12035/fhwahop12035.pdf

Caltrans also encourages Lead Agencies to promote alternative transportation. This will increase accessibility and decrease Greenhouse Gas Emissions, which supports Caltrans' mission to provide a safe and reliable transportation network that serves all people and respects the environment. For additional strategies that will promote equity and environmental preservation, please refer to the 2010 Quantifying Greenhouse Gas Mitigation Measures report by the California Air Pollution Control Officers Association (CAPCOA), which is available online at: http://www.capcoa.org/wp-content/uploads/2010/11/CAPCOA-Quantification-Report-9-14-Final.pdf

If you have any questions regarding these comments, please contact Ronnie Escobar, the project coordinator, at Ronnie.Escobar@dot.ca.gov, and refer to GTS # 07-LA-2022-03923.

Sincerely,

Miya Edmonson

MIYA EDMONSON
LDR/CEQA Branch Chief

cc: State Clearinghouse

APPENDIX 3.2

Air Quality and Greenhouse Gas Data

Vernon Westside Specific Plan - Construction Scenario 1 Detailed Report

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Vernon Westside Specific Plan - Construction Scenario 1
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	0.50
Precipitation (days)	18.4
Location	34.003958357842265, -118.23024627183685
County	Los Angeles-South Coast
City	Vernon
Air District	South Coast AQMD
Air Basin	South Coast
TAZ	4117
EDFZ	7
Electric Utility	City of Vernon Municipal Light Department
Gas Utility	City of Vernon Gas System

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
Other Non-Asphalt Surfaces	35.0	1000sqft	0.80	0.00	0.00	—	—	—
Parking Lot	15.0	1000sqft	0.34	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.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	2.06	7.20	17.8	14.5	0.03	0.75	3.37	4.12	0.69	1.49	2.18	—	3,874	3,874	0.19	0.30	0.12	3,969
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.03	0.06	0.21	0.20	< 0.005	0.01	0.02	0.03	0.01	0.01	0.02	—	42.7	42.7	< 0.005	< 0.005	0.02	43.3
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	< 0.005	0.01	0.04	0.04	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	—	7.07	7.07	< 0.005	< 0.005	< 0.005	7.17

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily - Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2023	2.06	7.20	17.8	14.5	0.03	0.75	3.37	4.12	0.69	1.49	2.18	—	3,874	3,874	0.19	0.30	0.12	3,969

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2023	0.03	0.06	0.21	0.20	< 0.005	0.01	0.02	0.03	0.01	0.01	0.02	—	42.7	42.7	< 0.005	< 0.005	0.02	43.3
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2023	< 0.005	0.01	0.04	0.04	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	—	7.07	7.07	< 0.005	< 0.005	< 0.005	7.17

3. Construction Emissions Details

3.1. Demolition (2023) - Unmitigated

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

Location	TOG	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	1.52	1.27	12.8	11.2	0.02	0.58	—	0.58	0.53	—	0.53	—	1,668	1,668	0.07	0.01	—	1,674
Demolition	—	—	—	—	—	—	0.00	0.00	—	0.00	0.00	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.07	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	9.14	9.14	< 0.005	< 0.005	—	9.17
Demolition	—	—	—	—	—	—	0.00	0.00	—	0.00	0.00	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.51	1.51	< 0.005	< 0.005	—	1.52
Demolition	—	—	—	—	—	—	0.00	0.00	—	0.00	0.00	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.06	0.05	0.06	0.69	0.00	0.00	0.01	0.01	0.00	0.00	0.00	—	137	137	0.01	< 0.005	0.02	138
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.76	0.76	< 0.005	< 0.005	< 0.005	0.77
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.13	0.13	< 0.005	< 0.005	< 0.005	0.13
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.3. Grading (2023) - Unmitigated

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

Location	TOG	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	1.86	1.56	15.3	12.9	0.02	0.73	—	0.73	0.67	—	0.67	—	1,945	1,945	0.08	0.02	—	1,952
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	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.08	0.07	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	10.7	10.7	< 0.005	< 0.005	—	10.7
Dust From Material Movement	—	—	—	—	—	—	0.02	0.02	—	0.01	0.01	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.76	1.76	< 0.005	< 0.005	—	1.77
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	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.06	0.05	0.06	0.69	0.00	0.00	0.01	0.01	0.00	0.00	0.00	—	137	137	0.01	< 0.005	0.02	138
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.14	0.04	2.39	0.88	0.01	0.02	0.14	0.17	0.02	0.04	0.07	—	1,792	1,792	0.11	0.28	0.11	1,879
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.76	0.76	< 0.005	< 0.005	< 0.005	0.77
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.81	9.81	< 0.005	< 0.005	0.01	10.3
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.13	0.13	< 0.005	< 0.005	< 0.005	0.13
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.62	1.62	< 0.005	< 0.005	< 0.005	1.71

3.5. Building Construction (2023) - Unmitigated

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

Location	TOG	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	0.58	0.49	5.05	4.25	0.01	0.22	—	0.22	0.20	—	0.20	—	1,143	1,143	0.05	0.01	—	1,147

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	6.26	6.26	< 0.005	< 0.005	—	6.28
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.04	1.04	< 0.005	< 0.005	—	1.04
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.06	0.05	0.06	0.69	0.00	0.00	0.01	0.01	0.00	0.00	0.00	—	137	137	0.01	< 0.005	0.02	138
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.76	0.76	< 0.005	< 0.005	< 0.005	0.77
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.13	0.13	< 0.005	< 0.005	< 0.005	0.13
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.7. Paving (2023) - Unmitigated

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

Location	TOG	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	0.23	0.19	2.04	2.36	< 0.005	0.10	—	0.10	0.09	—	0.09	—	372	372	0.02	< 0.005	—	373
Paving	—	0.45	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	2.04	2.04	< 0.005	< 0.005	—	2.04
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	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.34	0.34	< 0.005	< 0.005	—	0.34
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	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.06	0.05	0.06	0.69	0.00	0.00	0.01	0.01	0.00	0.00	0.00	—	137	137	0.01	< 0.005	0.02	138
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.76	0.76	< 0.005	< 0.005	< 0.005	0.77
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.13	0.13	< 0.005	< 0.005	< 0.005	0.13
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.9. Architectural Coating (2023) - Unmitigated

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

Location	TOG	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	0.24	0.20	1.25	1.54	< 0.005	0.05	—	0.05	0.05	—	0.05	—	178	178	0.01	< 0.005	—	179
Architectural Coatings	—	6.95	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.98	0.98	< 0.005	< 0.005	—	0.98
Architectural Coatings	—	0.04	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.16	0.16	< 0.005	< 0.005	—	0.16
Architectural Coatings	—	0.01	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.06	0.05	0.06	0.69	0.00	0.00	0.01	0.01	0.00	0.00	0.00	—	137	137	0.01	< 0.005	0.02	138
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.76	0.76	< 0.005	< 0.005	< 0.005	0.77
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.13	0.13	< 0.005	< 0.005	< 0.005	0.13
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

4. Operations Emissions Details

4.10. 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	TOG	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	TOG	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	TOG	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Sequest	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
Demolition	Demolition	3/1/2023	3/2/2023	5.00	2.00	—
Grading	Grading	3/7/2023	3/8/2023	5.00	2.00	—
Building Construction	Building Construction	3/9/2023	3/10/2023	5.00	2.00	—
Paving	Paving	3/13/2023	3/14/2023	5.00	2.00	—
Architectural Coating	Architectural Coating	3/15/2023	3/16/2023	5.00	2.00	—

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
Demolition	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
Demolition	Tractors/Loaders/Backhoes	Diesel	Average	1.00	8.00	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
Building Construction	Cranes	Diesel	Average	1.00	8.00	367	0.29
Building Construction	Forklifts	Diesel	Average	1.00	8.00	82.0	0.20
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
Architectural Coating	Air Compressors	Diesel	Average	1.00	8.00	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
Demolition	—	—	—	—
Demolition	Worker	10.0	18.5	LDA,LDT1,LDT2
Demolition	Vendor	—	10.2	HHDT,MHDT
Demolition	Hauling	0.00	20.0	HHDT
Demolition	Onsite truck	—	—	HHDT
Grading	—	—	—	—
Grading	Worker	10.0	18.5	LDA,LDT1,LDT2
Grading	Vendor	—	10.2	HHDT,MHDT
Grading	Hauling	25.0	20.0	HHDT

Grading	Onsite truck	—	—	HHDT
Building Construction	—	—	—	—
Building Construction	Worker	10.0	18.5	LDA,LDT1,LDT2
Building Construction	Vendor	0.00	10.2	HHDT,MHDT
Building Construction	Hauling	0.00	20.0	HHDT
Building Construction	Onsite truck	—	—	HHDT
Paving	—	—	—	—
Paving	Worker	10.0	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	10.0	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%

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	0.00	0.00	3,000

5.6. Dust Mitigation

5.6.1. Construction Earthmoving Activities

Phase Name	Material Imported (Cubic Yards)	Material Exported (Cubic Yards)	Acres Graded (acres)	Material Demolished (sq. ft.)	Acres Paved (acres)
Demolition	0.00	0.00	0.00	—	—
Grading	—	800	2.00	0.00	—
Paving	0.00	0.00	0.00	0.00	1.15

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
Other Non-Asphalt Surfaces	0.80	0%
Parking Lot	0.34	100%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2023	0.00	705	0.03	< 0.005

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

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

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

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	9.52	annual days of extreme heat
Extreme Precipitation	6.15	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	0.00	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about 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 (2040–2059 average under RCP 8.5), and consider different increments of sea level rise coupled with extreme storm events. Users may select from four model simulations to view the range in potential inundation depth 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 50 meters (m) by 50 m, or about 164 feet (ft) by 164 ft.
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	1	0	0	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	0	0	N/A
Wildfire	1	0	0	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack	N/A	N/A	N/A	N/A
Air Quality	0	0	0	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	1	1	1	2
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	1	1	2
Wildfire	1	1	1	2
Flooding	N/A	N/A	N/A	N/A

Drought	N/A	N/A	N/A	N/A
Snowpack	N/A	N/A	N/A	N/A
Air Quality	1	1	1	2

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

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

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	47.4
AQ-PM	87.9
AQ-DPM	87.9
Drinking Water	48.3
Lead Risk Housing	—
Pesticides	0.00
Toxic Releases	89.5
Traffic	56.3
Effect Indicators	—
CleanUp Sites	98.7
Groundwater	81.5
Haz Waste Facilities/Generators	99.4

Impaired Water Bodies	66.7
Solid Waste	89.0
Sensitive Population	—
Asthma	94.9
Cardio-vascular	87.8
Low Birth Weights	—
Socioeconomic Factor Indicators	—
Education	—
Housing	—
Linguistic	—
Poverty	1.06
Unemployment	—

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	—
Employed	—
Median HI	—
Education	—
Bachelor's or higher	—
High school enrollment	—
Preschool enrollment	—
Transportation	—
Auto Access	—
Active commuting	—

Social	—
2-parent households	—
Voting	—
Neighborhood	—
Alcohol availability	—
Park access	—
Retail density	—
Supermarket access	—
Tree canopy	—
Housing	—
Homeownership	—
Housing habitability	—
Low-inc homeowner severe housing cost burden	—
Low-inc renter severe housing cost burden	—
Uncrowded housing	—
Health Outcomes	—
Insured adults	—
Arthritis	0.0
Asthma ER Admissions	8.8
High Blood Pressure	0.0
Cancer (excluding skin)	0.0
Asthma	0.0
Coronary Heart Disease	0.0
Chronic Obstructive Pulmonary Disease	0.0
Diagnosed Diabetes	0.0
Life Expectancy at Birth	0.0
Cognitively Disabled	99.8

Physically Disabled	10.4
Heart Attack ER Admissions	15.9
Mental Health Not Good	0.0
Chronic Kidney Disease	0.0
Obesity	0.0
Pedestrian Injuries	0.0
Physical Health Not Good	0.0
Stroke	0.0
Health Risk Behaviors	—
Binge Drinking	0.0
Current Smoker	0.0
No Leisure Time for Physical Activity	0.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	99.4
Elderly	14.8
English Speaking	0.0
Foreign-born	0.0
Outdoor Workers	98.2
Climate Change Adaptive Capacity	—
Impervious Surface Cover	0.3
Traffic Density	0.0
Traffic Access	58.9
Other Indices	—
Hardship	0.0
Other Decision Support	—

2016 Voting	0.0

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	—
Healthy Places Index Score for Project Location (b)	—
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	Example construction scenario to estimate maximum daily emissions.
Construction: Off-Road Equipment	Example construction scenarios.
Construction: Trips and VMT	Construction scenarios.

Vernon Westside Specific Plan - Construction Scenario 2 Detailed Report

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Vernon Westside Specific Plan - Construction Scenario 2
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	0.50
Precipitation (days)	18.4
Location	34.003983317873505, -118.23026579038702
County	Los Angeles-South Coast
City	Vernon
Air District	South Coast AQMD
Air Basin	South Coast
TAZ	4117
EDFZ	7
Electric Utility	City of Vernon Municipal Light Department
Gas Utility	City of Vernon Gas System

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
Other Non-Asphalt Surfaces	35.0	1000sqft	0.80	0.00	0.00	—	—	—
Parking Lot	15.0	1000sqft	0.34	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.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	3.78	7.24	33.0	27.3	0.06	1.35	6.53	7.88	1.25	2.96	4.21	—	7,470	7,470	0.37	0.60	0.24	7,660
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.06	0.09	0.51	0.47	< 0.005	0.02	0.04	0.06	0.02	0.02	0.04	—	92.9	92.9	< 0.005	< 0.005	0.03	94.2
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.01	0.02	0.09	0.09	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	0.01	—	15.4	15.4	< 0.005	< 0.005	0.01	15.6

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily - Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2023	3.78	7.24	33.0	27.3	0.06	1.35	6.53	7.88	1.25	2.96	4.21	—	7,470	7,470	0.37	0.60	0.24	7,660

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2023	0.06	0.09	0.51	0.47	< 0.005	0.02	0.04	0.06	0.02	0.02	0.04	—	92.9	92.9	< 0.005	< 0.005	0.03	94.2
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2023	0.01	0.02	0.09	0.09	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	0.01	—	15.4	15.4	< 0.005	< 0.005	0.01	15.6

3. Construction Emissions Details

3.1. Demolition (2023) - Unmitigated

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

Location	TOG	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	3.03	2.55	25.6	22.4	0.03	1.16	—	1.16	1.07	—	1.07	—	3,337	3,337	0.14	0.03	—	3,348
Demolition	—	—	—	—	—	—	0.00	0.00	—	0.00	0.00	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.01	0.14	0.12	< 0.005	0.01	—	0.01	0.01	—	0.01	—	18.3	18.3	< 0.005	< 0.005	—	18.3
Demolition	—	—	—	—	—	—	0.00	0.00	—	0.00	0.00	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	3.03	3.03	< 0.005	< 0.005	—	3.04
Demolition	—	—	—	—	—	—	0.00	0.00	—	0.00	0.00	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.09	0.12	1.39	0.00	0.00	0.02	0.02	0.00	0.00	0.00	—	274	274	0.01	0.01	0.03	277
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	1.52	1.52	< 0.005	< 0.005	< 0.005	1.54
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	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.25	0.25	< 0.005	< 0.005	< 0.005	0.26
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.3. Grading (2023) - Unmitigated

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

Location	TOG	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	3.38	2.84	28.1	24.1	0.03	1.31	—	1.31	1.20	—	1.20	—	3,614	3,614	0.15	0.03	—	3,626
Dust From Material Movement	—	—	—	—	—	—	5.32	5.32	—	2.65	2.65	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.15	0.13	< 0.005	0.01	—	0.01	0.01	—	0.01	—	19.8	19.8	< 0.005	< 0.005	—	19.9
Dust From Material Movement	—	—	—	—	—	—	0.03	0.03	—	0.01	0.01	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	3.28	3.28	< 0.005	< 0.005	—	3.29
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	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.09	0.12	1.39	0.00	0.00	0.02	0.02	0.00	0.00	0.00	—	274	274	0.01	0.01	0.03	277
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.29	0.07	4.78	1.76	0.02	0.04	0.29	0.33	0.04	0.09	0.13	—	3,583	3,583	0.21	0.57	0.21	3,757
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	1.52	1.52	< 0.005	< 0.005	< 0.005	1.54
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	0.00
Hauling	< 0.005	< 0.005	0.03	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	19.6	19.6	< 0.005	< 0.005	0.02	20.6
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.25	0.25	< 0.005	< 0.005	< 0.005	0.26
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.25	3.25	< 0.005	< 0.005	< 0.005	3.41

3.5. Building Construction (2023) - Unmitigated

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

Location	TOG	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	2.10	1.77	17.9	15.4	0.03	0.80	—	0.80	0.74	—	0.74	—	2,811	2,811	0.11	0.02	—	2,821

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.10	0.08	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	15.4	15.4	< 0.005	< 0.005	—	15.5
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	2.55	2.55	< 0.005	< 0.005	—	2.56
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.09	0.12	1.39	0.00	0.00	0.02	0.02	0.00	0.00	0.00	—	274	274	0.01	0.01	0.03	277
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	1.52	1.52	< 0.005	< 0.005	< 0.005	1.54
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	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.25	0.25	< 0.005	< 0.005	< 0.005	0.26
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.7. Paving (2023) - Unmitigated

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

Location	TOG	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	1.75	1.47	14.9	13.5	0.02	0.68	—	0.68	0.63	—	0.63	—	2,040	2,040	0.08	0.02	—	2,047
Paving	—	0.45	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.08	0.07	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	11.2	11.2	< 0.005	< 0.005	—	11.2
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	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.85	1.85	< 0.005	< 0.005	—	1.86
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	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.09	0.12	1.39	0.00	0.00	0.02	0.02	0.00	0.00	0.00	—	274	274	0.01	0.01	0.03	277
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	1.52	1.52	< 0.005	< 0.005	< 0.005	1.54
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	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.25	0.25	< 0.005	< 0.005	< 0.005	0.26
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.9. Architectural Coating (2023) - Unmitigated

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

Location	TOG	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	0.24	0.20	1.25	1.54	< 0.005	0.05	—	0.05	0.05	—	0.05	—	178	178	0.01	< 0.005	—	179
Architectural Coatings	—	6.95	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.98	0.98	< 0.005	< 0.005	—	0.98
Architectural Coatings	—	0.04	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.16	0.16	< 0.005	< 0.005	—	0.16
Architectural Coatings	—	0.01	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.09	0.12	1.39	0.00	0.00	0.02	0.02	0.00	0.00	0.00	—	274	274	0.01	0.01	0.03	277
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	1.52	1.52	< 0.005	< 0.005	< 0.005	1.54
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	0.00

Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.25	0.25	< 0.005	< 0.005	< 0.005	0.26
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

4. Operations Emissions Details

4.10. 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	TOG	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	TOG	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	TOG	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Sequest	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
Demolition	Demolition	3/1/2023	3/2/2023	5.00	2.00	—
Grading	Grading	3/7/2023	3/8/2023	5.00	2.00	—
Building Construction	Building Construction	3/9/2023	3/10/2023	5.00	2.00	—
Paving	Paving	3/13/2023	3/14/2023	5.00	2.00	—
Architectural Coating	Architectural Coating	3/15/2023	3/16/2023	5.00	2.00	—

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
Demolition	Rubber Tired Dozers	Diesel	Average	2.00	8.00	367	0.40
Demolition	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Grading	Graders	Diesel	Average	1.00	8.00	148	0.41
Grading	Rubber Tired Dozers	Diesel	Average	2.00	8.00	367	0.40
Grading	Tractors/Loaders/Backhoes	Diesel	Average	1.00	8.00	84.0	0.37
Building Construction	Cranes	Diesel	Average	1.00	8.00	367	0.29
Building Construction	Forklifts	Diesel	Average	1.00	8.00	82.0	0.20
Building Construction	Tractors/Loaders/Backhoes	Diesel	Average	1.00	8.00	84.0	0.37
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
Architectural Coating	Air Compressors	Diesel	Average	1.00	8.00	37.0	0.48
Building Construction	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
Paving	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
Paving	Tractors/Loaders/Backhoes	Diesel	Average	1.00	8.00	84.0	0.37

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Demolition	—	—	—	—
Demolition	Worker	20.0	18.5	LDA,LDT1,LDT2
Demolition	Vendor	—	10.2	HHDT,MHDT

Demolition	Hauling	0.00	20.0	HHDT
Demolition	Onsite truck	—	—	HHDT
Grading	—	—	—	—
Grading	Worker	20.0	18.5	LDA,LDT1,LDT2
Grading	Vendor	—	10.2	HHDT,MHDT
Grading	Hauling	50.0	20.0	HHDT
Grading	Onsite truck	—	—	HHDT
Building Construction	—	—	—	—
Building Construction	Worker	20.0	18.5	LDA,LDT1,LDT2
Building Construction	Vendor	0.00	10.2	HHDT,MHDT
Building Construction	Hauling	0.00	20.0	HHDT
Building Construction	Onsite truck	—	—	HHDT
Paving	—	—	—	—
Paving	Worker	20.0	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	20.0	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%

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	0.00	0.00	3,000

5.6. Dust Mitigation

5.6.1. Construction Earthmoving Activities

Phase Name	Material Imported (Cubic Yards)	Material Exported (Cubic Yards)	Acres Graded (acres)	Material Demolished (sq. ft.)	Acres Paved (acres)
Demolition	0.00	0.00	0.00	—	—
Grading	—	1,600	3.00	0.00	—
Paving	0.00	0.00	0.00	0.00	1.15

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
Other Non-Asphalt Surfaces	0.80	0%
Parking Lot	0.34	100%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2023	0.00	705	0.03	< 0.005

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

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

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

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	9.52	annual days of extreme heat
Extreme Precipitation	6.15	annual days with precipitation above 20 mm

Sea Level Rise	0.00	meters of inundation depth
Wildfire	0.00	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about 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 (2040–2059 average under RCP 8.5), and consider different increments of sea level rise coupled with extreme storm events. Users may select from four model simulations to view the range in potential inundation depth 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 50 meters (m) by 50 m, or about 164 feet (ft) by 164 ft.
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	1	0	0	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	0	0	N/A
Wildfire	1	0	0	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack	N/A	N/A	N/A	N/A
Air Quality	0	0	0	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score

Temperature and Extreme Heat	1	1	1	2
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	1	1	2
Wildfire	1	1	1	2
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack	N/A	N/A	N/A	N/A
Air Quality	1	1	1	2

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

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

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	47.4
AQ-PM	87.9
AQ-DPM	87.9
Drinking Water	48.3
Lead Risk Housing	—
Pesticides	0.00
Toxic Releases	89.5

Traffic	56.3
Effect Indicators	—
CleanUp Sites	98.7
Groundwater	81.5
Haz Waste Facilities/Generators	99.4
Impaired Water Bodies	66.7
Solid Waste	89.0
Sensitive Population	—
Asthma	94.9
Cardio-vascular	87.8
Low Birth Weights	—
Socioeconomic Factor Indicators	—
Education	—
Housing	—
Linguistic	—
Poverty	1.06
Unemployment	—

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	—
Employed	—
Median HI	—
Education	—
Bachelor's or higher	—

High school enrollment	—
Preschool enrollment	—
Transportation	—
Auto Access	—
Active commuting	—
Social	—
2-parent households	—
Voting	—
Neighborhood	—
Alcohol availability	—
Park access	—
Retail density	—
Supermarket access	—
Tree canopy	—
Housing	—
Homeownership	—
Housing habitability	—
Low-inc homeowner severe housing cost burden	—
Low-inc renter severe housing cost burden	—
Uncrowded housing	—
Health Outcomes	—
Insured adults	—
Arthritis	0.0
Asthma ER Admissions	8.8
High Blood Pressure	0.0
Cancer (excluding skin)	0.0
Asthma	0.0

Coronary Heart Disease	0.0
Chronic Obstructive Pulmonary Disease	0.0
Diagnosed Diabetes	0.0
Life Expectancy at Birth	0.0
Cognitively Disabled	99.8
Physically Disabled	10.4
Heart Attack ER Admissions	15.9
Mental Health Not Good	0.0
Chronic Kidney Disease	0.0
Obesity	0.0
Pedestrian Injuries	0.0
Physical Health Not Good	0.0
Stroke	0.0
Health Risk Behaviors	—
Binge Drinking	0.0
Current Smoker	0.0
No Leisure Time for Physical Activity	0.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	99.4
Elderly	14.8
English Speaking	0.0
Foreign-born	0.0
Outdoor Workers	98.2
Climate Change Adaptive Capacity	—
Impervious Surface Cover	0.3

Traffic Density	0.0
Traffic Access	58.9
Other Indices	—
Hardship	0.0
Other Decision Support	—
2016 Voting	0.0

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	—
Healthy Places Index Score for Project Location (b)	—
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	Example construction scenario to estimate maximum daily emissions.

Construction: Off-Road Equipment	Construction scenarios.
Construction: Trips and VMT	Construction scenarios.

Vernon Westside Specific Plan - Construction Scenario 3 Detailed Report

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Vernon Westside Specific Plan - Construction Scenario 3
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	0.50
Precipitation (days)	18.4
Location	34.003983317873505, -118.23026579038702
County	Los Angeles-South Coast
City	Vernon
Air District	South Coast AQMD
Air Basin	South Coast
TAZ	4117
EDFZ	7
Electric Utility	City of Vernon Municipal Light Department
Gas Utility	City of Vernon Gas System

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
Other Non-Asphalt Surfaces	35.0	1000sqft	0.80	0.00	0.00	—	—	—
Parking Lot	15.0	1000sqft	0.34	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.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	7.27	7.38	63.6	53.5	0.11	2.56	13.0	15.5	2.36	5.94	8.30	—	14,800	14,800	0.74	1.21	0.50	15,181
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.13	0.15	1.10	1.03	< 0.005	0.05	0.09	0.13	0.04	0.04	0.08	—	197	197	0.01	0.01	0.07	200
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.02	0.03	0.20	0.19	< 0.005	0.01	0.02	0.02	0.01	0.01	0.01	—	32.6	32.6	< 0.005	< 0.005	0.01	33.1

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily - Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2023	7.27	7.38	63.6	53.5	0.11	2.56	13.0	15.5	2.36	5.94	8.30	—	14,800	14,800	0.74	1.21	0.50	15,181

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2023	0.13	0.15	1.10	1.03	< 0.005	0.05	0.09	0.13	0.04	0.04	0.08	—	197	197	0.01	0.01	0.07	200
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2023	0.02	0.03	0.20	0.19	< 0.005	0.01	0.02	0.02	0.01	0.01	0.01	—	32.6	32.6	< 0.005	< 0.005	0.01	33.1

3. Construction Emissions Details

3.1. Demolition (2023) - Unmitigated

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

Location	TOG	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	6.07	5.10	51.3	44.7	0.06	2.33	—	2.33	2.14	—	2.14	—	6,673	6,673	0.27	0.05	—	6,696
Demolition	—	—	—	—	—	—	0.00	0.00	—	0.00	0.00	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.03	0.28	0.25	< 0.005	0.01	—	0.01	0.01	—	0.01	—	36.6	36.6	< 0.005	< 0.005	—	36.7
Demolition	—	—	—	—	—	—	0.00	0.00	—	0.00	0.00	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.05	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	6.05	6.05	< 0.005	< 0.005	—	6.07
Demolition	—	—	—	—	—	—	0.00	0.00	—	0.00	0.00	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.28	0.23	0.31	3.47	0.00	0.00	0.04	0.04	0.00	0.00	0.00	—	684	684	0.03	0.02	0.08	692
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	3.80	3.80	< 0.005	< 0.005	0.01	3.86
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.63	0.63	< 0.005	< 0.005	< 0.005	0.64
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.3. Grading (2023) - Unmitigated

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

Location	TOG	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	6.41	5.39	53.8	46.5	0.06	2.47	—	2.47	2.27	—	2.27	—	6,950	6,950	0.28	0.06	—	6,974
Dust From Material Movement	—	—	—	—	—	—	10.4	10.4	—	5.28	5.28	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.04	0.03	0.29	0.25	< 0.005	0.01	—	0.01	0.01	—	0.01	—	38.1	38.1	< 0.005	< 0.005	—	38.2
Dust From Material Movement	—	—	—	—	—	—	0.06	0.06	—	0.03	0.03	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	6.31	6.31	< 0.005	< 0.005	—	6.33
Dust From Material Movement	—	—	—	—	—	—	0.01	0.01	—	0.01	0.01	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.28	0.23	0.31	3.47	0.00	0.00	0.04	0.04	0.00	0.00	0.00	—	684	684	0.03	0.02	0.08	692
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.58	0.15	9.56	3.52	0.05	0.09	0.57	0.66	0.09	0.18	0.26	—	7,166	7,166	0.43	1.13	0.42	7,514
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	3.80	3.80	< 0.005	< 0.005	0.01	3.86
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	0.05	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	39.3	39.3	< 0.005	0.01	0.04	41.2
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.63	0.63	< 0.005	< 0.005	< 0.005	0.64
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.50	6.50	< 0.005	< 0.005	0.01	6.82

3.5. Building Construction (2023) - Unmitigated

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

Location	TOG	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	5.14	4.32	43.5	37.8	0.06	1.96	—	1.96	1.81	—	1.81	—	6,148	6,148	0.25	0.05	—	6,169

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.02	0.24	0.21	< 0.005	0.01	—	0.01	0.01	—	0.01	—	33.7	33.7	< 0.005	< 0.005	—	33.8
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	< 0.005	0.04	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	5.58	5.58	< 0.005	< 0.005	—	5.60
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.28	0.23	0.31	3.47	0.00	0.00	0.04	0.04	0.00	0.00	0.00	—	684	684	0.03	0.02	0.08	692
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	3.80	3.80	< 0.005	< 0.005	0.01	3.86
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.63	0.63	< 0.005	< 0.005	< 0.005	0.64
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.7. Paving (2023) - Unmitigated

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

Location	TOG	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	4.78	4.02	40.5	35.9	0.05	1.84	—	1.84	1.70	—	1.70	—	5,377	5,377	0.22	0.04	—	5,395
Paving	—	0.45	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.02	0.22	0.20	< 0.005	0.01	—	0.01	0.01	—	0.01	—	29.5	29.5	< 0.005	< 0.005	—	29.6
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	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.04	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.88	4.88	< 0.005	< 0.005	—	4.89
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	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.28	0.23	0.31	3.47	0.00	0.00	0.04	0.04	0.00	0.00	0.00	—	684	684	0.03	0.02	0.08	692
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	3.80	3.80	< 0.005	< 0.005	0.01	3.86
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.63	0.63	< 0.005	< 0.005	< 0.005	0.64
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.9. Architectural Coating (2023) - Unmitigated

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

Location	TOG	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	0.24	0.20	1.25	1.54	< 0.005	0.05	—	0.05	0.05	—	0.05	—	178	178	0.01	< 0.005	—	179
Architectural Coatings	—	6.95	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.98	0.98	< 0.005	< 0.005	—	0.98
Architectural Coatings	—	0.04	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.16	0.16	< 0.005	< 0.005	—	0.16
Architectural Coatings	—	0.01	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.28	0.23	0.31	3.47	0.00	0.00	0.04	0.04	0.00	0.00	0.00	—	684	684	0.03	0.02	0.08	692
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	3.80	3.80	< 0.005	< 0.005	0.01	3.86
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.63	0.63	< 0.005	< 0.005	< 0.005	0.64
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

4. Operations Emissions Details

4.10. 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	TOG	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	TOG	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	TOG	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Sequest	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
Demolition	Demolition	3/1/2023	3/2/2023	5.00	2.00	—
Grading	Grading	3/7/2023	3/8/2023	5.00	2.00	—
Building Construction	Building Construction	3/9/2023	3/10/2023	5.00	2.00	—
Paving	Paving	3/13/2023	3/14/2023	5.00	2.00	—
Architectural Coating	Architectural Coating	3/15/2023	3/16/2023	5.00	2.00	—

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
Demolition	Rubber Tired Dozers	Diesel	Average	4.00	8.00	367	0.40
Demolition	Tractors/Loaders/Backhoes	Diesel	Average	4.00	8.00	84.0	0.37
Grading	Graders	Diesel	Average	1.00	8.00	148	0.41
Grading	Rubber Tired Dozers	Diesel	Average	4.00	8.00	367	0.40
Grading	Tractors/Loaders/Backhoes	Diesel	Average	3.00	8.00	84.0	0.37
Building Construction	Cranes	Diesel	Average	1.00	8.00	367	0.29
Building Construction	Forklifts	Diesel	Average	1.00	8.00	82.0	0.20
Building Construction	Tractors/Loaders/Backhoes	Diesel	Average	3.00	8.00	84.0	0.37
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
Architectural Coating	Air Compressors	Diesel	Average	1.00	8.00	37.0	0.48
Building Construction	Rubber Tired Dozers	Diesel	Average	3.00	8.00	367	0.40
Paving	Rubber Tired Dozers	Diesel	Average	3.00	8.00	367	0.40
Paving	Tractors/Loaders/Backhoes	Diesel	Average	3.00	8.00	84.0	0.37

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Demolition	—	—	—	—
Demolition	Worker	50.0	18.5	LDA,LDT1,LDT2
Demolition	Vendor	—	10.2	HHDT,MHDT

Demolition	Hauling	0.00	20.0	HHDT
Demolition	Onsite truck	—	—	HHDT
Grading	—	—	—	—
Grading	Worker	50.0	18.5	LDA,LDT1,LDT2
Grading	Vendor	—	10.2	HHDT,MHDT
Grading	Hauling	100	20.0	HHDT
Grading	Onsite truck	—	—	HHDT
Building Construction	—	—	—	—
Building Construction	Worker	50.0	18.5	LDA,LDT1,LDT2
Building Construction	Vendor	0.00	10.2	HHDT,MHDT
Building Construction	Hauling	0.00	20.0	HHDT
Building Construction	Onsite truck	—	—	HHDT
Paving	—	—	—	—
Paving	Worker	50.0	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	50.0	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%

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	0.00	0.00	3,000

5.6. Dust Mitigation

5.6.1. Construction Earthmoving Activities

Phase Name	Material Imported (Cubic Yards)	Material Exported (Cubic Yards)	Acres Graded (acres)	Material Demolished (sq. ft.)	Acres Paved (acres)
Demolition	0.00	0.00	0.00	—	—
Grading	—	3,200	3.00	0.00	—
Paving	0.00	0.00	0.00	0.00	1.15

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
Other Non-Asphalt Surfaces	0.80	0%
Parking Lot	0.34	100%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2023	0.00	705	0.03	< 0.005

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

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

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

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	9.52	annual days of extreme heat
Extreme Precipitation	6.15	annual days with precipitation above 20 mm

Sea Level Rise	0.00	meters of inundation depth
Wildfire	0.00	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about 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 (2040–2059 average under RCP 8.5), and consider different increments of sea level rise coupled with extreme storm events. Users may select from four model simulations to view the range in potential inundation depth 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 50 meters (m) by 50 m, or about 164 feet (ft) by 164 ft.
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	1	0	0	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	0	0	N/A
Wildfire	1	0	0	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack	N/A	N/A	N/A	N/A
Air Quality	0	0	0	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score

Temperature and Extreme Heat	1	1	1	2
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	1	1	2
Wildfire	1	1	1	2
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack	N/A	N/A	N/A	N/A
Air Quality	1	1	1	2

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

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

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	47.4
AQ-PM	87.9
AQ-DPM	87.9
Drinking Water	48.3
Lead Risk Housing	—
Pesticides	0.00
Toxic Releases	89.5

Traffic	56.3
Effect Indicators	—
CleanUp Sites	98.7
Groundwater	81.5
Haz Waste Facilities/Generators	99.4
Impaired Water Bodies	66.7
Solid Waste	89.0
Sensitive Population	—
Asthma	94.9
Cardio-vascular	87.8
Low Birth Weights	—
Socioeconomic Factor Indicators	—
Education	—
Housing	—
Linguistic	—
Poverty	1.06
Unemployment	—

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	—
Employed	—
Median HI	—
Education	—
Bachelor's or higher	—

High school enrollment	—
Preschool enrollment	—
Transportation	—
Auto Access	—
Active commuting	—
Social	—
2-parent households	—
Voting	—
Neighborhood	—
Alcohol availability	—
Park access	—
Retail density	—
Supermarket access	—
Tree canopy	—
Housing	—
Homeownership	—
Housing habitability	—
Low-inc homeowner severe housing cost burden	—
Low-inc renter severe housing cost burden	—
Uncrowded housing	—
Health Outcomes	—
Insured adults	—
Arthritis	0.0
Asthma ER Admissions	8.8
High Blood Pressure	0.0
Cancer (excluding skin)	0.0
Asthma	0.0

Coronary Heart Disease	0.0
Chronic Obstructive Pulmonary Disease	0.0
Diagnosed Diabetes	0.0
Life Expectancy at Birth	0.0
Cognitively Disabled	99.8
Physically Disabled	10.4
Heart Attack ER Admissions	15.9
Mental Health Not Good	0.0
Chronic Kidney Disease	0.0
Obesity	0.0
Pedestrian Injuries	0.0
Physical Health Not Good	0.0
Stroke	0.0
Health Risk Behaviors	—
Binge Drinking	0.0
Current Smoker	0.0
No Leisure Time for Physical Activity	0.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	99.4
Elderly	14.8
English Speaking	0.0
Foreign-born	0.0
Outdoor Workers	98.2
Climate Change Adaptive Capacity	—
Impervious Surface Cover	0.3

Traffic Density	0.0
Traffic Access	58.9
Other Indices	—
Hardship	0.0
Other Decision Support	—
2016 Voting	0.0

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	—
Healthy Places Index Score for Project Location (b)	—
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	Example construction scenario to estimate maximum daily emissions.

Construction: Off-Road Equipment	Construction scenarios.
Construction: Trips and VMT	Construction scenarios.
Construction: Dust From Material Movement	Construction scenarios.

Vernon Westside Specific Plan - Construction Scenario 4 Detailed Report

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Vernon Westside Specific Plan - Construction Scenario 4
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	0.50
Precipitation (days)	18.4
Location	34.003983317873505, -118.23026579038702
County	Los Angeles-South Coast
City	Vernon
Air District	South Coast AQMD
Air Basin	South Coast
TAZ	4117
EDFZ	7
Electric Utility	City of Vernon Municipal Light Department
Gas Utility	City of Vernon Gas System

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
Other Non-Asphalt Surfaces	35.0	1000sqft	0.80	0.00	0.00	—	—	—
Parking Lot	15.0	1000sqft	0.34	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.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	9.28	7.57	81.4	68.0	0.15	3.19	16.7	19.9	2.94	7.56	10.5	—	20,307	20,307	1.04	1.80	0.74	20,871
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.18	0.19	1.42	1.33	< 0.005	0.06	0.11	0.17	0.06	0.05	0.10	—	260	260	0.01	0.01	0.11	264
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.03	0.03	0.26	0.24	< 0.005	0.01	0.02	0.03	0.01	0.01	0.02	—	43.1	43.1	< 0.005	< 0.005	0.02	43.7

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily - Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2023	9.28	7.57	81.4	68.0	0.15	3.19	16.7	19.9	2.94	7.56	10.5	—	20,307	20,307	1.04	1.80	0.74	20,871

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2023	0.18	0.19	1.42	1.33	< 0.005	0.06	0.11	0.17	0.06	0.05	0.10	—	260	260	0.01	0.01	0.11	264
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2023	0.03	0.03	0.26	0.24	< 0.005	0.01	0.02	0.03	0.01	0.01	0.02	—	43.1	43.1	< 0.005	< 0.005	0.02	43.7

3. Construction Emissions Details

3.1. Demolition (2023) - Unmitigated

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

Location	TOG	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	7.59	6.37	64.1	55.9	0.08	2.91	—	2.91	2.67	—	2.67	—	8,342	8,342	0.34	0.07	—	8,370
Demolition	—	—	—	—	—	—	0.00	0.00	—	0.00	0.00	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.04	0.03	0.35	0.31	< 0.005	0.02	—	0.02	0.01	—	0.01	—	45.7	45.7	< 0.005	< 0.005	—	45.9
Demolition	—	—	—	—	—	—	0.00	0.00	—	0.00	0.00	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.06	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	7.57	7.57	< 0.005	< 0.005	—	7.59
Demolition	—	—	—	—	—	—	0.00	0.00	—	0.00	0.00	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.49	0.43	0.44	5.07	0.00	0.00	0.06	0.06	0.00	0.00	0.00	—	939	939	0.05	0.04	0.11	951
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.03	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	5.22	5.22	< 0.005	< 0.005	0.01	5.30
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.86	0.86	< 0.005	< 0.005	< 0.005	0.88
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.3. Grading (2023) - Unmitigated

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

Location	TOG	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	7.93	6.66	66.6	57.7	0.08	3.05	—	3.05	2.81	—	2.81	—	8,619	8,619	0.35	0.07	—	8,648
Dust From Material Movement	—	—	—	—	—	—	13.0	13.0	—	6.59	6.59	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.04	0.04	0.36	0.32	< 0.005	0.02	—	0.02	0.02	—	0.02	—	47.2	47.2	< 0.005	< 0.005	—	47.4
Dust From Material Movement	—	—	—	—	—	—	0.07	0.07	—	0.04	0.04	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.07	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	7.82	7.82	< 0.005	< 0.005	—	7.85
Dust From Material Movement	—	—	—	—	—	—	0.01	0.01	—	0.01	0.01	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.49	0.43	0.44	5.07	0.00	0.00	0.06	0.06	0.00	0.00	0.00	—	939	939	0.05	0.04	0.11	951
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.86	0.22	14.3	5.28	0.07	0.13	0.86	0.99	0.13	0.26	0.40	—	10,749	10,749	0.64	1.70	0.63	11,271
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.03	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	5.22	5.22	< 0.005	< 0.005	0.01	5.30
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	0.08	0.03	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	—	58.9	58.9	< 0.005	0.01	0.06	61.8
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.86	0.86	< 0.005	< 0.005	< 0.005	0.88
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.75	9.75	< 0.005	< 0.005	0.01	10.2

3.5. Building Construction (2023) - Unmitigated

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

Location	TOG	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	6.65	5.59	56.3	49.0	0.07	2.55	—	2.55	2.34	—	2.34	—	7,816	7,816	0.32	0.06	—	7,843

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.04	0.03	0.31	0.27	< 0.005	0.01	—	0.01	0.01	—	0.01	—	42.8	42.8	< 0.005	< 0.005	—	43.0
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.06	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	7.09	7.09	< 0.005	< 0.005	—	7.11
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.49	0.43	0.44	5.07	0.00	0.00	0.06	0.06	0.00	0.00	0.00	—	939	939	0.05	0.04	0.11	951
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.03	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	5.22	5.22	< 0.005	< 0.005	0.01	5.30
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.86	0.86	< 0.005	< 0.005	< 0.005	0.88
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.7. Paving (2023) - Unmitigated

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

Location	TOG	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	6.30	5.29	53.3	47.1	0.07	2.42	—	2.42	2.23	—	2.23	—	7,045	7,045	0.29	0.06	—	7,069
Paving	—	0.45	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.03	0.29	0.26	< 0.005	0.01	—	0.01	0.01	—	0.01	—	38.6	38.6	< 0.005	< 0.005	—	38.7
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	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	6.39	6.39	< 0.005	< 0.005	—	6.41
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	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.49	0.43	0.44	5.07	0.00	0.00	0.06	0.06	0.00	0.00	0.00	—	939	939	0.05	0.04	0.11	951
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.03	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	5.22	5.22	< 0.005	< 0.005	0.01	5.30
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.86	0.86	< 0.005	< 0.005	< 0.005	0.88
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.9. Architectural Coating (2023) - Unmitigated

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

Location	TOG	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	0.24	0.20	1.25	1.54	< 0.005	0.05	—	0.05	0.05	—	0.05	—	178	178	0.01	< 0.005	—	179
Architectural Coatings	—	6.95	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.98	0.98	< 0.005	< 0.005	—	0.98
Architectural Coatings	—	0.04	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.16	0.16	< 0.005	< 0.005	—	0.16
Architectural Coatings	—	0.01	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.49	0.43	0.44	5.07	0.00	0.00	0.06	0.06	0.00	0.00	0.00	—	939	939	0.05	0.04	0.11	951
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.03	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	5.22	5.22	< 0.005	< 0.005	0.01	5.30
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	0.00	0.00	—	0.86	0.86	< 0.005	< 0.005	< 0.005	0.88
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

4. Operations Emissions Details

4.10. 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	TOG	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	TOG	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	TOG	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Sequest	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
Demolition	Demolition	3/1/2023	3/2/2023	5.00	2.00	—
Grading	Grading	3/7/2023	3/8/2023	5.00	2.00	—
Building Construction	Building Construction	3/9/2023	3/10/2023	5.00	2.00	—
Paving	Paving	3/13/2023	3/14/2023	5.00	2.00	—
Architectural Coating	Architectural Coating	3/15/2023	3/16/2023	5.00	2.00	—

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
Demolition	Rubber Tired Dozers	Diesel	Average	5.00	8.00	367	0.40
Demolition	Tractors/Loaders/Backhoes	Diesel	Average	5.00	8.00	84.0	0.37
Grading	Graders	Diesel	Average	1.00	8.00	148	0.41
Grading	Rubber Tired Dozers	Diesel	Average	5.00	8.00	367	0.40
Grading	Tractors/Loaders/Backhoes	Diesel	Average	4.00	8.00	84.0	0.37
Building Construction	Cranes	Diesel	Average	1.00	8.00	367	0.29
Building Construction	Forklifts	Diesel	Average	1.00	8.00	82.0	0.20
Building Construction	Tractors/Loaders/Backhoes	Diesel	Average	4.00	8.00	84.0	0.37
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
Architectural Coating	Air Compressors	Diesel	Average	1.00	8.00	37.0	0.48
Building Construction	Rubber Tired Dozers	Diesel	Average	4.00	8.00	367	0.40
Paving	Rubber Tired Dozers	Diesel	Average	4.00	8.00	367	0.40
Paving	Tractors/Loaders/Backhoes	Diesel	Average	4.00	8.00	84.0	0.37

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Demolition	—	—	—	—
Demolition	Worker	100	12.6	LDA,LDT1,LDT2
Demolition	Vendor	—	7.75	HHDT,MHDT

Demolition	Hauling	0.00	20.0	HHDT
Demolition	Onsite truck	—	—	HHDT
Grading	—	—	—	—
Grading	Worker	100	12.6	LDA,LDT1,LDT2
Grading	Vendor	—	7.75	HHDT,MHDT
Grading	Hauling	150	20.0	HHDT
Grading	Onsite truck	—	—	HHDT
Building Construction	—	—	—	—
Building Construction	Worker	100	12.6	LDA,LDT1,LDT2
Building Construction	Vendor	0.00	7.75	HHDT,MHDT
Building Construction	Hauling	0.00	20.0	HHDT
Building Construction	Onsite truck	—	—	HHDT
Paving	—	—	—	—
Paving	Worker	100	12.6	LDA,LDT1,LDT2
Paving	Vendor	—	7.75	HHDT,MHDT
Paving	Hauling	0.00	20.0	HHDT
Paving	Onsite truck	—	—	HHDT
Architectural Coating	—	—	—	—
Architectural Coating	Worker	100	12.6	LDA,LDT1,LDT2
Architectural Coating	Vendor	—	7.75	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%

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	0.00	0.00	3,000

5.6. Dust Mitigation

5.6.1. Construction Earthmoving Activities

Phase Name	Material Imported (Cubic Yards)	Material Exported (Cubic Yards)	Acres Graded (acres)	Material Demolished (sq. ft.)	Acres Paved (acres)
Demolition	0.00	0.00	0.00	—	—
Grading	—	4,800	3.00	0.00	—
Paving	0.00	0.00	0.00	0.00	1.15

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
Other Non-Asphalt Surfaces	0.80	0%
Parking Lot	0.34	100%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2023	0.00	705	0.03	< 0.005

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

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

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

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	9.52	annual days of extreme heat
Extreme Precipitation	6.15	annual days with precipitation above 20 mm

Sea Level Rise	0.00	meters of inundation depth
Wildfire	0.00	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about 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 (2040–2059 average under RCP 8.5), and consider different increments of sea level rise coupled with extreme storm events. Users may select from four model simulations to view the range in potential inundation depth 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 50 meters (m) by 50 m, or about 164 feet (ft) by 164 ft.
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	1	0	0	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	0	0	N/A
Wildfire	1	0	0	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack	N/A	N/A	N/A	N/A
Air Quality	0	0	0	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score

Temperature and Extreme Heat	1	1	1	2
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	1	1	2
Wildfire	1	1	1	2
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack	N/A	N/A	N/A	N/A
Air Quality	1	1	1	2

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

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

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	47.4
AQ-PM	87.9
AQ-DPM	87.9
Drinking Water	48.3
Lead Risk Housing	—
Pesticides	0.00
Toxic Releases	89.5

Traffic	56.3
Effect Indicators	—
CleanUp Sites	98.7
Groundwater	81.5
Haz Waste Facilities/Generators	99.4
Impaired Water Bodies	66.7
Solid Waste	89.0
Sensitive Population	—
Asthma	94.9
Cardio-vascular	87.8
Low Birth Weights	—
Socioeconomic Factor Indicators	—
Education	—
Housing	—
Linguistic	—
Poverty	1.06
Unemployment	—

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	—
Employed	—
Median HI	—
Education	—
Bachelor's or higher	—

High school enrollment	—
Preschool enrollment	—
Transportation	—
Auto Access	—
Active commuting	—
Social	—
2-parent households	—
Voting	—
Neighborhood	—
Alcohol availability	—
Park access	—
Retail density	—
Supermarket access	—
Tree canopy	—
Housing	—
Homeownership	—
Housing habitability	—
Low-inc homeowner severe housing cost burden	—
Low-inc renter severe housing cost burden	—
Uncrowded housing	—
Health Outcomes	—
Insured adults	—
Arthritis	0.0
Asthma ER Admissions	8.8
High Blood Pressure	0.0
Cancer (excluding skin)	0.0
Asthma	0.0

Coronary Heart Disease	0.0
Chronic Obstructive Pulmonary Disease	0.0
Diagnosed Diabetes	0.0
Life Expectancy at Birth	0.0
Cognitively Disabled	99.8
Physically Disabled	10.4
Heart Attack ER Admissions	15.9
Mental Health Not Good	0.0
Chronic Kidney Disease	0.0
Obesity	0.0
Pedestrian Injuries	0.0
Physical Health Not Good	0.0
Stroke	0.0
Health Risk Behaviors	—
Binge Drinking	0.0
Current Smoker	0.0
No Leisure Time for Physical Activity	0.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	99.4
Elderly	14.8
English Speaking	0.0
Foreign-born	0.0
Outdoor Workers	98.2
Climate Change Adaptive Capacity	—
Impervious Surface Cover	0.3

Traffic Density	0.0
Traffic Access	58.9
Other Indices	—
Hardship	0.0
Other Decision Support	—
2016 Voting	0.0

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	—
Healthy Places Index Score for Project Location (b)	—
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	Example construction scenario to estimate maximum daily emissions.

Construction: Off-Road Equipment	Construction scenarios.
Construction: Trips and VMT	Construction scenarios.
Construction: Dust From Material Movement	Construction scenarios.

Vernon Westside Specific Plan - Existing Detailed Report

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Vernon Westside Specific Plan - Existing
Lead Agency	—
Land Use Scale	Plan/community
Analysis Level for Defaults	County
Windspeed (m/s)	0.50
Precipitation (days)	18.4
Location	34.00397253161066, -118.23026079797285
County	Los Angeles-South Coast
City	Vernon
Air District	South Coast AQMD
Air Basin	South Coast
TAZ	4117
EDFZ	7
Electric Utility	City of Vernon Municipal Light Department
Gas Utility	City of Vernon Gas System

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
General Heavy Industry	14,942	1000sqft	839	14,942,363	0.00	—	—	—
Apartments Low Rise	13.0	Dwelling Unit	0.81	5,046	0.00	—	34.0	—

Free-Standing Discount store	6.93	1000sqft	0.16	6,930	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

No measures selected

2. Emissions Summary

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.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	241	552	409	3,363	7.29	18.1	212	230	18.1	37.7	55.8	16,630	1,165,797	1,182,427	1,732	38.7	6,836	1,244,112
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	125	445	427	2,327	6.97	17.2	212	229	16.9	37.7	54.6	16,630	1,134,784	1,151,414	1,732	39.7	3,966	1,210,497
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	205	518	436	2,876	7.07	17.8	212	230	17.7	37.7	55.4	16,630	1,144,030	1,160,660	1,732	40.1	5,162	1,221,062
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	37.3	94.6	79.5	525	1.29	3.24	38.6	41.9	3.23	6.88	10.1	2,753	189,407	192,160	287	6.63	855	202,161

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	107	77.8	231	2,569	6.22	4.11	212	216	3.83	37.7	41.5	—	635,440	635,440	19.6	20.1	2,947	644,876
Area	116	465	5.72	650	0.04	0.89	—	0.89	1.18	—	1.18	0.00	2,908	2,908	0.12	0.25	—	2,987
Energy	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	482,021	482,021	31.1	1.96	—	483,383
Water	—	—	—	—	—	—	—	—	—	—	—	6,623	45,427	52,051	681	16.4	—	73,968
Waste	—	—	—	—	—	—	—	—	—	—	—	10,006	0.00	10,006	1,000	0.00	—	35,009
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,890	3,890
Total	241	552	409	3,363	7.29	18.1	212	230	18.1	37.7	55.8	16,630	1,165,797	1,182,427	1,732	38.7	6,836	1,244,112
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	106	77.7	255	2,183	5.94	4.11	212	216	3.83	37.7	41.5	—	607,103	607,103	19.3	21.3	76.4	614,014
Area	0.02	358	0.18	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	233	233	< 0.005	< 0.005	—	233
Energy	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	482,021	482,021	31.1	1.96	—	483,383
Water	—	—	—	—	—	—	—	—	—	—	—	6,623	45,427	52,051	681	16.4	—	73,968
Waste	—	—	—	—	—	—	—	—	—	—	—	10,006	0.00	10,006	1,000	0.00	—	35,009
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,890	3,890
Total	125	445	427	2,327	6.97	17.2	212	229	16.9	37.7	54.6	16,630	1,134,784	1,151,414	1,732	39.7	3,966	1,210,497
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	107	77.8	260	2,287	6.02	4.11	212	216	3.83	37.7	41.5	—	614,733	614,733	19.4	21.5	1,272	622,911
Area	79.2	431	3.81	445	0.03	0.60	—	0.60	0.80	—	0.80	0.00	1,849	1,849	0.08	0.17	—	1,902
Energy	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	482,021	482,021	31.1	1.96	—	483,383
Water	—	—	—	—	—	—	—	—	—	—	—	6,623	45,427	52,051	681	16.4	—	73,968

Waste	—	—	—	—	—	—	—	—	—	—	—	10,006	0.00	10,006	1,000	0.00	—	35,009
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,890	3,890
Total	205	518	436	2,876	7.07	17.8	212	230	17.7	37.7	55.4	16,630	1,144,030	1,160,660	1,732	40.1	5,162	1,221,062
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	19.4	14.2	47.5	417	1.10	0.75	38.6	39.4	0.70	6.88	7.58	—	101,776	101,776	3.20	3.57	211	103,130
Area	14.4	78.7	0.69	81.2	< 0.005	0.11	—	0.11	0.15	—	0.15	0.00	306	306	0.01	0.03	—	315
Energy	3.45	1.72	31.4	26.3	0.19	2.38	—	2.38	2.38	—	2.38	—	79,804	79,804	5.15	0.32	—	80,030
Water	—	—	—	—	—	—	—	—	—	—	—	1,097	7,521	8,618	113	2.71	—	12,246
Waste	—	—	—	—	—	—	—	—	—	—	—	1,657	0.00	1,657	166	0.00	—	5,796
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	644	644
Total	37.3	94.6	79.5	525	1.29	3.24	38.6	41.9	3.23	6.88	10.1	2,753	189,407	192,160	287	6.63	855	202,161

4. Operations Emissions Details

4.1. Mobile Emissions by Land Use

4.1.1. Unmitigated

Mobile source emissions results are presented in Sections 2.6. No further detailed breakdown of emissions is available.

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

General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	276,742	276,742	13.0	1.57	—	277,534
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	—	96.3	96.3	< 0.005	< 0.005	—	96.5
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	—	131	131	0.01	< 0.005	—	132
Total	—	—	—	—	—	—	—	—	—	—	—	—	276,970	276,970	13.0	1.57	—	277,763
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	276,742	276,742	13.0	1.57	—	277,534
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	—	96.3	96.3	< 0.005	< 0.005	—	96.5
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	—	131	131	0.01	< 0.005	—	132
Total	—	—	—	—	—	—	—	—	—	—	—	—	276,970	276,970	13.0	1.57	—	277,763
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	45,818	45,818	2.15	0.26	—	45,949
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	—	15.9	15.9	< 0.005	< 0.005	—	16.0
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	—	21.8	21.8	< 0.005	< 0.005	—	21.8

Total	—	—	—	—	—	—	—	—	—	—	—	—	45,856	45,856	2.15	0.26	—	45,987

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	204,970	204,970	18.1	0.39	—	205,539
Apartments Low Rise	0.01	< 0.005	0.05	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	67.9	67.9	0.01	< 0.005	—	68.1
Free-Standing Discount store	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	13.3	13.3	< 0.005	< 0.005	—	13.3
Total	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	205,051	205,051	18.1	0.39	—	205,620
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	204,970	204,970	18.1	0.39	—	205,539
Apartments Low Rise	0.01	< 0.005	0.05	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	67.9	67.9	0.01	< 0.005	—	68.1
Free-Standing Discount store	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	13.3	13.3	< 0.005	< 0.005	—	13.3
Total	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	205,051	205,051	18.1	0.39	—	205,620

Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	3.45	1.72	31.4	26.3	0.19	2.38	—	2.38	2.38	—	2.38	—	33,935	33,935	3.00	0.06	—	34,029
Apartments Low Rise	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	11.2	11.2	< 0.005	< 0.005	—	11.3
Free-Standing Discount store	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	2.20	2.20	< 0.005	< 0.005	—	2.21
Total	3.45	1.72	31.4	26.3	0.19	2.38	—	2.38	2.38	—	2.38	—	33,949	33,949	3.00	0.06	—	34,043

4.3. Area Emissions by Source

4.3.2. Unmitigated

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

Source	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.02	0.01	0.18	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	233	233	< 0.005	< 0.005	—	233
Consumer Products	—	320	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	38.0	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	116	107	5.54	650	0.04	0.88	—	0.88	1.16	—	1.16	—	2,676	2,676	0.11	0.25	—	2,754
Total	116	465	5.72	650	0.04	0.89	—	0.89	1.18	—	1.18	0.00	2,908	2,908	0.12	0.25	—	2,987

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.02	0.01	0.18	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	233	233	< 0.005	< 0.005	—	233
Consumer Products	—	320	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	38.0	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	0.02	358	0.18	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	233	233	< 0.005	< 0.005	—	233
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	0.00	2.64	2.64	< 0.005	< 0.005	—	2.64
Consumer Products	—	58.4	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	6.93	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	14.4	13.3	0.69	81.2	< 0.005	0.11	—	0.11	0.15	—	0.15	—	303	303	0.01	0.03	—	312
Total	14.4	78.7	0.69	81.2	< 0.005	0.11	—	0.11	0.15	—	0.15	0.00	306	306	0.01	0.03	—	315

4.4. Water Emissions by Land Use

4.4.2. Unmitigated

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

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

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	6,621	45,414	52,036	681	16.4	—	73,946
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	0.93	6.37	7.30	0.10	< 0.005	—	10.4
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	0.98	6.75	7.73	0.10	< 0.005	—	11.0
Total	—	—	—	—	—	—	—	—	—	—	—	6,623	45,427	52,051	681	16.4	—	73,968
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	6,621	45,414	52,036	681	16.4	—	73,946
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	0.93	6.37	7.30	0.10	< 0.005	—	10.4
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	0.98	6.75	7.73	0.10	< 0.005	—	11.0
Total	—	—	—	—	—	—	—	—	—	—	—	6,623	45,427	52,051	681	16.4	—	73,968
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	1,096	7,519	8,615	113	2.71	—	12,243
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	0.15	1.05	1.21	0.02	< 0.005	—	1.72

Free-Standing	—	—	—	—	—	—	—	—	—	—	—	0.16	1.12	1.28	0.02	< 0.005	—	1.82
Total	—	—	—	—	—	—	—	—	—	—	—	1,097	7,521	8,618	113	2.71	—	12,246

4.5. Waste Emissions by Land Use

4.5.2. Unmitigated

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

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	9,986	0.00	9,986	998	0.00	—	34,937
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	4.58	0.00	4.58	0.46	0.00	—	16.0
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	16.1	0.00	16.1	1.61	0.00	—	56.2
Total	—	—	—	—	—	—	—	—	—	—	—	10,006	0.00	10,006	1,000	0.00	—	35,009
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	9,986	0.00	9,986	998	0.00	—	34,937
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	4.58	0.00	4.58	0.46	0.00	—	16.0

Free-Standing	—	—	—	—	—	—	—	—	—	—	—	16.1	0.00	16.1	1.61	0.00	—	56.2
Total	—	—	—	—	—	—	—	—	—	—	—	10,006	0.00	10,006	1,000	0.00	—	35,009
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	1,653	0.00	1,653	165	0.00	—	5,784
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	0.76	0.00	0.76	0.08	0.00	—	2.65
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	2.66	0.00	2.66	0.27	0.00	—	9.30
Total	—	—	—	—	—	—	—	—	—	—	—	1,657	0.00	1,657	166	0.00	—	5,796

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,890	3,890
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.04	0.04

Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.03	0.03
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,890	3,890
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,890	3,890
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.04	0.04
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.03	0.03
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,890	3,890
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	644	644
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.01	0.01
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.01	0.01
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	644	644

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	TOG	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	TOG	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	TOG	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	TOG	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	TOG	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	TOG	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Sequest	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

5. Activity Data

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
Total all Land Uses	0.00	0.00	0.00	0.00	760,914	760,914	760,914	277,733,610

5.10. Operational Area Sources

5.10.1. Hearths

5.10.1.1. Unmitigated

Hearth Type	Unmitigated (number)
Apartments Low Rise	—
Wood Fireplaces	0
Gas Fireplaces	11
Propane Fireplaces	0
Electric Fireplaces	0
No Fireplaces	2

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)
10218.15	3,406	22,423,940	7,474,647	—

5.10.3. Landscape Equipment

Season	Unit	Value
Snow Days	day/yr	0.00
Summer Days	day/yr	250

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)
General Heavy Industry	143,338,144	705	0.0330	0.0040	639,562,148
Apartments Low Rise	49,856	705	0.0330	0.0040	211,974
Free-Standing Discount store	68,062	705	0.0330	0.0040	41,490

5.12. Operational Water and Wastewater Consumption

5.12.1. Unmitigated

Land Use	Indoor Water (gal/year)	Outdoor Water (gal/year)
General Heavy Industry	3,455,421,444	0.00
Apartments Low Rise	484,559	0.00
Free-Standing Discount store	513,323	0.00

5.13. Operational Waste Generation

5.13.1. Unmitigated

Land Use	Waste (ton/year)	Cogeneration (kWh/year)
General Heavy Industry	18,529	0.00
Apartments Low Rise	3.25	0.00

Free-Standing Discount store	29.8	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 Heavy Industry	Other commercial A/C and heat pumps	R-410A	2,088	0.30	4.00	4.00	18.0
Apartments Low Rise	Average room A/C & Other residential A/C and heat pumps	R-410A	2,088	< 0.005	2.50	2.50	10.0
Apartments Low Rise	Household refrigerators and/or freezers	R-134a	1,430	0.12	0.60	0.00	1.00
Free-Standing Discount store	Other commercial A/C and heat pumps	R-410A	2,088	< 0.005	4.00	4.00	18.0
Free-Standing Discount store	Stand-alone retail refrigerators and freezers	R-134a	1,430	0.04	1.00	0.00	1.00

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

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

5.16.2. Process Boilers

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

5.17. User Defined

Equipment Type	Fuel Type
—	—

5.18. Vegetation

5.18.1. Land Use Change

5.18.1.1. Unmitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

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

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	9.52	annual days of extreme heat
Extreme Precipitation	6.15	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	0.00	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about 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 (2040–2059 average under RCP 8.5), and consider different increments of sea level rise coupled with extreme storm events. Users may select from four model simulations to view the range in potential inundation depth 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 50 meters (m) by 50 m, or about 164 feet (ft) by 164 ft.
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	1	0	0	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	0	0	N/A
Wildfire	1	0	0	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack	N/A	N/A	N/A	N/A
Air Quality	0	0	0	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

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

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

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

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	47.4

AQ-PM	87.9
AQ-DPM	87.9
Drinking Water	48.3
Lead Risk Housing	—
Pesticides	0.00
Toxic Releases	89.5
Traffic	56.3
Effect Indicators	—
CleanUp Sites	98.7
Groundwater	81.5
Haz Waste Facilities/Generators	99.4
Impaired Water Bodies	66.7
Solid Waste	89.0
Sensitive Population	—
Asthma	94.9
Cardio-vascular	87.8
Low Birth Weights	—
Socioeconomic Factor Indicators	—
Education	—
Housing	—
Linguistic	—
Poverty	1.06
Unemployment	—

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	—
Employed	—
Median HI	—
Education	—
Bachelor's or higher	—
High school enrollment	—
Preschool enrollment	—
Transportation	—
Auto Access	—
Active commuting	—
Social	—
2-parent households	—
Voting	—
Neighborhood	—
Alcohol availability	—
Park access	—
Retail density	—
Supermarket access	—
Tree canopy	—
Housing	—
Homeownership	—
Housing habitability	—
Low-inc homeowner severe housing cost burden	—
Low-inc renter severe housing cost burden	—
Uncrowded housing	—
Health Outcomes	—

Insured adults	—
Arthritis	0.0
Asthma ER Admissions	8.8
High Blood Pressure	0.0
Cancer (excluding skin)	0.0
Asthma	0.0
Coronary Heart Disease	0.0
Chronic Obstructive Pulmonary Disease	0.0
Diagnosed Diabetes	0.0
Life Expectancy at Birth	0.0
Cognitively Disabled	99.8
Physically Disabled	10.4
Heart Attack ER Admissions	15.9
Mental Health Not Good	0.0
Chronic Kidney Disease	0.0
Obesity	0.0
Pedestrian Injuries	0.0
Physical Health Not Good	0.0
Stroke	0.0
Health Risk Behaviors	—
Binge Drinking	0.0
Current Smoker	0.0
No Leisure Time for Physical Activity	0.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	99.4

Elderly	14.8
English Speaking	0.0
Foreign-born	0.0
Outdoor Workers	98.2
Climate Change Adaptive Capacity	—
Impervious Surface Cover	0.3
Traffic Density	0.0
Traffic Access	58.9
Other Indices	—
Hardship	0.0
Other Decision Support	—
2016 Voting	0.0

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	—
Healthy Places Index Score for Project Location (b)	—
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
Land Use	Square footage/dwelling units from Project Description Table 2.0-1. Population and total lot acreage edits based on Project Description information.
Operations: Hearths	Assumed no wood fireplaces or stoves.

Vernon Westside Specific Plan - 2040 No Project Detailed Report

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Vernon Westside Specific Plan - 2040 No Project
Lead Agency	—
Land Use Scale	Plan/community
Analysis Level for Defaults	County
Windspeed (m/s)	0.50
Precipitation (days)	18.4
Location	34.00399979327008, -118.23019683044045
County	Los Angeles-South Coast
City	Vernon
Air District	South Coast AQMD
Air Basin	South Coast
TAZ	4118
EDFZ	7
Electric Utility	City of Vernon Municipal Light Department
Gas Utility	City of Vernon Gas System

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
General Heavy Industry	14,942	1000sqft	343	14,942,000	0.00	—	—	—
Apartments Low Rise	13.0	Dwelling Unit	0.81	13,780	0.00	—	38.0	—

Free-Standing Discount store	6.93	1000sqft	0.16	6,930	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

No measures selected

2. Emissions Summary

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.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	200	523	259	2,272	5.98	15.8	217	233	16.0	38.7	54.7	16,630	1,031,021	1,047,651	1,724	32.2	4,170	1,104,534
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	82.5	415	262	1,414	5.73	15.0	217	232	14.8	38.7	53.5	16,630	1,006,957	1,023,587	1,724	32.6	3,897	1,080,290
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	162	489	267	1,914	5.81	15.5	217	233	15.6	38.7	54.3	16,630	1,014,292	1,030,922	1,724	32.9	4,011	1,087,831
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	29.6	89.2	48.7	349	1.06	2.84	39.6	42.5	2.85	7.06	9.91	2,753	167,928	170,681	285	5.44	664	180,103

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	64.8	48.7	81.6	1,476	4.91	1.88	217	219	1.76	38.7	40.5	—	500,636	500,636	11.6	13.6	281	505,270
Area	116	465	5.69	651	0.04	0.89	—	0.89	1.17	—	1.17	0.00	2,949	2,949	0.12	0.25	—	3,028
Energy	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	482,010	482,010	31.1	1.96	—	483,371
Water	—	—	—	—	—	—	—	—	—	—	—	6,623	45,426	52,049	681	16.4	—	73,966
Waste	—	—	—	—	—	—	—	—	—	—	—	10,007	0.00	10,007	1,000	0.00	—	35,010
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,890	3,890
Total	200	523	259	2,272	5.98	15.8	217	233	16.0	38.7	54.7	16,630	1,031,021	1,047,651	1,724	32.2	4,170	1,104,534
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	63.6	47.8	89.4	1,270	4.70	1.88	217	219	1.76	38.7	40.5	—	479,247	479,247	11.4	14.2	7.28	483,780
Area	0.03	358	0.22	0.09	< 0.005	0.02	—	0.02	0.02	—	0.02	0.00	274	274	0.01	< 0.005	—	274
Energy	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	482,010	482,010	31.1	1.96	—	483,371
Water	—	—	—	—	—	—	—	—	—	—	—	6,623	45,426	52,049	681	16.4	—	73,966
Waste	—	—	—	—	—	—	—	—	—	—	—	10,007	0.00	10,007	1,000	0.00	—	35,010
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,890	3,890
Total	82.5	415	262	1,414	5.73	15.0	217	232	14.8	38.7	53.5	16,630	1,006,957	1,023,587	1,724	32.6	3,897	1,080,290
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	63.8	48.0	91.3	1,324	4.76	1.88	217	219	1.76	38.7	40.5	—	485,005	485,005	11.4	14.4	121	489,690
Area	79.4	431	3.77	446	0.03	0.60	—	0.60	0.79	—	0.79	0.00	1,851	1,851	0.08	0.17	—	1,905
Energy	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	482,010	482,010	31.1	1.96	—	483,371
Water	—	—	—	—	—	—	—	—	—	—	—	6,623	45,426	52,049	681	16.4	—	73,966

Waste	—	—	—	—	—	—	—	—	—	—	—	10,007	0.00	10,007	1,000	0.00	—	35,010
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,890	3,890
Total	162	489	267	1,914	5.81	15.5	217	233	15.6	38.7	54.3	16,630	1,014,292	1,030,922	1,724	32.9	4,011	1,087,831
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	11.6	8.75	16.7	242	0.87	0.34	39.6	40.0	0.32	7.06	7.39	—	80,298	80,298	1.90	2.38	20.1	81,074
Area	14.5	78.7	0.69	81.4	< 0.005	0.11	—	0.11	0.14	—	0.14	0.00	307	307	0.01	0.03	—	315
Energy	3.45	1.72	31.4	26.3	0.19	2.38	—	2.38	2.38	—	2.38	—	79,802	79,802	5.15	0.32	—	80,028
Water	—	—	—	—	—	—	—	—	—	—	—	1,097	7,521	8,617	113	2.71	—	12,246
Waste	—	—	—	—	—	—	—	—	—	—	—	1,657	0.00	1,657	166	0.00	—	5,796
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	644	644
Total	29.6	89.2	48.7	349	1.06	2.84	39.6	42.5	2.85	7.06	9.91	2,753	167,928	170,681	285	5.44	664	180,103

4. Operations Emissions Details

4.1. Mobile Emissions by Land Use

4.1.1. Unmitigated

Mobile source emissions results are presented in Sections 2.6. No further detailed breakdown of emissions is available.

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

General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	276,736	276,736	13.0	1.57	—	277,528
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	—	96.3	96.3	< 0.005	< 0.005	—	96.5
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	—	131	131	0.01	< 0.005	—	132
Total	—	—	—	—	—	—	—	—	—	—	—	—	276,963	276,963	13.0	1.57	—	277,756
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	276,736	276,736	13.0	1.57	—	277,528
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	—	96.3	96.3	< 0.005	< 0.005	—	96.5
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	—	131	131	0.01	< 0.005	—	132
Total	—	—	—	—	—	—	—	—	—	—	—	—	276,963	276,963	13.0	1.57	—	277,756
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	45,817	45,817	2.15	0.26	—	45,948
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	—	15.9	15.9	< 0.005	< 0.005	—	16.0
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	—	21.8	21.8	< 0.005	< 0.005	—	21.8

Total	—	—	—	—	—	—	—	—	—	—	—	—	45,854	45,854	2.15	0.26	—	45,986

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	204,965	204,965	18.1	0.39	—	205,534
Apartments Low Rise	0.01	< 0.005	0.05	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	67.9	67.9	0.01	< 0.005	—	68.1
Free-Standing Discount store	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	13.3	13.3	< 0.005	< 0.005	—	13.3
Total	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	205,047	205,047	18.1	0.39	—	205,615
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	204,965	204,965	18.1	0.39	—	205,534
Apartments Low Rise	0.01	< 0.005	0.05	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	67.9	67.9	0.01	< 0.005	—	68.1
Free-Standing Discount store	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	13.3	13.3	< 0.005	< 0.005	—	13.3
Total	18.9	9.45	172	144	1.03	13.1	—	13.1	13.1	—	13.1	—	205,047	205,047	18.1	0.39	—	205,615

Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	3.45	1.72	31.4	26.3	0.19	2.38	—	2.38	2.38	—	2.38	—	33,934	33,934	3.00	0.06	—	34,028
Apartments Low Rise	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	11.2	11.2	< 0.005	< 0.005	—	11.3
Free-Standing Discount store	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	2.20	2.20	< 0.005	< 0.005	—	2.21
Total	3.45	1.72	31.4	26.3	0.19	2.38	—	2.38	2.38	—	2.38	—	33,948	33,948	3.00	0.06	—	34,042

4.3. Area Emissions by Source

4.3.2. Unmitigated

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

Source	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.03	0.01	0.22	0.09	< 0.005	0.02	—	0.02	0.02	—	0.02	0.00	274	274	0.01	< 0.005	—	274
Consumer Products	—	320	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	38.0	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	116	107	5.48	651	0.04	0.87	—	0.87	1.16	—	1.16	—	2,676	2,676	0.11	0.25	—	2,754
Total	116	465	5.69	651	0.04	0.89	—	0.89	1.17	—	1.17	0.00	2,949	2,949	0.12	0.25	—	3,028

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.03	0.01	0.22	0.09	< 0.005	0.02	—	0.02	0.02	—	0.02	0.00	274	274	0.01	< 0.005	—	274
Consumer Products	—	320	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	38.0	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	0.03	358	0.22	0.09	< 0.005	0.02	—	0.02	0.02	—	0.02	0.00	274	274	0.01	< 0.005	—	274
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	0.00	3.10	3.10	< 0.005	< 0.005	—	3.11
Consumer Products	—	58.4	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	6.94	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	14.5	13.4	0.68	81.4	< 0.005	0.11	—	0.11	0.14	—	0.14	—	303	303	0.01	0.03	—	312
Total	14.5	78.7	0.69	81.4	< 0.005	0.11	—	0.11	0.14	—	0.14	0.00	307	307	0.01	0.03	—	315

4.4. Water Emissions by Land Use

4.4.2. Unmitigated

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

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

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	6,621	45,413	52,034	681	16.4	—	73,945
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	0.93	6.37	7.30	0.10	< 0.005	—	10.4
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	0.98	6.75	7.73	0.10	< 0.005	—	11.0
Total	—	—	—	—	—	—	—	—	—	—	—	6,623	45,426	52,049	681	16.4	—	73,966
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	6,621	45,413	52,034	681	16.4	—	73,945
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	0.93	6.37	7.30	0.10	< 0.005	—	10.4
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	0.98	6.75	7.73	0.10	< 0.005	—	11.0
Total	—	—	—	—	—	—	—	—	—	—	—	6,623	45,426	52,049	681	16.4	—	73,966
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	1,096	7,519	8,615	113	2.71	—	12,242
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	0.15	1.05	1.21	0.02	< 0.005	—	1.72

Free-Standing	—	—	—	—	—	—	—	—	—	—	—	0.16	1.12	1.28	0.02	< 0.005	—	1.82
Total	—	—	—	—	—	—	—	—	—	—	—	1,097	7,521	8,617	113	2.71	—	12,246

4.5. Waste Emissions by Land Use

4.5.2. Unmitigated

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

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	9,986	0.00	9,986	998	0.00	—	34,936
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	5.12	0.00	5.12	0.51	0.00	—	17.9
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	16.1	0.00	16.1	1.61	0.00	—	56.2
Total	—	—	—	—	—	—	—	—	—	—	—	10,007	0.00	10,007	1,000	0.00	—	35,010
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	9,986	0.00	9,986	998	0.00	—	34,936
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	5.12	0.00	5.12	0.51	0.00	—	17.9

Free-Standing	—	—	—	—	—	—	—	—	—	—	—	16.1	0.00	16.1	1.61	0.00	—	56.2
Total	—	—	—	—	—	—	—	—	—	—	—	10,007	0.00	10,007	1,000	0.00	—	35,010
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	1,653	0.00	1,653	165	0.00	—	5,784
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	0.85	0.00	0.85	0.08	0.00	—	2.96
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	2.66	0.00	2.66	0.27	0.00	—	9.30
Total	—	—	—	—	—	—	—	—	—	—	—	1,657	0.00	1,657	166	0.00	—	5,796

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,889	3,889
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.10	0.10

Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.03	0.03
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,890	3,890
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,889	3,889
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.10	0.10
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.03	0.03
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,890	3,890
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	644	644
Apartments Low Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.02	0.02
Free-Standing Discount store	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.01	0.01
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	644	644

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	TOG	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	TOG	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	TOG	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	TOG	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	TOG	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	TOG	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Sequest	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

5. Activity Data

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
Total all Land Uses	0.00	0.00	0.00	0.00	779,427	779,427	779,427	284,490,855

5.10. Operational Area Sources

5.10.1. Hearths

5.10.1.1. Unmitigated

Hearth Type	Unmitigated (number)
Apartments Low Rise	—
Wood Fireplaces	0
Gas Fireplaces	13
Propane Fireplaces	0
Electric Fireplaces	0
No Fireplaces	0
Conventional Wood Stoves	0
Catalytic Wood Stoves	0
Non-Catalytic Wood Stoves	0
Pellet Wood Stoves	0

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)
27904.5	9,302	22,423,395	7,474,465	—

5.10.3. Landscape Equipment

Season	Unit	Value
Snow Days	day/yr	0.00
Summer Days	day/yr	250

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)
General Heavy Industry	143,334,662	705	0.0330	0.0040	639,546,611
Apartments Low Rise	49,856	705	0.0330	0.0040	211,974
Free-Standing Discount store	68,062	705	0.0330	0.0040	41,490

5.12. Operational Water and Wastewater Consumption

5.12.1. Unmitigated

Land Use	Indoor Water (gal/year)	Outdoor Water (gal/year)
General Heavy Industry	3,455,337,500	0.00
Apartments Low Rise	484,559	0.00
Free-Standing Discount store	513,323	0.00

5.13. Operational Waste Generation

5.13.1. Unmitigated

Land Use	Waste (ton/year)	Cogeneration (kWh/year)
General Heavy Industry	18,528	0.00
Apartments Low Rise	3.25	0.00
Free-Standing Discount store	29.8	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 Heavy Industry	Other commercial A/C and heat pumps	R-410A	2,088	0.30	4.00	4.00	18.0
Apartments Low Rise	Average room A/C & Other residential A/C and heat pumps	R-410A	2,088	< 0.005	2.50	2.50	10.0
Apartments Low Rise	Household refrigerators and/or freezers	R-134a	1,430	0.12	0.60	0.00	1.00
Free-Standing Discount store	Other commercial A/C and heat pumps	R-410A	2,088	< 0.005	4.00	4.00	18.0
Free-Standing Discount store	Stand-alone retail refrigerators and freezers	R-134a	1,430	0.04	1.00	0.00	1.00

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

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

5.16.2. Process Boilers

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

5.17. User Defined

Equipment Type	Fuel Type
—	—

5.18. Vegetation

5.18.1. Land Use Change

5.18.1.1. Unmitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

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

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	9.52	annual days of extreme heat
Extreme Precipitation	6.15	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	0.00	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about 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 (2040–2059 average under RCP 8.5), and consider different increments of sea level rise coupled with extreme storm events. Users may select from four model simulations to view the range in potential inundation depth 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 50 meters (m) by 50 m, or about 164 feet (ft) by 164 ft.
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	1	0	0	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	0	0	N/A
Wildfire	1	0	0	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A

Snowpack	N/A	N/A	N/A	N/A
Air Quality	0	0	0	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

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

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

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

Indicator	Result for Project Census Tract

Exposure Indicators	—
AQ-Ozone	47.4
AQ-PM	87.9
AQ-DPM	87.9
Drinking Water	48.3
Lead Risk Housing	—
Pesticides	0.00
Toxic Releases	89.5
Traffic	56.3
Effect Indicators	—
CleanUp Sites	98.7
Groundwater	81.5
Haz Waste Facilities/Generators	99.4
Impaired Water Bodies	66.7
Solid Waste	89.0
Sensitive Population	—
Asthma	94.9
Cardio-vascular	87.8
Low Birth Weights	—
Socioeconomic Factor Indicators	—
Education	—
Housing	—
Linguistic	—
Poverty	1.06
Unemployment	—

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	—
Employed	—
Median HI	—
Education	—
Bachelor's or higher	—
High school enrollment	—
Preschool enrollment	—
Transportation	—
Auto Access	—
Active commuting	—
Social	—
2-parent households	—
Voting	—
Neighborhood	—
Alcohol availability	—
Park access	—
Retail density	—
Supermarket access	—
Tree canopy	—
Housing	—
Homeownership	—
Housing habitability	—
Low-inc homeowner severe housing cost burden	—
Low-inc renter severe housing cost burden	—
Uncrowded housing	—

Health Outcomes	—
Insured adults	—
Arthritis	0.0
Asthma ER Admissions	8.8
High Blood Pressure	0.0
Cancer (excluding skin)	0.0
Asthma	0.0
Coronary Heart Disease	0.0
Chronic Obstructive Pulmonary Disease	0.0
Diagnosed Diabetes	0.0
Life Expectancy at Birth	0.0
Cognitively Disabled	99.8
Physically Disabled	10.4
Heart Attack ER Admissions	15.9
Mental Health Not Good	0.0
Chronic Kidney Disease	0.0
Obesity	0.0
Pedestrian Injuries	0.0
Physical Health Not Good	0.0
Stroke	0.0
Health Risk Behaviors	—
Binge Drinking	0.0
Current Smoker	0.0
No Leisure Time for Physical Activity	0.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0

Children	99.4
Elderly	14.8
English Speaking	0.0
Foreign-born	0.0
Outdoor Workers	98.2
Climate Change Adaptive Capacity	—
Impervious Surface Cover	0.3
Traffic Density	0.0
Traffic Access	58.9
Other Indices	—
Hardship	0.0
Other Decision Support	—
2016 Voting	0.0

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	—
Healthy Places Index Score for Project Location (b)	—
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
Operations: Hearths	Assumed natural gas fireplaces.

Vernon Westside Specific Plan - Future 2040 Detailed Report

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Vernon Westside Specific Plan - Future 2040
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	0.50
Precipitation (days)	18.4
Location	34.008143302968094, -118.22509658271395
County	Los Angeles-South Coast
City	Vernon
Air District	South Coast AQMD
Air Basin	South Coast
TAZ	4117
EDFZ	7
Electric Utility	City of Vernon Municipal Light Department
Gas Utility	City of Vernon Gas System

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
Apartments Mid Rise	887	Dwelling Unit	23.3	810,690	0.00	—	1,780	—
Regional Shopping Center	127	1000sqft	2.92	126,989	0.00	—	—	—
Manufacturing	613	1000sqft	14.1	613,450	0.00	—	—	—

General Heavy Industry	14,367	1000sqft	330	14,366,814	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

No measures selected

2. Emissions Summary

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.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	209	553	279	2,362	6.18	17.3	221	238	17.5	39.4	56.9	17,042	1,072,225	1,089,267	1,767	32.8	4,191	1,147,418
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	85.7	440	281	1,445	5.93	16.4	221	238	16.3	39.4	55.7	17,042	1,047,616	1,064,658	1,767	33.2	3,913	1,122,624
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	168	516	273	1,979	5.93	15.9	221	237	16.0	39.4	55.4	17,042	1,038,022	1,055,064	1,767	33.4	4,029	1,113,224
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	30.6	94.1	49.8	361	1.08	2.90	40.4	43.3	2.92	7.19	10.1	2,822	171,856	174,678	292	5.54	667	184,307

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	66.0	49.6	83.1	1,503	5.00	1.91	221	223	1.79	39.4	41.2	—	509,603	509,603	11.8	13.9	286	514,319
Area	123	494	20.7	714	0.14	2.09	—	2.09	2.38	—	2.38	0.00	21,513	21,513	0.47	0.30	—	21,615
Energy	19.3	9.63	175	146	1.05	13.3	—	13.3	13.3	—	13.3	—	495,021	495,021	31.9	2.02	—	496,420
Water	—	—	—	—	—	—	—	—	—	—	—	6,720	46,087	52,807	691	16.6	—	75,043
Waste	—	—	—	—	—	—	—	—	—	—	—	10,323	0.00	10,323	1,032	0.00	—	36,115
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,906	3,906
Total	209	553	279	2,362	6.18	17.3	221	238	17.5	39.4	56.9	17,042	1,072,225	1,089,267	1,767	32.8	4,191	1,147,418
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	64.7	48.6	91.0	1,293	4.78	1.91	221	223	1.79	39.4	41.2	—	487,831	487,831	11.6	14.5	7.41	492,444
Area	1.72	381	14.7	6.26	0.09	1.19	—	1.19	1.19	—	1.19	0.00	18,677	18,677	0.35	0.04	—	18,696
Energy	19.3	9.63	175	146	1.05	13.3	—	13.3	13.3	—	13.3	—	495,021	495,021	31.9	2.02	—	496,420
Water	—	—	—	—	—	—	—	—	—	—	—	6,720	46,087	52,807	691	16.6	—	75,043
Waste	—	—	—	—	—	—	—	—	—	—	—	10,323	0.00	10,323	1,032	0.00	—	36,115
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,906	3,906
Total	85.7	440	281	1,445	5.93	16.4	221	238	16.3	39.4	55.7	17,042	1,047,616	1,064,658	1,767	33.2	3,913	1,122,624
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	65.0	48.8	92.9	1,348	4.84	1.91	221	223	1.79	39.4	41.2	—	493,692	493,692	11.7	14.6	123	498,460
Area	83.4	457	5.11	485	0.03	0.70	—	0.70	0.90	—	0.90	0.00	3,222	3,222	0.11	0.19	—	3,280
Energy	19.3	9.63	175	146	1.05	13.3	—	13.3	13.3	—	13.3	—	495,021	495,021	31.9	2.02	—	496,420
Water	—	—	—	—	—	—	—	—	—	—	—	6,720	46,087	52,807	691	16.6	—	75,043

Waste	—	—	—	—	—	—	—	—	—	—	—	10,323	0.00	10,323	1,032	0.00	—	36,115
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,906	3,906
Total	168	516	273	1,979	5.93	15.9	221	237	16.0	39.4	55.4	17,042	1,038,022	1,055,064	1,767	33.4	4,029	1,113,224
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	11.9	8.91	17.0	246	0.88	0.35	40.4	40.7	0.33	7.19	7.52	—	81,736	81,736	1.93	2.42	20.4	82,526
Area	15.2	83.5	0.93	88.5	0.01	0.13	—	0.13	0.16	—	0.16	0.00	533	533	0.02	0.03	—	543
Energy	3.51	1.76	31.9	26.6	0.19	2.43	—	2.43	2.43	—	2.43	—	81,956	81,956	5.28	0.33	—	82,188
Water	—	—	—	—	—	—	—	—	—	—	—	1,113	7,630	8,743	114	2.75	—	12,424
Waste	—	—	—	—	—	—	—	—	—	—	—	1,709	0.00	1,709	171	0.00	—	5,979
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	647	647
Total	30.6	94.1	49.8	361	1.08	2.90	40.4	43.3	2.92	7.19	10.1	2,822	171,856	174,678	292	5.54	667	184,307

4. Operations Emissions Details

4.1. Mobile Emissions by Land Use

4.1.1. Unmitigated

Mobile source emissions results are presented in Sections 2.6. No further detailed breakdown of emissions is available.

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

Apartments	—	—	—	—	—	—	—	—	—	—	—	—	6,278	6,278	0.29	0.04	—	6,296
Regional Shopping Center	—	—	—	—	—	—	—	—	—	—	—	—	2,408	2,408	0.11	0.01	—	2,415
Manufacturing	—	—	—	—	—	—	—	—	—	—	—	—	11,361	11,361	0.53	0.06	—	11,394
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	266,083	266,083	12.5	1.51	—	266,844
Total	—	—	—	—	—	—	—	—	—	—	—	—	286,130	286,130	13.4	1.62	—	286,949
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	6,278	6,278	0.29	0.04	—	6,296
Regional Shopping Center	—	—	—	—	—	—	—	—	—	—	—	—	2,408	2,408	0.11	0.01	—	2,415
Manufacturing	—	—	—	—	—	—	—	—	—	—	—	—	11,361	11,361	0.53	0.06	—	11,394
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	266,083	266,083	12.5	1.51	—	266,844
Total	—	—	—	—	—	—	—	—	—	—	—	—	286,130	286,130	13.4	1.62	—	286,949
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	1,039	1,039	0.05	0.01	—	1,042
Regional Shopping Center	—	—	—	—	—	—	—	—	—	—	—	—	399	399	0.02	< 0.005	—	400
Manufacturing	—	—	—	—	—	—	—	—	—	—	—	—	1,881	1,881	0.09	0.01	—	1,886

General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	44,053	44,053	2.06	0.25	—	44,179
Total	—	—	—	—	—	—	—	—	—	—	—	—	47,372	47,372	2.22	0.27	—	47,508

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.29	0.15	2.49	1.06	0.02	0.20	—	0.20	0.20	—	0.20	—	3,157	3,157	0.28	0.01	—	3,166
Regional Shopping Center	0.02	0.01	0.20	0.17	< 0.005	0.02	—	0.02	0.02	—	0.02	—	244	244	0.02	< 0.005	—	244
Manufacturing	0.78	0.39	7.05	5.92	0.04	0.54	—	0.54	0.54	—	0.54	—	8,415	8,415	0.74	0.02	—	8,438
General Heavy Industry	18.2	9.08	165	139	0.99	12.6	—	12.6	12.6	—	12.6	—	197,075	197,075	17.4	0.37	—	197,622
Total	19.3	9.63	175	146	1.05	13.3	—	13.3	13.3	—	13.3	—	208,891	208,891	18.5	0.39	—	209,471
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.29	0.15	2.49	1.06	0.02	0.20	—	0.20	0.20	—	0.20	—	3,157	3,157	0.28	0.01	—	3,166
Regional Shopping Center	0.02	0.01	0.20	0.17	< 0.005	0.02	—	0.02	0.02	—	0.02	—	244	244	0.02	< 0.005	—	244

Manufacturing	0.78	0.39	7.05	5.92	0.04	0.54	—	0.54	0.54	—	0.54	—	8,415	8,415	0.74	0.02	—	8,438
General Heavy Industry	18.2	9.08	165	139	0.99	12.6	—	12.6	12.6	—	12.6	—	197,075	197,075	17.4	0.37	—	197,622
Total	19.3	9.63	175	146	1.05	13.3	—	13.3	13.3	—	13.3	—	208,891	208,891	18.5	0.39	—	209,471
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.05	0.03	0.45	0.19	< 0.005	0.04	—	0.04	0.04	—	0.04	—	523	523	0.05	< 0.005	—	524
Regional Shopping Center	< 0.005	< 0.005	0.04	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	40.3	40.3	< 0.005	< 0.005	—	40.5
Manufacturing	0.14	0.07	1.29	1.08	0.01	0.10	—	0.10	0.10	—	0.10	—	1,393	1,393	0.12	< 0.005	—	1,397
General Heavy Industry	3.32	1.66	30.1	25.3	0.18	2.29	—	2.29	2.29	—	2.29	—	32,628	32,628	2.89	0.06	—	32,719
Total	3.51	1.76	31.9	26.6	0.19	2.43	—	2.43	2.43	—	2.43	—	34,584	34,584	3.06	0.07	—	34,680

4.3. Area Emissions by Source

4.3.2. Unmitigated

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

Source	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	1.72	0.86	14.7	6.26	0.09	1.19	—	1.19	1.19	—	1.19	0.00	18,677	18,677	0.35	0.04	—	18,696
Consumer Products	—	341	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Architectural	—	39.8	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	122	112	5.99	708	0.04	0.90	—	0.90	1.19	—	1.19	—	2,836	2,836	0.12	0.27	—	2,919
Total	123	494	20.7	714	0.14	2.09	—	2.09	2.38	—	2.38	0.00	21,513	21,513	0.47	0.30	—	21,615
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	1.72	0.86	14.7	6.26	0.09	1.19	—	1.19	1.19	—	1.19	0.00	18,677	18,677	0.35	0.04	—	18,696
Consumer Products	—	341	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	39.8	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	1.72	381	14.7	6.26	0.09	1.19	—	1.19	1.19	—	1.19	0.00	18,677	18,677	0.35	0.04	—	18,696
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.02	0.01	0.18	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	212	212	< 0.005	< 0.005	—	212
Consumer Products	—	62.2	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	7.26	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	15.2	14.0	0.75	88.5	0.01	0.11	—	0.11	0.15	—	0.15	—	322	322	0.01	0.03	—	331
Total	15.2	83.5	0.93	88.5	0.01	0.13	—	0.13	0.16	—	0.16	0.00	533	533	0.02	0.03	—	543

4.4. Water Emissions by Land Use

4.4.2. Unmitigated

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

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	63.4	435	498	6.52	0.16	—	708
Regional Shopping Center	—	—	—	—	—	—	—	—	—	—	—	18.0	124	142	1.85	0.04	—	201
Manufacturing	—	—	—	—	—	—	—	—	—	—	—	272	1,864	2,136	28.0	0.67	—	3,036
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	6,366	43,665	50,031	655	15.8	—	71,098
Total	—	—	—	—	—	—	—	—	—	—	—	6,720	46,087	52,807	691	16.6	—	75,043
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	63.4	435	498	6.52	0.16	—	708
Regional Shopping Center	—	—	—	—	—	—	—	—	—	—	—	18.0	124	142	1.85	0.04	—	201
Manufacturing	—	—	—	—	—	—	—	—	—	—	—	272	1,864	2,136	28.0	0.67	—	3,036
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	6,366	43,665	50,031	655	15.8	—	71,098
Total	—	—	—	—	—	—	—	—	—	—	—	6,720	46,087	52,807	691	16.6	—	75,043

Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	10.5	71.9	82.4	1.08	0.03	—	117
Regional Shopping Center	—	—	—	—	—	—	—	—	—	—	—	2.98	20.5	23.5	0.31	0.01	—	33.3
Manufacturing	—	—	—	—	—	—	—	—	—	—	—	45.0	309	354	4.63	0.11	—	503
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	1,054	7,229	8,283	108	2.61	—	11,771
Total	—	—	—	—	—	—	—	—	—	—	—	1,113	7,630	8,743	114	2.75	—	12,424

4.5. Waste Emissions by Land Use

4.5.2. Unmitigated

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

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	240	0.00	240	24.0	0.00	—	838
Regional Shopping Center	—	—	—	—	—	—	—	—	—	—	—	71.9	0.00	71.9	7.18	0.00	—	251
Manufacturing	—	—	—	—	—	—	—	—	—	—	—	410	0.00	410	41.0	0.00	—	1,434
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	9,601	0.00	9,601	960	0.00	—	33,591

Total	—	—	—	—	—	—	—	—	—	—	—	10,323	0.00	10,323	1,032	0.00	—	36,115
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	240	0.00	240	24.0	0.00	—	838
Regional Shopping Center	—	—	—	—	—	—	—	—	—	—	—	71.9	0.00	71.9	7.18	0.00	—	251
Manufacturing	—	—	—	—	—	—	—	—	—	—	—	410	0.00	410	41.0	0.00	—	1,434
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	9,601	0.00	9,601	960	0.00	—	33,591
Total	—	—	—	—	—	—	—	—	—	—	—	10,323	0.00	10,323	1,032	0.00	—	36,115
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	39.7	0.00	39.7	3.97	0.00	—	139
Regional Shopping Center	—	—	—	—	—	—	—	—	—	—	—	11.9	0.00	11.9	1.19	0.00	—	41.6
Manufacturing	—	—	—	—	—	—	—	—	—	—	—	67.9	0.00	67.9	6.78	0.00	—	237
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	1,590	0.00	1,590	159	0.00	—	5,561
Total	—	—	—	—	—	—	—	—	—	—	—	1,709	0.00	1,709	171	0.00	—	5,979

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	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	5.81	5.81
Regional Shopping Center	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.61	0.61
Manufacturing	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	160	160
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,740	3,740
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,906	3,906
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	5.81	5.81
Regional Shopping Center	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.61	0.61
Manufacturing	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	160	160
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,740	3,740
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	3,906	3,906
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Apartments	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.96	0.96
Regional Shopping Center	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.10	0.10
Manufacturing	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	26.4	26.4
General Heavy Industry	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	619	619
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	647	647

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	TOG	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	TOG	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	TOG	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	TOG	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	TOG	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	TOG	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

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

5. Activity Data

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
Total all Land Uses	0.00	0.00	0.00	0.00	793,387	793,387	793,387	289,586,255

5.10. Operational Area Sources

5.10.1. Hearths

5.10.1.1. Unmitigated

Hearth Type	Unmitigated (number)
Apartments Mid Rise	—
Wood Fireplaces	0

Gas Fireplaces	887
Propane Fireplaces	0
Electric Fireplaces	0
No Fireplaces	0
Conventional Wood Stoves	0
Catalytic Wood Stoves	0
Non-Catalytic Wood Stoves	0
Pellet Wood Stoves	0

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)
1641647.25	547,216	22,660,880	7,553,627	—

5.10.3. Landscape Equipment

Season	Unit	Value
Snow Days	day/yr	0.00
Summer Days	day/yr	250

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)
Apartments Mid Rise	3,251,595	705	0.0330	0.0040	9,851,770
Regional Shopping Center	1,247,205	705	0.0330	0.0040	760,276
Manufacturing	5,884,664	705	0.0330	0.0040	26,256,851

General Heavy Industry	137,817,055	705	0.0330	0.0040	614,927,533

5.12. Operational Water and Wastewater Consumption

5.12.1. Unmitigated

Land Use	Indoor Water (gal/year)	Outdoor Water (gal/year)
Apartments Mid Rise	33,061,861	0.00
Regional Shopping Center	9,406,395	0.00
Manufacturing	141,860,313	0.00
General Heavy Industry	3,322,325,738	0.00

5.13. Operational Waste Generation

5.13.1. Unmitigated

Land Use	Waste (ton/year)	Cogeneration (kWh/year)
Apartments Mid Rise	222	0.00
Regional Shopping Center	133	0.00
Manufacturing	761	0.00
General Heavy Industry	17,815	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
Apartments Mid Rise	Average room A/C & Other residential A/C and heat pumps	R-410A	2,088	< 0.005	2.50	2.50	10.0

Apartments Mid Rise	Household refrigerators and/or freezers	R-134a	1,430	0.12	0.60	0.00	1.00
Regional Shopping Center	Other commercial A/C and heat pumps	R-410A	2,088	< 0.005	4.00	4.00	18.0
Regional Shopping Center	Stand-alone retail refrigerators and freezers	R-134a	1,430	0.04	1.00	0.00	1.00
Manufacturing	Other commercial A/C and heat pumps	R-410A	2,088	0.30	4.00	4.00	18.0
General Heavy Industry	Other commercial A/C and heat pumps	R-410A	2,088	0.30	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

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

5.16.2. Process Boilers

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

5.17. User Defined

Equipment Type	Fuel Type
—	—

5.18. Vegetation

5.18.1. Land Use Change

5.18.1.1. Unmitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

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

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	9.52	annual days of extreme heat
Extreme Precipitation	6.15	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	0.00	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about 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 (2040–2059 average under RCP 8.5), and consider different increments of sea level rise coupled with extreme storm events. Users may select from four model simulations to view the range in potential inundation depth 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 50 meters (m) by 50 m, or about 164 feet (ft) by 164 ft.
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	1	0	0	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	1	0	0	N/A
Wildfire	1	0	0	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	0	0	0	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	1	1	1	2
Extreme Precipitation	N/A	N/A	N/A	N/A

Sea Level Rise	1	1	1	2
Wildfire	1	1	1	2
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	1	1	1	2

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

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

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	47.4
AQ-PM	87.9
AQ-DPM	87.9
Drinking Water	48.3
Lead Risk Housing	—
Pesticides	0.00
Toxic Releases	89.5
Traffic	56.3
Effect Indicators	—

CleanUp Sites	98.7
Groundwater	81.5
Haz Waste Facilities/Generators	99.4
Impaired Water Bodies	66.7
Solid Waste	89.0
Sensitive Population	—
Asthma	94.9
Cardio-vascular	87.8
Low Birth Weights	—
Socioeconomic Factor Indicators	—
Education	—
Housing	—
Linguistic	—
Poverty	1.06
Unemployment	—

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	—
Employed	—
Median HI	—
Education	—
Bachelor's or higher	—
High school enrollment	—
Preschool enrollment	—

Transportation	—
Auto Access	—
Active commuting	—
Social	—
2-parent households	—
Voting	—
Neighborhood	—
Alcohol availability	—
Park access	—
Retail density	—
Supermarket access	—
Tree canopy	—
Housing	—
Homeownership	—
Housing habitability	—
Low-inc homeowner severe housing cost burden	—
Low-inc renter severe housing cost burden	—
Uncrowded housing	—
Health Outcomes	—
Insured adults	—
Arthritis	0.0
Asthma ER Admissions	8.8
High Blood Pressure	0.0
Cancer (excluding skin)	0.0
Asthma	0.0
Coronary Heart Disease	0.0
Chronic Obstructive Pulmonary Disease	0.0

Diagnosed Diabetes	0.0
Life Expectancy at Birth	0.0
Cognitively Disabled	99.8
Physically Disabled	10.4
Heart Attack ER Admissions	15.9
Mental Health Not Good	0.0
Chronic Kidney Disease	0.0
Obesity	0.0
Pedestrian Injuries	0.0
Physical Health Not Good	0.0
Stroke	0.0
Health Risk Behaviors	—
Binge Drinking	0.0
Current Smoker	0.0
No Leisure Time for Physical Activity	0.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	99.4
Elderly	14.8
English Speaking	0.0
Foreign-born	0.0
Outdoor Workers	98.2
Climate Change Adaptive Capacity	—
Impervious Surface Cover	0.3
Traffic Density	0.0
Traffic Access	58.9

Other Indices	—
Hardship	0.0
Other Decision Support	—
2016 Voting	0.0

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	—
Healthy Places Index Score for Project Location (b)	—
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
Land Use	Per Project Description
Operations: Hearths	assumes all gas fireplaces.

APPENDIX 3.3

Tribal Consultation

811 West 7th Street, Suite 200
Los Angeles, California 90017
www.impactsciences.com

Sent via email on May 9, 2022 to: Andrew.Green@nahc.ca.gov

NATIVE AMERICAN HERITAGE COMMISSION
Environmental and Cultural Department
1550 Harbor Boulevard, Suite 100
West Sacramento, CA 95691
(916) 373-3710

Information Below is Required for a Sacred Lands File Search

Project: City of Vernon Westside Specific Plan

County: Los Angeles

USGS Quadrangle Name: Los Angeles, California

Township: 2 South **Range**: 13 West

Company/Firm/Agency: Impact Sciences, Inc.

Contact Person: Yasmeen Hussain

Street Address: 811 W. 7th Street, Suite 200

City: Los Angeles **Zip**: 90017

Phone: (909) 472-1464

Email: yhussain@impactsciences.com

PROJECT DESCRIPTION

The City of Vernon (City) is preparing a proposed specific plan to spur development in the western portion of Vernon. The purpose of the Vernon Westside Specific Plan is to reinvigorate the City's competitive advantage as a center of production; strengthen and provide long-term stability to the City's fiscal position; increase the residential population; diversify and reorient

the Westside's land uses to take advantage of changes in the economic landscape of Southern California; increase amenities available to local residents and workers; and create a physical environmental that is supportive of diverse land uses, welcoming to the larger region, and enhancing to the City's image and identity.

We appreciate your assistance in responding to this query. Your response will help ensure that our analysis is accurate and complete. To ensure a timely completion of our analysis, please provide your response (via mail, or email) no later than May 30, 2022.

If you have any questions or require any additional information, please contact me at (909) 472-1464 or via email at yhussain@impactsciences.com.

Sincerely,

Yasmeen Hussain

Yasmeen Hussain
Planner

IMPACT SCIENCES

811 W. 7th Street, Suite 200
Los Angeles, CA 90017
yhussain@impactsciences.com

Attachments: Notice of Preparation

Figure 1 – Regional Context

Figure 2 – Plan Area

NATIVE AMERICAN HERITAGE COMMISSION

NAHC HEADQUARTERS
1550 Harbor Boulevard
Suite 100
West Sacramento,
California 95691
(916) 373-3710
nahc@nahc.ca.gov

June 1, 2022

Yasmeen Hussain
Impact Sciences, Inc.

Via Email to: yhussain@impactsciencs.com

Re: City of Vernon Westside Specific Plan Project, Los Angeles County

Dear Ms. Hussain:

A record search of the Native American Heritage Commission (NAHC) Sacred Lands File (SLF) was completed for the information you have submitted for the above referenced project. The results were negative. However, the absence of specific site information in the SLF does not indicate the absence of cultural resources in any project area. Other sources of cultural resources should also be contacted for information regarding known and recorded sites.

Attached is a list of Native American tribes who may also have knowledge of cultural resources in the project area. This list should provide a starting place in locating areas of potential adverse impact within the proposed project area. I suggest you contact all of those indicated; if they cannot supply information, they might recommend others with specific knowledge. By contacting all those listed, your organization will be better able to respond to claims of failure to consult with the appropriate tribe. If a response has not been received within two weeks of notification, the Commission requests that you follow-up with a telephone call or email to ensure that the project information has been received.

If you receive notification of change of addresses and phone numbers from tribes, please notify me. With your assistance, we can assure that our lists contain current information.

If you have any questions or need additional information, please contact me at my email address: Pricilla.Torres-Fuentes@nahc.ca.gov.

Sincerely,

Pricilla Torres-Fuentes

Pricilla Torres-Fuentes
Cultural Resources Analyst

Attachment

Native American Heritage Commission
Native American Contact List
Los Angeles County
6/1/2022

Gabrieleno Band of Mission Indians - Kizh Nation
Andrew Salas, Chairperson
P.O. Box 393 — Gabrieleno
Covina, CA, 91723
Phone: (626) 926 - 4131
admin@gabrielenoindians.org

Gabrieleno/Tongva San Gabriel Band of Mission Indians
Anthony Morales, Chairperson
P.O. Box 693 — Gabrieleno
San Gabriel, CA, 91778
Phone: (626) 483 - 3564
Fax: (626) 286-1262
GTTribalcouncil@aol.com

Gabrielino /Tongva Nation
Sandonne Goad, Chairperson
106 1/2 Judge John Aiso St., #231 — Gabrielino
Los Angeles, CA, 90012
Phone: (951) 807 - 0479
sgoad@gabrielino-tongva.com

Gabrielino Tongva Indians of California Tribal Council
Robert Dorame, Chairperson
P.O. Box 490 — Gabrielino
Bellflower, CA, 90707
Phone: (562) 761 - 6417
Fax: (562) 761-6417
gtongva@gmail.com

Gabrielino Tongva Indians of California Tribal Council
Christina Conley, Tribal Consultant and Administrator
P.O. Box 941078 — Gabrielino
Simi Valley, CA, 93094
Phone: (626) 407 - 8761
christina.marsden@alumni.usc.edu

Gabrielino-Tongva Tribe
Charles Alvarez,
23454 Vanowen Street — Gabrielino
West Hills, CA, 91307
Phone: (310) 403 - 6048
roadkingcharles@aol.com

Santa Rosa Band of Cahuilla Indians
Lovina Redner, Tribal Chair
P.O. Box 391820 — Cahuilla
Anza, CA, 92539
Phone: (951) 659 - 2700
Fax: (951) 659-2228
lsaul@santarosa-nsn.gov

Soboba Band of Luiseno Indians
Isaiah Vivanco, Chairperson
P. O. Box 487 — Cahuilla
San Jacinto, CA, 92581 — Luiseno
Phone: (951) 654 - 5544
Fax: (951) 654-4198
ivivanco@soboba-nsn.gov

Soboba Band of Luiseno Indians
Joseph Ontiveros, Cultural Resource Department
P.O. BOX 487 — Cahuilla
San Jacinto, CA, 92581 — Luiseno
Phone: (951) 663 - 5279
Fax: (951) 654-4198
jontiveros@soboba-nsn.gov

This list is current only as of the date of this document. Distribution of this list does not relieve any person of statutory responsibility as defined in Section 7050.5 of the Health and Safety Code, Section 5097.94 of the Public Resource Section 5097.98 of the Public Resources Code.

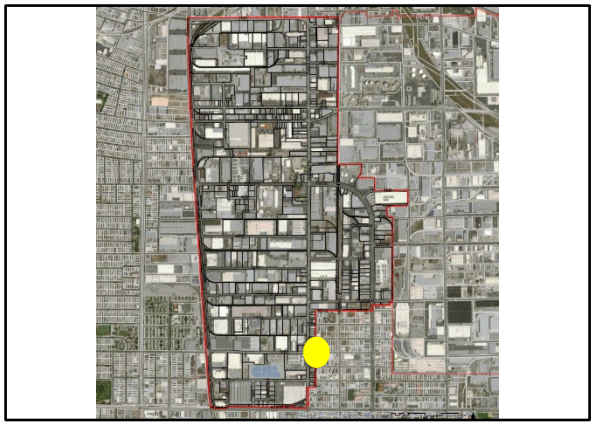
This list is only applicable for contacting local Native Americans with regard to cultural resources assessment for the proposed City of Vernon Westside Specific Plan Project, Los Angeles County.

APPENDIX 3.8

Noise and Vibration Data

NOISE MONITORING FIELD REPORT

Site Map



Project Name: Vernon Westside Specific Plan

Monitoring Address: Santa Fe Ave./53rd St.

Date: 08/29/2022 Site Number: 1

Measured By: Raul Castillo

Measurement Start Time: 1:15 p.m.

Measurement End Time: 1:30 p.m.

Total Measurement Time: 15 min.

Noise Meter Model: Larson Davis Soundtrack LxT Calibration: 94.0 (dBA)

Meter Setting: A-Weighted Sound Level (SLOW)

Session File Name: LxT_Data.173

Primary Noise Sources: Traffic

Data Summary

Noise Scale	Noise Level (dBA)
L_{eq}	73.4
L_{max}	83.4
L_{min}	57.2

Other Noise Sources During Monitoring

1. _____ Time: _____
2. _____ Time: _____
3. _____ Time: _____
4. _____ Time: _____
5. _____ Time: _____

Additional Notes:

_____
_____
_____
_____
_____

IMPACT SCIENCES

Measurement Report

Report Summary

Meter's File Name	LxT_Data.173.s	Computer's File Name	LxT_0005667-20220829 131513-LxT_Data.173.ldbin
Meter	LxT1 0005667		
Firmware	2.302		
User		Location	
Job Description			
Note			
Start Time	2022-08-29 13:15:13	Duration	0:15:00.0
End Time	2022-08-29 13:30:13	Run Time	0:15:00.0
		Pause Time	0:00:00.0

Results

Overall Metrics

LA_{eq}	73.4 dB		
LAE	102.9 dB	SEA	--- dB
EA	2.2 mPa²h		
EA8	69.3 mPa²h		
EA40	346.6 mPa²h		
LA_{peak}	98.8 dB	2022-08-29 13:23:22	
LAS_{max}	83.4 dB	2022-08-29 13:23:23	
LAS_{min}	57.2 dB	2022-08-29 13:19:00	
LA_{eq}	73.4 dB		
LC_{eq}	80.7 dB	LC_{eq} - LA_{eq}	7.4 dB
LAI_{eq}	74.5 dB	LAI_{eq} - LA_{eq}	1.1 dB

Exceedances

	Count	Duration
LAS > 85.0 dB	0	0:00:00.0
LAS > 115.0 dB	0	0:00:00.0
LApeak > 135.0 dB	0	0:00:00.0
LApeak > 137.0 dB	0	0:00:00.0
LApeak > 140.0 dB	0	0:00:00.0

Community Noise

LDN	LDay	LNight
--- dB	--- dB	0.0 dB

LDEN	LDay	LEve	LNight
--- dB	--- dB	--- dB	--- dB

Any Data

	A		C		Z	
	Level	Time Stamp	Level	Time Stamp	Level	Time Stamp
L_{eq}	73.4 dB		80.7 dB		--- dB	
$L_{S(max)}$	83.4 dB	2022-08-29 13:23:23	--- dB		--- dB	
$L_{S(min)}$	57.2 dB	2022-08-29 13:19:00	--- dB		--- dB	
$L_{Peak(max)}$	98.8 dB	2022-08-29 13:23:22	--- dB		--- dB	

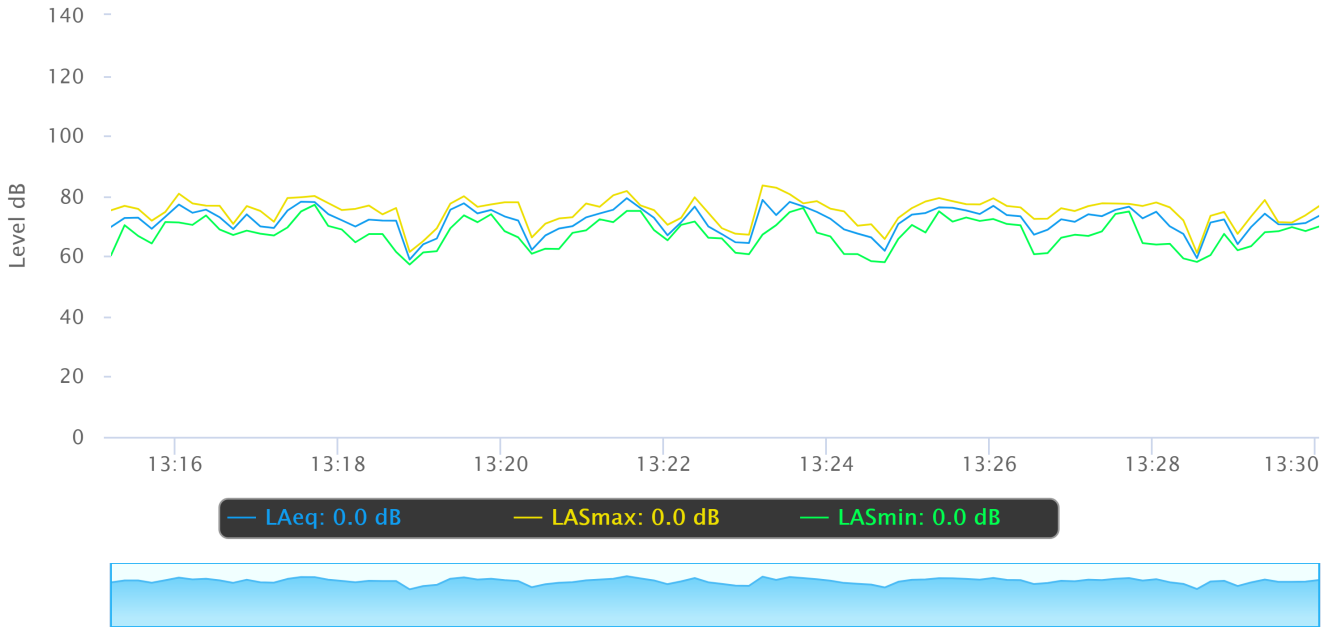
Overloads

Count	Duration	OBA Count	OBA Duration
0	0:00:00.0	0	0:00:00.0

Statistics

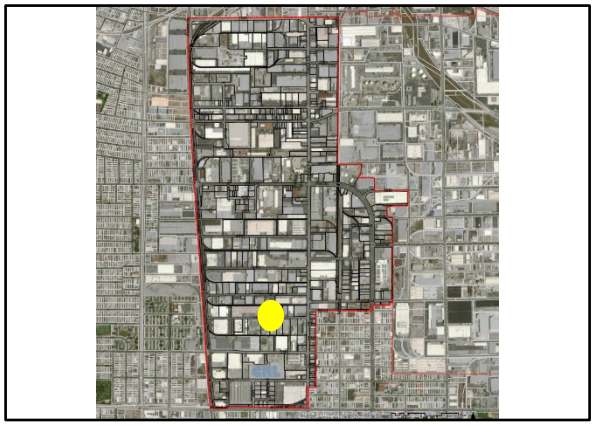
LAS 0.0	--- dB
LAS 0.0	--- dB
LAS 10.0	76.8 dB
LAS 33.3	73.8 dB
LAS 66.7	69.5 dB
LAS 90.0	63.2 dB

Time History



NOISE MONITORING FIELD REPORT

Site Map



Project Name: Vernon Westside Specific Plan

Monitoring Address: 2315 E. 52nd St.

Date: 08/29/2022 Site Number: 2

Measured By: Raul Castillo

Measurement Start Time: 1:39 p.m.

Measurement End Time: 1:54 p.m.

Total Measurement Time: 15 min.

Noise Meter Model: Larson Davis Soundtrack LxT Calibration: 94.0 (dBA)

Meter Setting: A-Weighted Sound Level (SLOW)

Session File Name: LxT_Data.174

Primary Noise Sources: Traffic, truck noise from deliveries

Data Summary

Noise Scale	Noise Level (dBA)
L_{eq}	66.2
L_{max}	82.6
L_{min}	55.9

Other Noise Sources During Monitoring

1. _____ Time: _____
2. _____ Time: _____
3. _____ Time: _____
4. _____ Time: _____
5. _____ Time: _____

Additional Notes:

_____
_____
_____
_____
_____

IMPACT SCIENCES

Measurement Report

Report Summary

Meter's File Name	LxT_Data.174.s	Computer's File Name	LxT_0005667-20220829 133912-LxT_Data.174.ldbin
Meter	LxT1 0005667		
Firmware	2.302		
User		Location	
Job Description			
Note			
Start Time	2022-08-29 13:39:12	Duration	0:15:00.0
End Time	2022-08-29 13:54:12	Run Time	0:15:00.0
Pause Time	0:00:00.0		

Results

Overall Metrics

LA_{eq}	66.2 dB		
LAE	95.8 dB	SEA	--- dB
EA	418.4 µPa²h		
EA8	13.4 mPa²h		
EA40	67.0 mPa²h		
LA_{peak}	97.1 dB	2022-08-29 13:53:10	
LAS_{max}	82.6 dB	2022-08-29 13:53:10	
LAS_{min}	55.9 dB	2022-08-29 13:48:27	
LA_{eq}	66.2 dB		
LC_{eq}	75.4 dB	LC_{eq} - LA_{eq}	9.2 dB
LAI_{eq}	67.9 dB	LAI_{eq} - LA_{eq}	1.7 dB

Exceedances

	Count	Duration
LAS > 85.0 dB	0	0:00:00.0
LAS > 115.0 dB	0	0:00:00.0
LApeak > 135.0 dB	0	0:00:00.0
LApeak > 137.0 dB	0	0:00:00.0
LApeak > 140.0 dB	0	0:00:00.0

Community Noise

LDN	LDay	LNight
--- dB	--- dB	0.0 dB

LDEN	LDay	LEve	LNight
--- dB	--- dB	--- dB	--- dB

Any Data

	A		C		Z	
	Level	Time Stamp	Level	Time Stamp	Level	Time Stamp
L_{eq}	66.2 dB		75.4 dB		--- dB	
$L_{S(max)}$	82.6 dB	2022-08-29 13:53:10	--- dB		--- dB	
$L_{S(min)}$	55.9 dB	2022-08-29 13:48:27	--- dB		--- dB	
$L_{Peak(max)}$	97.1 dB	2022-08-29 13:53:10	--- dB		--- dB	

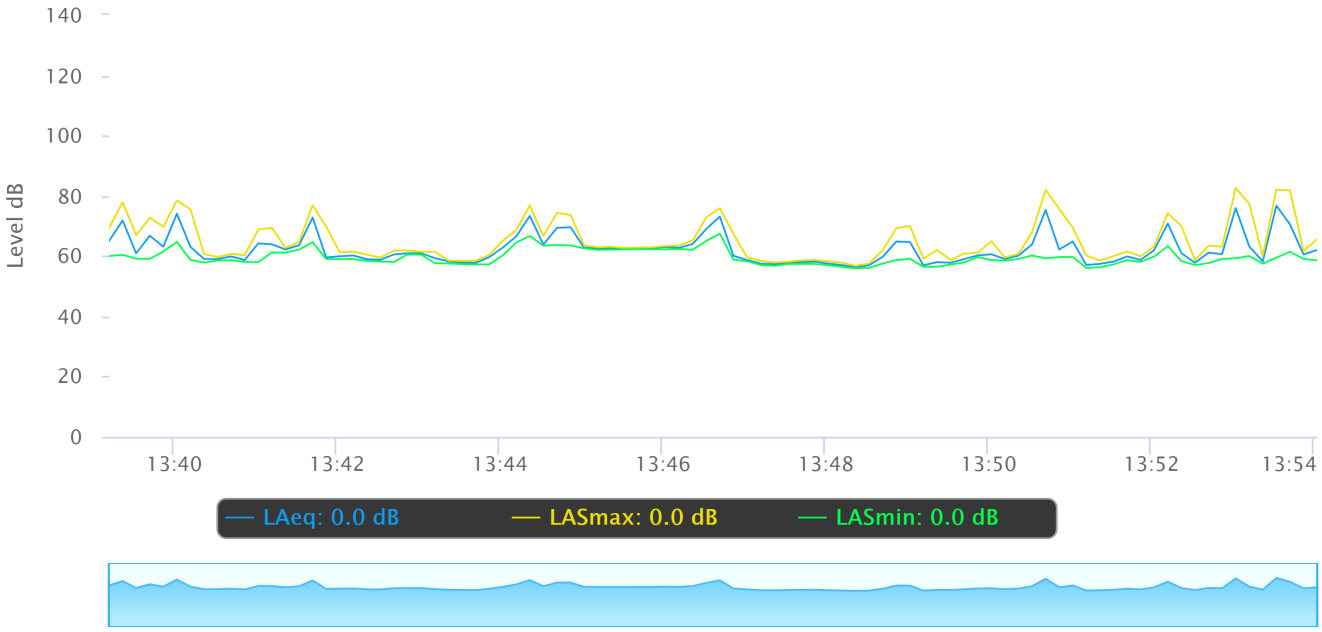
Overloads

Count	Duration	OBA Count	OBA Duration
0	0:00:00.0	0	0:00:00.0

Statistics

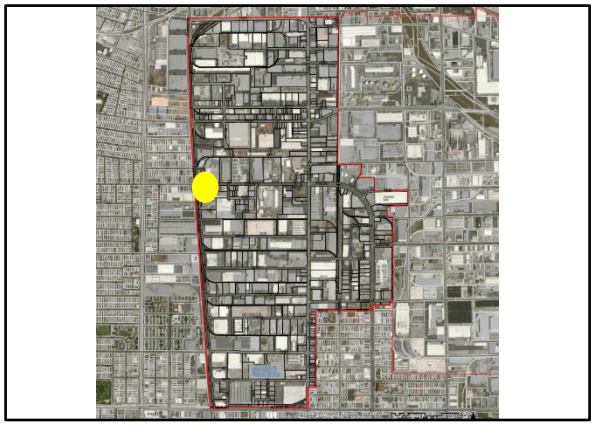
LAS 0.0	--- dB
LAS 0.0	--- dB
LAS 10.0	68.3 dB
LAS 33.3	62.5 dB
LAS 66.7	59.1 dB
LAS 90.0	57.5 dB

Time History



NOISE MONITORING FIELD REPORT

Site Map



Project Name: Vernon Westside Specific Plan

Monitoring Address: Vernon Ave./Alameda St.

Date: 08/29/2022 Site Number: 3

Measured By: Raul Castillo

Measurement Start Time: 2:26 p.m.

Measurement End Time: 2:41 p.m.

Total Measurement Time: 15 min.

Noise Meter Model: Larson Davis Soundtrack LxT Calibration: 94.0 (dBA)

Meter Setting: A-Weighted Sound Level (SLOW)

Session File Name: LxT_Data.175

Primary Noise Sources: Traffic

Data Summary

Noise Scale	Noise Level (dBA)
L_{eq}	76.1
L_{max}	90.5
L_{min}	61.1

Other Noise Sources During Monitoring

1. _____ Time: _____
2. _____ Time: _____
3. _____ Time: _____
4. _____ Time: _____
5. _____ Time: _____

Additional Notes:

_____

_____

_____

_____

_____

IMPACT SCIENCES

Measurement Report

Report Summary

Meter's File Name	LxT_Data.175.s	Computer's File Name	LxT_0005667-20220829 142616-LxT_Data.175.ldbin
Meter	LxT1 0005667		
Firmware	2.302		
User		Location	
Job Description			
Note			
Start Time	2022-08-29 14:26:16	Duration	0:15:00.0
End Time	2022-08-29 14:41:16	Run Time	0:15:00.0
		Pause Time	0:00:00.0

Results

Overall Metrics

LA_{eq}	76.1 dB		
LAE	105.6 dB	SEA	--- dB
EA	4.1 mPa²h		
EA8	130.6 mPa²h		
EA40	652.8 mPa²h		
LA_{peak}	103.8 dB	2022-08-29 14:36:58	
LAS_{max}	90.5 dB	2022-08-29 14:31:43	
LAS_{min}	61.1 dB	2022-08-29 14:30:00	
LA_{eq}	76.1 dB		
LC_{eq}	85.4 dB	LC_{eq} - LA_{eq}	9.3 dB
LAI_{eq}	78.5 dB	LAI_{eq} - LA_{eq}	2.4 dB

Exceedances

	Count	Duration
LAS > 85.0 dB	12	0:00:25.3
LAS > 115.0 dB	0	0:00:00.0
LApeak > 135.0 dB	0	0:00:00.0
LApeak > 137.0 dB	0	0:00:00.0
LApeak > 140.0 dB	0	0:00:00.0

Community Noise

LDN	LDay	LNight
--- dB	--- dB	0.0 dB

LDEN	LDay	LEve	LNight
--- dB	--- dB	--- dB	--- dB

Any Data

	A		C		Z	
	Level	Time Stamp	Level	Time Stamp	Level	Time Stamp
L_{eq}	76.1 dB		85.4 dB		--- dB	
$L_{S(max)}$	90.5 dB	2022-08-29 14:31:43	--- dB		--- dB	
$L_{S(min)}$	61.1 dB	2022-08-29 14:30:00	--- dB		--- dB	
$L_{Peak(max)}$	103.8 dB	2022-08-29 14:36:58	--- dB		--- dB	

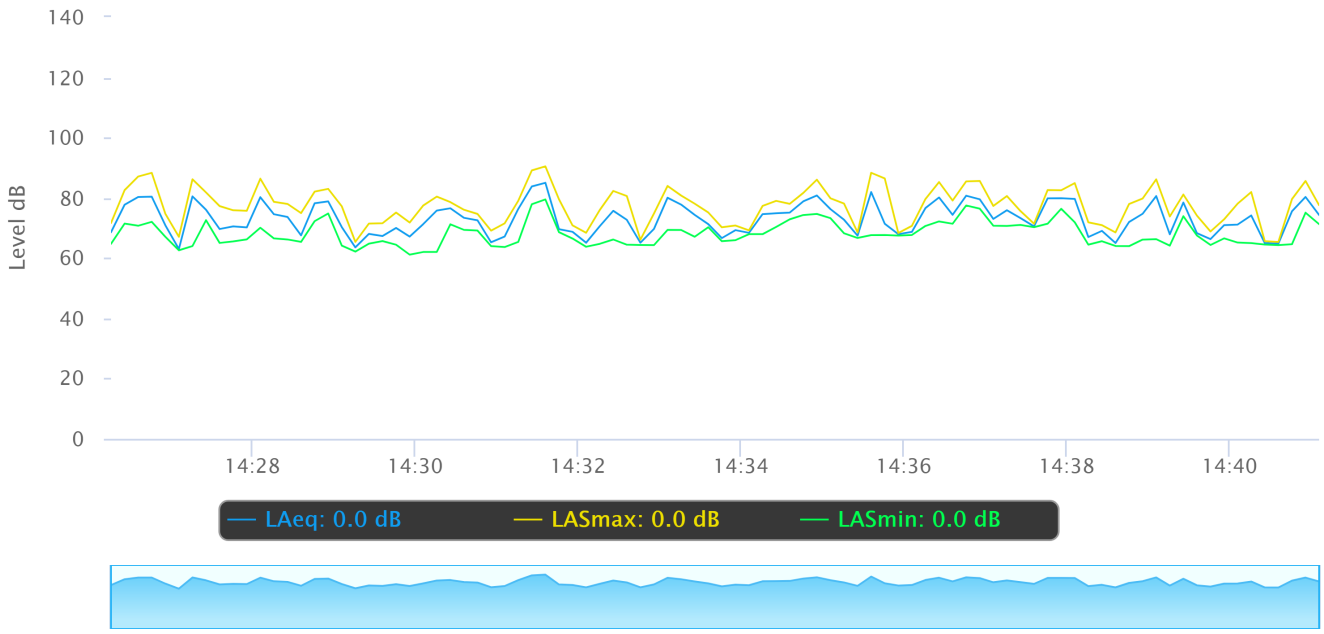
Overloads

Count	Duration	OBA Count	OBA Duration
0	0:00:00.0	0	0:00:00.0

Statistics

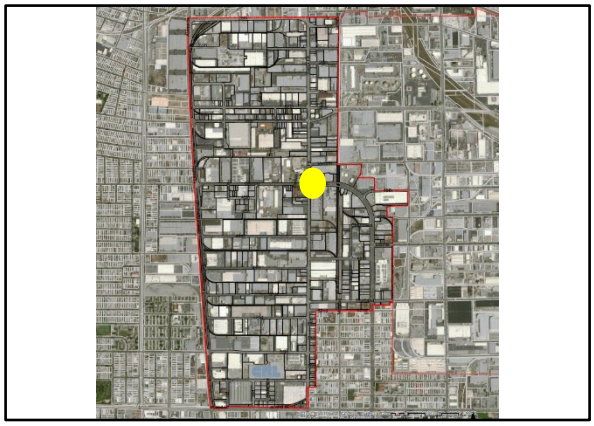
LAS 0.0	--- dB
LAS 0.0	--- dB
LAS 10.0	79.8 dB
LAS 33.3	74.7 dB
LAS 66.7	68.2 dB
LAS 90.0	65.0 dB

Time History



NOISE MONITORING FIELD REPORT

Site Map



Project Name: Vernon Westside Specific Plan

Monitoring Address: Santa Fe Ave./Vernon Ave./Pacific

Date: 08/29/2022 Site Number: 4

Measured By: Raul Castillo

Measurement Start Time: 3:00 p.m.

Measurement End Time: 3:15 p.m.

Total Measurement Time: 15 min.

Noise Meter Model: Larson Davis Soundtrack LxT Calibration: 94.0 (dBA)

Meter Setting: A-Weighted Sound Level (SLOW)

Session File Name: LxT_Data.176

Primary Noise Sources: Traffic

Data Summary

Noise Scale	Noise Level (dBA)
L_{eq}	75.1
L_{max}	91.7
L_{min}	62.8

Other Noise Sources During Monitoring

1. _____ Time: _____
2. _____ Time: _____
3. _____ Time: _____
4. _____ Time: _____
5. _____ Time: _____

Additional Notes:

_____
_____
_____
_____
_____

IMPACT SCIENCES

Measurement Report

Report Summary

Meter's File Name	LxT_Data.176.s	Computer's File Name	LxT_0005667-20220829 150052-LxT_Data.176.ldbin
Meter	LxT1 0005667		
Firmware	2.302		
User		Location	
Job Description			
Note			
Start Time	2022-08-29 15:00:52	Duration	0:15:00.0
End Time	2022-08-29 15:15:52	Run Time	0:15:00.0
Pause Time	0:00:00.0		

Results

Overall Metrics

LA_{eq}	75.1 dB		
LAE	104.7 dB	SEA	--- dB
EA	3.3 mPa²h		
EA8	104.1 mPa²h		
EA40	520.3 mPa²h		
LA_{peak}	112.7 dB	2022-08-29 15:04:21	
LAS_{max}	91.7 dB	2022-08-29 15:04:21	
LAS_{min}	62.8 dB	2022-08-29 15:08:17	
LA_{eq}	75.1 dB		
LC_{eq}	84.9 dB	LC_{eq} - LA_{eq}	9.8 dB
LAI_{eq}	77.6 dB	LAI_{eq} - LA_{eq}	2.5 dB

Exceedances	Count	Duration
LAS > 85.0 dB	4	0:00:14.3
LAS > 115.0 dB	0	0:00:00.0
LApeak > 135.0 dB	0	0:00:00.0
LApeak > 137.0 dB	0	0:00:00.0
LApeak > 140.0 dB	0	0:00:00.0

Community Noise	LDN	LDay	LNight
	--- dB	--- dB	0.0 dB

	LDEN	LDay	LEve	LNight
	--- dB	--- dB	--- dB	--- dB

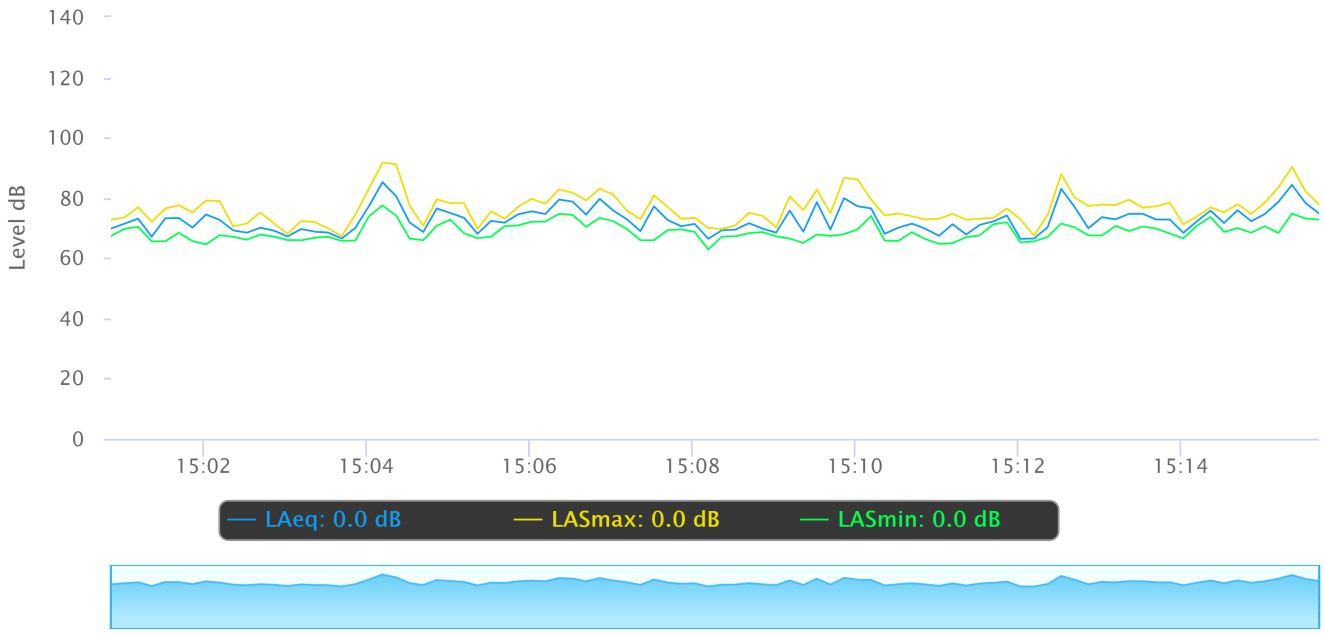
Any Data	A		C		Z	
	Level	Time Stamp	Level	Time Stamp	Level	Time Stamp
L_{eq}	75.1 dB		84.9 dB		--- dB	
$L_{S(max)}$	91.7 dB	2022-08-29 15:04:21	--- dB		--- dB	
$L_{S(min)}$	62.8 dB	2022-08-29 15:08:17	--- dB		--- dB	
$L_{Peak(max)}$	112.7 dB	2022-08-29 15:04:21	--- dB		--- dB	

Overloads	Count	Duration	OBA Count	OBA Duration
	0	0:00:00.0	0	0:00:00.0

Statistics

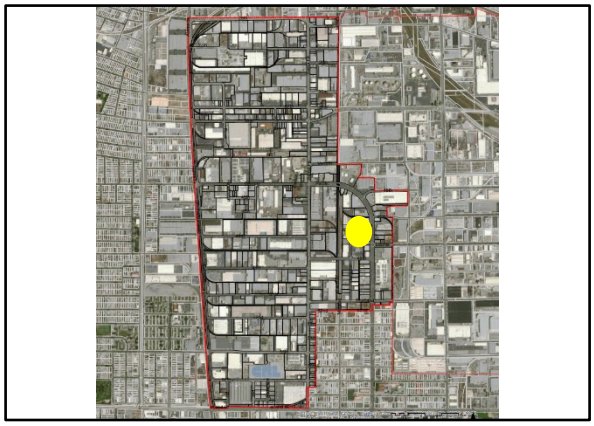
LAS 0.0	--- dB
LAS 0.0	--- dB
LAS 10.0	77.9 dB
LAS 33.3	73.3 dB
LAS 66.7	69.5 dB
LAS 90.0	66.9 dB

Time History



NOISE MONITORING FIELD REPORT

Site Map



Project Name: Vernon Westside Specific Plan

Monitoring Address: 49th St./Hampton St.

Date: 08/29/2022 Site Number: 5

Measured By: Raul Castillo

Measurement Start Time: 3:48 p.m.

Measurement End Time: 4:03 p.m.

Total Measurement Time: 15 min.

Noise Meter Model: Larson Davis Soundtrack LxT Calibration: 94.0 (dBA)

Meter Setting: A-Weighted Sound Level (SLOW)

Session File Name: LxT_Data.177

Primary Noise Sources: Traffic

Data Summary

Noise Scale	Noise Level (dBA)
L_{eq}	63.1
L_{max}	80.9
L_{min}	52.5

Other Noise Sources During Monitoring

1. _____ Time: _____
2. _____ Time: _____
3. _____ Time: _____
4. _____ Time: _____
5. _____ Time: _____

Additional Notes:

_____
_____
_____
_____
_____

IMPACT SCIENCES

Measurement Report

Report Summary

Meter's File Name	LxT_Data.177.s	Computer's File Name	LxT_0005667-20220829 154819-LxT_Data.177.ldbin
Meter	LxT1 0005667		
Firmware	2.302		
User		Location	
Job Description			
Note			
Start Time	2022-08-29 15:48:19	Duration	0:15:00.0
End Time	2022-08-29 16:03:19	Run Time	0:15:00.0
Pause Time	0:00:00.0		

Results

Overall Metrics

LA_{eq}	63.1 dB		
LAE	92.6 dB	SEA	--- dB
EA	202.1 µPa²h		
EA8	6.5 mPa²h		
EA40	32.3 mPa²h		
LA_{peak}	96.9 dB	2022-08-29 15:53:33	
LAS_{max}	80.9 dB	2022-08-29 15:59:36	
LAS_{min}	52.5 dB	2022-08-29 15:52:07	
LA_{eq}	63.1 dB		
LC_{eq}	79.8 dB	LC_{eq} - LA_{eq}	16.7 dB
LAI_{eq}	65.7 dB	LAI_{eq} - LA_{eq}	2.7 dB

Exceedances	Count	Duration
LAS > 85.0 dB	0	0:00:00.0
LAS > 115.0 dB	0	0:00:00.0
LApeak > 135.0 dB	0	0:00:00.0
LApeak > 137.0 dB	0	0:00:00.0
LApeak > 140.0 dB	0	0:00:00.0

Community Noise	LDN	LDay	LNight
	--- dB	--- dB	0.0 dB

	LDEN	LDay	LEve	LNight
	--- dB	--- dB	--- dB	--- dB

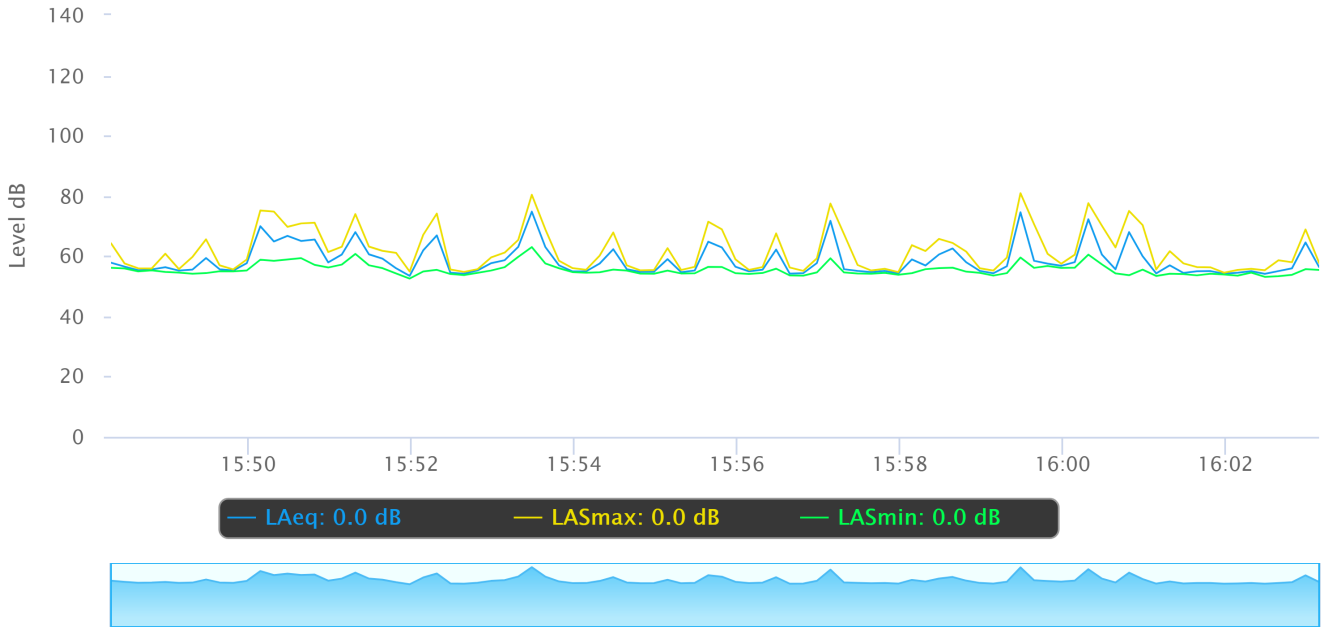
Any Data	A		C		Z	
	Level	Time Stamp	Level	Time Stamp	Level	Time Stamp
L_{eq}	63.1 dB		79.8 dB		--- dB	
$L_{S(max)}$	80.9 dB	2022-08-29 15:59:36	--- dB		--- dB	
$L_{S(min)}$	52.5 dB	2022-08-29 15:52:07	--- dB		--- dB	
$L_{Peak(max)}$	96.9 dB	2022-08-29 15:53:33	--- dB		--- dB	

Overloads	Count	Duration	OBA Count	OBA Duration
	0	0:00:00.0	0	0:00:00.0

Statistics

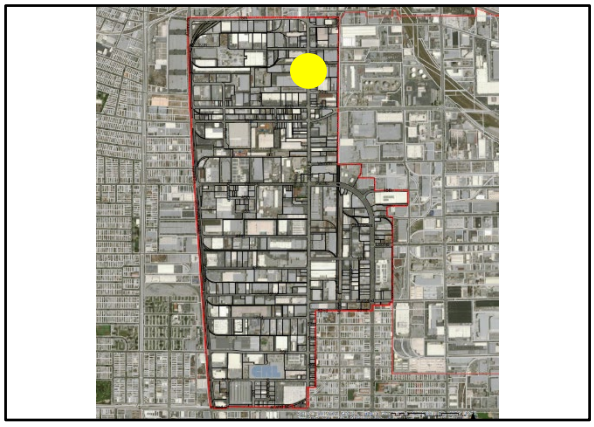
LAS 0.0	--- dB
LAS 0.0	--- dB
LAS 10.0	64.5 dB
LAS 33.3	57.7 dB
LAS 66.7	55.2 dB
LAS 90.0	54.3 dB

Time History



NOISE MONITORING FIELD REPORT

Site Map



Project Name: Vernon Westside Specific Plan

Monitoring Address: Santa Fe Ave./28th St.

Date: 08/29/2022 Site Number: 6

Measured By: Raul Castillo

Measurement Start Time: 4:13 p.m.

Measurement End Time: 4:28 p.m.

Total Measurement Time: 15 min.

Noise Meter Model: Larson Davis Soundtrack LxT Calibration: 94.0 (dBA)

Meter Setting: A-Weighted Sound Level (SLOW)

Session File Name: LxT_Data.178

Primary Noise Sources: Traffic

Data Summary

Noise Scale	Noise Level (dBA)
L_{eq}	73.3
L_{max}	85.6
L_{min}	56.3

Other Noise Sources During Monitoring

1. _____ Time: _____
2. _____ Time: _____
3. _____ Time: _____
4. _____ Time: _____
5. _____ Time: _____

Additional Notes:

_____
_____
_____
_____
_____

IMPACT SCIENCES

Measurement Report

Report Summary

Meter's File Name	LxT_Data.178.s	Computer's File Name	LxT_0005667-20220829 161307-LxT_Data.178.ldbin
Meter	LxT1 0005667		
Firmware	2.302		
User		Location	
Job Description			
Note			
Start Time	2022-08-29 16:13:07	Duration	0:15:00.0
End Time	2022-08-29 16:28:07	Run Time	0:15:00.0
		Pause Time	0:00:00.0

Results

Overall Metrics

LA_{eq}	73.3 dB		
LAE	102.9 dB	SEA	--- dB
EA	2.2 mPa²h		
EA8	69.0 mPa²h		
EA40	345.1 mPa²h		
LA_{peak}	103.4 dB	2022-08-29 16:18:27	
LAS_{max}	85.6 dB	2022-08-29 16:18:28	
LAS_{min}	56.3 dB	2022-08-29 16:27:14	
LA_{eq}	73.3 dB		
LC_{eq}	82.2 dB	LC_{eq} - LA_{eq}	8.8 dB
LAI_{eq}	75.9 dB	LAI_{eq} - LA_{eq}	2.6 dB

Exceedances

	Count	Duration
LAS > 85.0 dB	1	0:00:00.8
LAS > 115.0 dB	0	0:00:00.0
LApeak > 135.0 dB	0	0:00:00.0
LApeak > 137.0 dB	0	0:00:00.0
LApeak > 140.0 dB	0	0:00:00.0

Community Noise

LDN	LDay	LNight
--- dB	--- dB	0.0 dB

LDEN	LDay	LEve	LNight
--- dB	--- dB	--- dB	--- dB

Any Data

	A		C		Z	
	Level	Time Stamp	Level	Time Stamp	Level	Time Stamp
L_{eq}	73.3 dB		82.2 dB		--- dB	
$L_{S(max)}$	85.6 dB	2022-08-29 16:18:28	--- dB		--- dB	
$L_{S(min)}$	56.3 dB	2022-08-29 16:27:14	--- dB		--- dB	
$L_{Peak(max)}$	103.4 dB	2022-08-29 16:18:27	--- dB		--- dB	

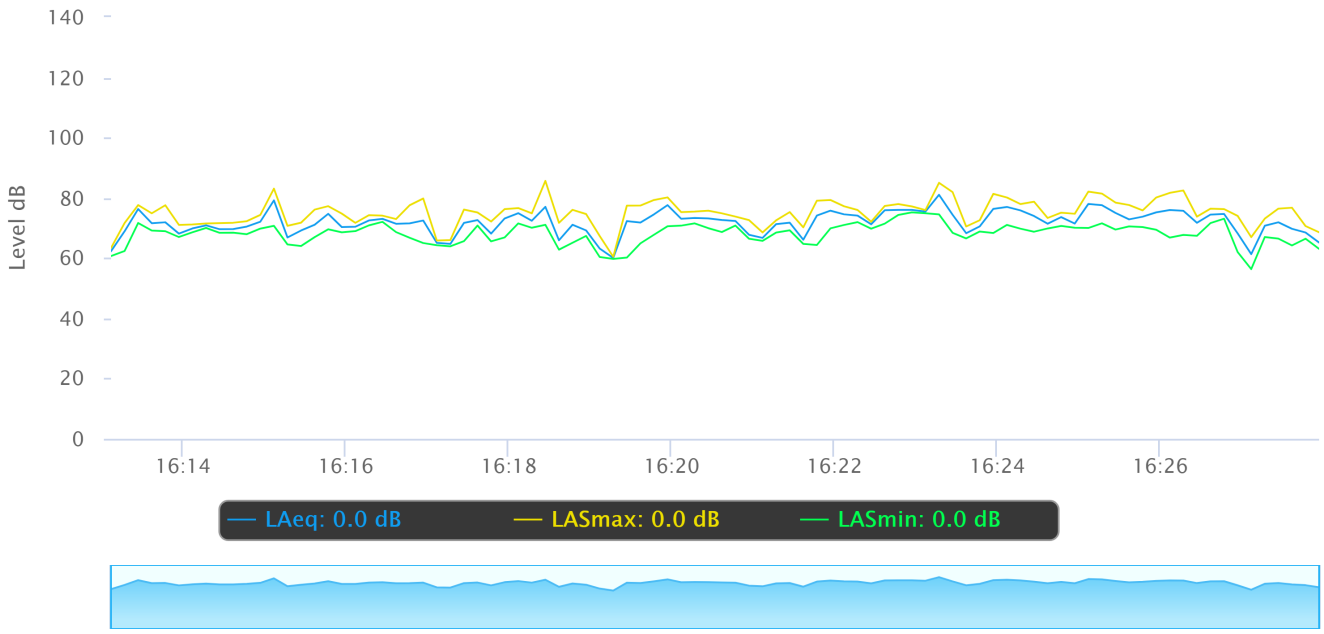
Overloads

Count	Duration	OBA Count	OBA Duration
0	0:00:00.0	0	0:00:00.0

Statistics

LAS 0.0	--- dB
LAS 0.0	--- dB
LAS 10.0	76.5 dB
LAS 33.3	73.1 dB
LAS 66.7	69.6 dB
LAS 90.0	65.3 dB

Time History



Roadway Construction Noise Model (RCNM),Version 1.1

Report date: 10/5/2022
Case Description: Vernon Westside SP - Demolition

---- Receptor #1 ----

Description
Reference at 50 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Dozer	No	40		81.7	50	0
Concrete Saw	No	20		89.6	50	0
Tractor	No	40	84		50	0
Front End Loader	No	40		79.1	50	0

Results

Calculated (dBA)

Equipment	*Lmax	Leq
Dozer	81.7	77.7
Concrete Saw	89.6	82.6
Tractor	84	80
Front End Loader	79.1	75.1
Total	89.6	85.7

*Calculated Lmax is the Loudest value.

---- Receptor #2 ----

Description
Refereence at 100 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Dozer	No	40		81.7	100	0
Concrete Saw	No	20		89.6	100	0
Tractor	No	40	84		100	0
Front End Loader	No	40		79.1	100	0

Results

Calculated (dBA)

Equipment		*Lmax	Leq
Dozer		75.6	71.7
Concrete Saw		83.6	76.6
Tractor		78	74
Front End Loader		73.1	69.1
	Total	83.6	79.7

*Calculated Lmax is the Loudest value.

---- Receptor #3 ----

Description
Reference at 500 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Dozer	No	40		81.7	500	0
Concrete Saw	No	20		89.6	500	0
Tractor	No	40	84		500	0
Front End Loader	No	40		79.1	500	0

Results

Calculated (dBA)

Equipment		*Lmax	Leq
Dozer		61.7	57.7
Concrete Saw		69.6	62.6
Tractor		64	60
Front End Loader		59.1	55.1
	Total	69.6	65.7

*Calculated Lmax is the Loudest value.

Roadway Construction Noise Model (RCNM),Version 1.1

Report date: 10/5/2022
Case Description: Vernon Westside SP - Site Preperation

---- Receptor #1 ----

Description
Reference at 50 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Grader	No	40	85		50	0
Tractor	No	40	84		50	0

Results

Calculated (dBA)

Equipment	*Lmax	Leq
Grader	85	81
Tractor	84	80
Total	85	83.6

*Calculated Lmax is the Loudest value.

---- Receptor #2 ----

Description
Refereence at 100 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Grader	No	40	85		100	0
Tractor	No	40	84		100	0

Results

Calculated (dBA)

Equipment	*Lmax	Leq
Grader	75.6	71.7
Tractor	83.6	76.6
Total	83.6	79.7

*Calculated Lmax is the Loudest value.

---- Receptor #3 ----

Description
Reference at 500 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Grader	No	40	85		500	0
Tractor	No	40	84		500	0

Results

Calculated (dBA)

Equipment	*Lmax	Leq
Grader	61.7	57.7
Tractor	69.6	62.6
Total	69.6	65.7

*Calculated Lmax is the Loudest value.

Roadway Construction Noise Model (RCNM),Version 1.1

Report date: 10/5/2022
Case Description: Vernon Westside SP - Grading

---- Receptor #1 ----

Description
Reference at 50 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Grader	No	40	85		50	0
Tractor	No	40	84		50	0
Dozer	No	40		81.7	50	0

Results

Calculated (dBA)

Equipment	*Lmax	Leq
Grader	85	81
Tractor	84	80
Dozer	81.7	77.7
Total	85	84.6

*Calculated Lmax is the Loudest value.

---- Receptor #2 ----

Description
Refereence at 100 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Grader	No	40	85		100	0
Tractor	No	40	84		100	0
Dozer	No	40		81.7	100	0

Results

Calculated (dBA)

Equipment	*Lmax	Leq
Grader	79	75
Tractor	78	74

Dozer		75.6	71.7
	Total	79	78.5

*Calculated Lmax is the Loudest value.

---- Receptor #3 ----

Description
Reference at 500 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Grader	No	40	85		500	0
Tractor	No	40	84		500	0
Dozer	No	40		81.7	500	0

Results

Calculated (dBA)

Equipment		*Lmax	Leq
Grader		65	61
Tractor		64	60
Dozer		61.7	57.7
	Total	65	64.6

*Calculated Lmax is the Loudest value.

Roadway Construction Noise Model (RCNM),Version 1.1

Report date: 10/5/2022
Case Descrip Vernon Westside SP - Building Construction

---- Receptor #1 ----

Description
Reference at 50 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Crane	No	16		80.6	50	0
Backhoe	No	40		77.6	50	0
Backhoe	No	40		77.6	50	0
Tractor	No	40	84		50	0
Tractor	No	40	84		50	0

Results

Calculated (dBA)

Equipment	*Lmax	Leq
Crane	80.6	72.6
Backhoe	77.6	73.6
Backhoe	77.6	73.6
Tractor	84	80
Tractor	84	80
Total	84	84.2

*Calculated Lmax is the Loudest value.

---- Receptor #2 ----

Description
Refereence at 100 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Crane	No	16		80.6	100	0
Backhoe	No	40		77.6	100	0
Backhoe	No	40		77.6	100	0
Tractor	No	40	84		100	0
Tractor	No	40	84		100	0

Results

Calculated (dBA)

Equipment		*Lmax	Leq
Crane		74.5	66.6
Backhoe		71.5	67.6
Backhoe		71.5	67.6
Tractor		78	74
Tractor		78	74
	Total	78	78.2

*Calculated Lmax is the Loudest value.

---- Receptor #3 ----

Description

Reference at 500 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Crane	No	16		80.6	500	0
Backhoe	No	40		77.6	500	0
Backhoe	No	40		77.6	500	0
Tractor	No	40	84		500	0
Tractor	No	40	84		500	0

Results

Calculated (dBA)

Equipment		*Lmax	Leq
Crane		60.6	52.6
Backhoe		57.6	53.6
Backhoe		57.6	53.6
Tractor		64	60
Tractor		64	60
	Total	64	64.2

*Calculated Lmax is the Loudest value.

Roadway Construction Noise Model (RCNM),Version 1.1

Report date: 10/5/2022
Case Description: Vernon Westside SP - Architectural Coating

---- Receptor #1 ----

Description
Reference at 50 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Compressor (air)	No	40		77.7	50	0

Calculated (dBA)

Equipment	*Lmax	Leq
Compressor (air)	77.7	73.7
Total	77.7	73.7

*Calculated Lmax is the Loudest value.

---- Receptor #2 ----

Description
Refereence at 100 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Compressor (air)	No	40		77.7	100	0

Results

Calculated (dBA)

Equipment	*Lmax	Leq
Compressor (air)	74.5	66.6
Total	78	78.2

*Calculated Lmax is the Loudest value.

---- Receptor #3 ----

Description
Reference at 500 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Compressor (air)	No	40		77.7	500	0

Results

Calculated (dBA)

Equipment		*Lmax	Leq
Compressor (air)		57.7	53.7
	Total	57.7	53.7

*Calculated Lmax is the Loudest value.

Roadway Construction Noise Model (RCNM),Version 1.1

Report date: 10/5/2022
Case Description: Vernon Westside SP - Paving

---- Receptor #1 ----

Description
Reference at 50 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Paver	No	50		77.2	50	0
Drum Mixer	No	50		80	50	0
Drum Mixer	No	50		80	50	0
Drum Mixer	No	50		80	50	0
Drum Mixer	No	50		80	50	0
Roller	No	20		80	50	0
Backhoe	No	40		77.6	50	0

Calculated (dBA)

Equipment	*Lmax	Leq
Paver	77.2	74.2
Drum Mixer	80	77
Drum Mixer	80	77
Drum Mixer	80	77
Drum Mixer	80	77
Roller	80	73
Backhoe	77.6	73.6
Total	80	84.3

*Calculated Lmax is the Loudest value.

---- Receptor #2 ----

Description
Refereence at 100 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Paver	No	50		77.2	100	0
Drum Mixer	No	50		80	100	0

Drum Mixer	No	50	80	100	0
Drum Mixer	No	50	80	100	0
Drum Mixer	No	50	80	100	0
Roller	No	20	80	100	0
Backhoe	No	40	77.6	100	0

Results

Calculated (dBA)

Equipment	*Lmax	Leq
Paver	71.2	68.2
Drum Mixer	74	71
Drum Mixer	74	71
Drum Mixer	74	71
Drum Mixer	74	71
Roller	74	67
Backhoe	71.5	67.6
Total	74	78.3

*Calculated Lmax is the Loudest value.

---- Receptor #3 ----

Description

Reference at 500 feet

Description	Impact Device	Usage(%)	Equipment Spec Lmax (dBA)	Actual Lmax (dBA)	Receptor Distance (feet)	Estimated Shielding (dBA)
Paver	No	50		77.2	500	0
Drum Mixer	No	50		80	500	0
Drum Mixer	No	50		80	500	0
Drum Mixer	No	50		80	500	0
Drum Mixer	No	50		80	500	0
Roller	No	20		80	500	0
Backhoe	No	40		77.6	500	0

Results

Calculated (dBA)

Equipment	*Lmax	Leq
Paver	57.2	54.2
Drum Mixer	60	57
Drum Mixer	60	57
Drum Mixer	60	57
Drum Mixer	60	57
Roller	60	53

Backhoe		57.6	53.6
	Total	60	64.3

*Calculated Lmax is the Loudest value.

TRAFFIC NOISE LEVELS

Project Name: Vernon Westside

Background Information

Model Description:	FHWA Highway Noise Prediction Model with California Vehicle Noise (CALVENO) Emission Levels.
Analysis Scenario(s):	Existing, Future Without Project, Future With Project
Source of Traffic Volumes:	Traffic Impact Analysis, Iteris 2023.
Community Noise Descriptor:	X

Assumed 24-Hour Traffic Distribution:	(Ldn) Day	Evening	(CNEL) Night
Total ADT Volumes	77.70%	12.70%	9.60%
Medium-Duty Trucks	87.43%	5.05%	7.52%
Heavy-Duty Trucks	89.10%	2.84%	8.06%

Traffic Noise Levels

Analysis Condition / Roadway Name / Roadway Segment	Lanes	Median Width	ADT Volume	Design Speed (mph)	Dist. from Center to Receptor[1]	Alpha Factor	Barrier Attn. dB(A)	Vehicle Mix: Medium Trucks	Vehicle Mix: Heavy Trucks	24-Hour dB(A) CNEL
Existing Traffic Noise										
Santa Fe Ave.										
North of Vernon Ave.	4	10	35,430	35	50	0	0	1.8%	0.7%	70.7
South of Vernon Ave.	4	10	27,770	35	50	0	0	1.8%	0.7%	69.7
Vernon Ave.										
West of Alameda St.	4	0	14,810	30	50	0	0	1.8%	0.7%	65.4
Between Alameda and Santa Fe Ave.	4	10	16,460	40	50	0	0	1.8%	0.7%	68.9
Pacific Blvd.										
East of Santa Fe Ave.	6	10	13,540	40	50	0	0	1.8%	0.7%	69.0
Alameda St. West										
North of Vernon Ave.	4	10	19,350	40	50	0	0	1.8%	0.7%	69.6
South of Vernon Ave.	4	10	17,860	40	50	0	0	1.8%	0.7%	69.2
Alameda St. East										
North of Vernon Ave.	2	0	5,540	35	50	0	0	1.8%	0.7%	62.2
South of Vernon Ave.	2	0	4,610	35	50	0	0	1.8%	0.7%	61.4
55th St.										
East of Alameda St.	4	10	8,870	35	50	0	0	1.8%	0.7%	64.7
Future Without Project										
Santa Fe Ave.										
North of Vernon Ave.	4	10	35,780	35	50	0	0	1.8%	0.7%	70.8
South of Vernon Ave.	4	10	28,050	35	50	0	0	1.8%	0.7%	69.7
Vernon Ave.										
West of Alameda St.	4	0	14,960	30	50	0	0	1.8%	0.7%	65.5
Between Alameda and Santa Fe Ave.	4	10	16,620	40	50	0	0	1.8%	0.7%	68.9
Pacific Blvd.										
East of Santa Fe Ave.	6	10	13,680	40	50	0	0	1.8%	0.7%	69.0
Alameda St. West										
North of Vernon Ave.	4	10	19,540	40	50	0	0	1.8%	0.7%	69.6
South of Vernon Ave.	4	10	18,040	40	50	0	0	1.8%	0.7%	69.3
Alameda St. East										
North of Vernon Ave.	2	0	5,600	35	50	0	0	1.8%	0.7%	62.3
South of Vernon Ave.	2	0	4,660	35	50	0	0	1.8%	0.7%	61.5
55th St.										
East of Alameda St.	4	10	8,960	35	50	0	0	1.8%	0.7%	64.8
Future With Project										
Santa Fe Ave.										
North of Vernon Ave.	4	10	39,050	35	50	0	0	1.8%	0.7%	71.2
South of Vernon Ave.	4	10	31,950	35	50	0	0	1.8%	0.7%	70.3
Vernon Ave.										
West of Alameda St.	4	0	15,430	30	50	0	0	1.8%	0.7%	65.6
Between Alameda and Santa Fe Ave.	4	10	18,290	40	50	0	0	1.8%	0.7%	69.3
Pacific Blvd.										
East of Santa Fe Ave.	6	10	15,290	40	50	0	0	1.8%	0.7%	69.5
Alameda St. West										
North of Vernon Ave.	4	10	20,480	40	50	0	0	1.8%	0.7%	69.8
South of Vernon Ave.	4	10	18,430	40	50	0	0	1.8%	0.7%	69.4
Alameda St. East										
North of Vernon Ave.	2	0	6,010	35	50	0	0	1.8%	0.7%	62.6
South of Vernon Ave.	2	0	5,050	35	50	0	0	1.8%	0.7%	61.8
55th St.										
East of Alameda St.	4	10	9,310	35	50	0	0	1.8%	0.7%	64.9

[1] Distance in feet from the roadway centerline to nearest receptor location.

APPENDIX 3.11

Transportation Report

iteris®

213.488.0345
iteris.com

801 South Grand Avenue, Suite 750
Los Angeles, CA 90017

DRAFT MEMORANDUM

To: City of Vernon	**From:** Iteris, Inc.
Date: February 28, 2023	
RE: Vernon Westside Specific Plan – **Draft** CEQA Transportation Impact Analysis	

INTRODUCTION

This memorandum describes the California Environmental Quality Act (CEQA) transportation impact analysis for the Westside Specific Plan in the City of Vernon. The evaluation is consistent with CEQA Guidelines effective December 28, 2018.

IMPACT ANALYSIS

The Specific Plan's impacts are evaluated per Appendix G Environmental Checklist Form of the current CEQA guidelines, which assesses projects by the four criteria listed below:

T-1 *Would the project conflict with a program plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle and pedestrian facilities?*

T-2 *Would the project conflict with or be inconsistent with CEQA Guidelines section 15064.3, subdivision (b)?*

T-3 *Would the project substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?*

T-4 *Would the project result in inadequate emergency access?*

T-1 Impact Evaluation

The goals of the Specific Plan are to diversify land use in a small portion of the City's westside to include residential and commercial uses, primarily along Santa Fe Avenue. The Specific Plan does not include any modifications to the circulation network.

Therefore, the Specific Plan does not conflict with a program, plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle, and pedestrian facilities. Thus, this impact is considered **less than significant**.

T-2 Impact Evaluation

Under criteria T-2, the proposed Specific Plan's effects on Vehicle Miles Traveled (VMT) are evaluated, as described in the following sub-sections.

Analysis Methodology

This section presents the changes in VMT based on the implementation of the Westside Specific Plan. Los Angeles County's guidelines state: Daily vehicle trips, daily VMT, and daily total VMT per service population for land use plans should be estimated using the SCAG RTP/SCS Travel Demand Forecast Model. Transportation demand management strategies to be included as project design features should be considered in the estimation of a project's daily vehicle trips and VMT. For consistency with the County's guidelines, the project's VMT estimates are summarized below.

The SCAG RTP/SCS travel demand model, with a base year of 2018, was used to calculate the baseline Specific Plan project area and City of Vernon area VMT which was divided by the service populations (residents and employees) to obtain a value of VMT per service population. It should be noted that the Traffic Analysis Zone (TAZ) structure, within the travel demand model, for the City of Vernon includes some adjacent unincorporated areas; therefore, the population and employment values for the group of TAZ's for the City of Vernon area differ from the totals for the City proper and may, therefore, vary slightly from the U.S. Census or other data sources provided within this PEIR. However, since the metric of analysis is the indexed VMT per service population rather than the absolute VMT values, the slight differences in analysis boundaries as compared to City values are indistinguishable from each other and do not affect the analysis.

In order to determine the Specific Plan project's potential level of impact, a new model scenario was prepared, incorporating the land use components of the Westside Specific Plan. For land use plans which include both residential and employment uses, the appropriate analysis metric is VMT per service population, where service population is defined as the number of residents plus the number of jobs. **Table 1** summarizes the Specific Plan's proposed net changes in land use, which were incorporated into the model's TAZ's based on the location of the district.

Table 1: Specific Plan Project Net Change in Land Use (by district)

District	Residential Units	Retail (sq ft)	Production Retail (sq ft)	Research & Development (sq ft)	Industrial (sq ft)
Santa Fe South	295	31,679	37,128	138,860	-117,205
Santa Fe North	165	22,666	94,243	67,693	-222,943
City Center	414	65,714	64,800	0	-64,800
Pacific	0	0	56,850	153,877	-170,601
Net Total	**874**	**120,059**	**253,021**	**360,430**	**-575,549**

As shown, the Specific Plan's anticipated change in dwelling units and non-residential square footage over

the 2040 estimated buildout is:

- Addition 874 dwelling units;
- Addition of 120,059 net square feet of retail uses, 253,021 net square feet of production retail uses, 360,430 net square feet of research and development uses;
- Reduction of 575,549 net square feet of industrial uses.

Appendix A summarizes the Average Daily Traffic (ADT) volumes for roadways within the area.

VMT Impact Analysis

The thresholds of significance, for use in this analysis, are defined as:

- The project would result in a significant impact if the project conditions (i.e., the With Specific Plan conditions) average daily citywide VMT per service population is above the existing conditions average daily citywide VMT per service population.

Applying the described land use plan, citywide VMT outputs were developed using the SCAG model. **Table 2** summarizes the existing/baseline VMT per service population for the Specific Plan project area as well as the City of Vernon. As shown in **Table 2**, the baseline (i.e., existing) Specific Plan project area daily VMT per service population is 20.9, which is lower than the City area's VMT per service population of 21.2.

Table 2: Existing (Baseline) VMT Per Service Population

Area	Total Home-based VMT	Total Work-based VMT	Total VMT	Residents	Employees	Service Population	VMT/ Service Population
SP Area	2,611	758,303	760,914	209	36,196	36,405	20.9
City of Vernon	2,611	941,769	944,380	209	44,285	44,494	21.2

Table 3 shows the future year 2040 base (no project) scenario which includes cumulative development and transportation infrastructure and services outside of the Specific Plan project area.

Table 3: Future Year 2040 Base (No Project) VMT Per Service Population

Area	Total Home-based VMT	Total Work-based VMT	Total VMT	Residents	Employees	Service Population	VMT/ Service Population
SP Area	1,379	778,048	779,427	117	37,560	37,677	20.7
City of Vernon	1,379	986,526	987,905	117	46,752	46,869	21.1

Table 4 shows the future year 2040 Project scenario which includes the Project as well as cumulative development and transportation infrastructure and services outside of the Project area.

Table 4: Future Year 2040 Project VMT Per Service Population

Area	Total Home-based VMT	Total Work-based VMT	Total VMT	Residents	Employees	Service Population	VMT/ Service Population
SP Area	19,315	774,072	793,387	1,780	37,967	39,747	20.0
City of Vernon	19,315	979,501	998,816	1,780	47,159	48,939	20.4

As shown, the VMT per service population of the Specific Plan area is lower than the Vernon area average VMT per service population. In addition, the Project is forecast to reduce VMT per service population in the Specific Plan area by approximately four percent and the VMT per service population in the City of Vernon area by three percent, when compared to the no project scenario.

Since the Specific Plan project is a subset of the residents and employees of the project area, the VMT per service population for just the project-related change in residents and employment is shown in **Table 5**.

Table 5: Future Year 2040 Project VMT Per Service Population (Project Only)

Area	Total Home-based VMT	Total Work-based VMT	Total VMT	Residents	Employees	Service Population	VMT/ Service Population
SP Area	17,936	-3,976	13,960	1,663	407	2,070	6.7

As shown in **Table 5**, the Specific Plan project VMT per service population is forecast as 6.7 which is approximately 68 percent below the existing baseline Specific Plan project area condition shown in **Table 2** and 66 percent below the future base Specific Plan project area condition shown in **Table 3**. In addition, for informational purposes only, note that the Project-only VMT per service population is greater than 16.8 percent below the existing/baseline VMT per service population, which is the impact criteria used by Los Angeles County to identify a potentially significant impact under T-2.

Thus, this impact is considered **less than significant**. VMT outputs are provided in **Appendix B**.

T-3 Impact Evaluation

The objective of the Specific Plan is to provide a diversity of future land uses. Access to future land use will be designed to City and State engineering design standards to meet sight distance requirements, including visibility of pedestrians and bicyclists. The Specific Plan does not propose any incompatible uses that would increase hazards. Thus, this impact is considered **less than significant**.

T-4 Impact Evaluation

The Specific Plan does not include elements that would impede emergency vehicle access. Public roadways and buildings would conform to City and County Fire Department standards for access. These standards consist of requirements for access by fire apparatus. A fire apparatus access road is a road that provides fire apparatus access from a fire station to a facility, building or portion thereof. This is a general

term inclusive of all other terms such as fire lane, public street, private street, parking lot lane and access roadway. Thus, this impact is considered **less than significant**.

APPENDIX A – ADT VOLUMES

Vernon Westside Specific Plan - Daily Volumes

Segment	Existing*	Future No Build	Buildout With Project (Land Use Plan Only)
Santa Fe Ave n/o Vernon Ave	35,430	35,780	39,050
Santa Fe Ave s/o Vernon Ave	27,770	28,050	31,950
Vernon Ave w/o Alameda St	14,810	14,960	15,430
Vernon Ave btwn Alameda & Santa Fe	16,460	16,620	18,290
Pacific Blvd e/o of Santa Fe	13,540	13,680	15,290
Alameda St West n/o Vernon Ave	19,350	19,540	20,480
Alameda St West s/o Vernon Ave	17,860	18,040	18,430
Alameda St East n/o Vernon Ave	5,540	5,600	6,010
Alameda St East s/o Vernon Ave	4,610	4,660	5,050
55th St e/o Alameda St	8,870	8,960	9,310

* Existing daily volumes are based off 2022 peak hour intersection counts, factored up to calculate daily volumes

APPENDIX B – VMT OUTPUTS

Existing

SP Area			
ID	Purpose	Productions	Attractions
1	Home-based Work	1,230	698,055
2	Home-based School	50	425
3	Home-based University	17	-
4	Home-based Shopping	203	63,363
5	Home-based Social-Recreational	471	22,016
6	Home-based Serve Passenger	175	19,809
7	Home-based Other	464	52,794
8	Work-Based Other	60,247	87,231
9	Other Based Other	70,309	76,407
	Total VMT	133,168	1,020,100
	Total Home-based VMT		2,611
	Total Work-based VMT		758,303
	Total Population	209	
	Total Employees	36,196	
	Service Population	36,405	
	Total Home-based VMT/Capita	**12.5**	
	Total Work-based VMT/Employee	**20.9**	
	Total VMT/Service Population	**20.9**	

Vernon			
ID	Purpose	Productions	Attractions
1	Home-based Work	1,230	866,235
2	Home-based School	50	425
3	Home-based University	17	-
4	Home-based Shopping	203	73,810
5	Home-based Social-Recreational	471	26,456
6	Home-based Serve Passenger	175	24,592
7	Home-based Other	464	65,358
8	Work-Based Other	75,535	109,237
9	Other Based Other	85,260	91,867
	Total VMT	163,405	1,257,980
	Total Home-based VMT		2,611
	Total Work-based VMT		941,769
	Total Population	209	
	Total Employees	44,285	
	Service Population	44,494	
	Total Home-based VMT/Capita	**12.5**	
	Total Work-based VMT/Employee	**21.3**	
	Total VMT/Service Population	**21.2**	

Future Year 2040 Base (Without Project)

SP Area			
ID	Purpose	Productions	Attractions
1	Home-based Work	668	701,499
2	Home-based School	25	458
3	Home-based University	10	-
4	Home-based Shopping	98	88,230
5	Home-based Social-Recreational	241	66,224
6	Home-based Serve Passenger	105	30,774
7	Home-based Other	232	110,354
8	Work-Based Other	76,550	84,504
9	Other Based Other	113,158	128,885
	Total VMT	191,087	1,210,928
	Total Home-based VMT		1,379
	Total Work-based VMT		778,048
	Total Population	117	
	Total Employees	37,560	
	Service Population	37,677	
	Total Home-based VMT/Capita	**11.8**	
	Total Work-based VMT/Employee	**20.7**	
	Total VMT/Service Population	**20.7**	

Vernon			
ID	Purpose	Productions	Attractions
1	Home-based Work	668	894,099
2	Home-based School	25	458
3	Home-based University	10	-
4	Home-based Shopping	98	108,811
5	Home-based Social-Recreational	241	75,886
6	Home-based Serve Passenger	105	37,251
7	Home-based Other	232	129,973
8	Work-Based Other	92,427	106,345
9	Other Based Other	135,020	154,574
	Total VMT	228,826	1,507,397
	Total Home-based VMT		1,379
	Total Work-based VMT		986,526
	Total Population	117	
	Total Employees	46,752	
	Service Population	46,869	
	Total Home-based VMT/Capita	**11.8**	
	Total Work-based VMT/Employee	**21.1**	
	Total VMT/Service Population	**21.1**	

Future Year 2040 Land Use Only

SP Area			
ID	Purpose	Productions	Attractions
1	Home-based Work	9,373	697,022
2	Home-based School	93	41,199
3	Home-based University	336	-
4	Home-based Shopping	1,518	98,942
5	Home-based Social-Recreational	3,724	69,626
6	Home-based Serve Passenger	870	56,400
7	Home-based Other	3,400	113,511
8	Work-Based Other	77,050	85,939
9	Other Based Other	115,204	182,454
	Total VMT	211,568	1,345,094
	Total Home-based VMT		19,315
	Total Work-based VMT		774,072
	Total Population	1,780	
	Total Employees	37,967	
	Service Population	39,747	
	Total Home-based VMT/Capita	**10.9**	
	Total Work-based VMT/Employee	**20.4**	
	Total VMT/Service Population	**20.0**	

Vernon			
ID	Purpose	Productions	Attractions
1	Home-based Work	9,373	886,640
2	Home-based School	93	41,199
3	Home-based University	336	-
4	Home-based Shopping	1,518	119,392
5	Home-based Social-Recreational	3,724	79,204
6	Home-based Serve Passenger	870	62,875
7	Home-based Other	3,400	133,047
8	Work-Based Other	92,861	107,821
9	Other Based Other	136,594	208,065
	Total VMT	248,770	1,638,243
	Total Home-based VMT		19,315
	Total Work-based VMT		979,501
	Total Population	1,780	
	Total Employees	47,159	
	Service Population	48,939	
	Total Home-based VMT/Capita	**10.9**	
	Total Work-based VMT/Employee	**20.8**	
	Total VMT/Service Population	**20.4**	