Appendix B

AQ-GHG Technical Report

Air Quality and Greenhouse Gas Emissions Technical Report

Fenton Parkway Bridge Project

FEBRUARY 2024

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Printed on 30% post-consumer recycled material.

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Acronyms and Abbreviations

Acronym/Abbreviation	Definition
°C	degrees Celsius
°F	degrees Fahrenheit
$\mu g/m^3$	micrograms per cubic meter
AB	Assembly Bill
ATCM	Airborne Toxic Control Measure
C&D	Construction and Demolition
CAAQS	California Ambient Air Quality Standards
CalEEMod	California Emissions Estimator Model
CALGreen	California's Green Building Standards
CalRecycle	California Department of Resources Recycling and Recovery
CAP	Climate Action Plan
CARB	California Air Resources Board
CEC	California Energy Commission
CEQA	California Environmental Quality Act
CFCs	chlorofluorocarbons
CH_4	methane
City	City of San Diego
CNRA	California Natural Resources Agency
CO	carbon monoxide
CO_2	carbon dioxide
CO_2e	carbon dioxide equivalent
CPUC	California Public Utilities Commission
CSU	California State University
DPM	diesel particulate matter
EO	Executive Order
EPA	U.S. Environmental Protection Agency
EV	electric vehicle
GHG	greenhouse gas
GWP	global warming potential
H_2S	hydrogen sulfide
HAP	hazardous air pollutant
HCFC	hydrochlorofluorocarbon
HFC	hydrofluorocarbon
I	Interstate
IPCC	Intergovernmental Panel on Climate Change
LCFS	Low Carbon Fuel Standard
LOS	level of service
MMT	million metric ton
MPO	metropolitan planning organization
MT CO_2e	metric tons of CO_2 equivalent

Acronym/Abbreviation	Definition
N_2O	nitrous oxide
NAAQS	National Ambient Air Quality Standards
NF_3	nitrogen trifluoride
NHTSA	National Highway Traffic Safety Administration
NO	nitric oxide
NO_2	nitrogen dioxide
NO_x	oxides of nitrogen
O_3	ozone
PFC	perfluorocarbon
PM_{10}	particulate matter with an aerodynamic diameter less than or equal to 10 microns
$PM_{2.5}$	particulate matter with an aerodynamic diameter less than or equal to 2.5 microns
ppb	parts per billion
ppm	parts per million
project	Fenton Parkway Project
RAQS	Regional Air Quality Strategy
RFS	Renewable Fuel Standard
RTP	Regional Transportation Plan
SAFE	Safer Affordable Fuel-Efficient
SANDAG	San Diego Association of Governments
SB	Senate Bill
SCAQMD	South Coast Air Quality Management District
SCS	Sustainable Communities Strategy
SDAB	San Diego Air Basin
SDAPCD	San Diego Air Pollution Control District
SF_6	sulfur hexafluoride
SIP	State Implementation Plan
SLCP	short-lived climate pollutant
SO_2	sulfur dioxide
SO_x	sulfur oxides
TAC	toxic air contaminants
VMT	vehicle miles traveled
VOC	volatile organic compound
ZEV	zero emission vehicle

Executive Summary

The purpose of this technical report is to assess the potential air quality and greenhouse gas (GHG) emissions impacts associated with implementation of the proposed Fenton Parkway Bridge Project (proposed project or project) in the City of San Diego (City). This assessment utilizes the significance thresholds in Appendix G of the California Environmental Quality Act (CEQA) Guidelines (14 CCR 15000 et seq.) and the San Diego Air Pollution Control District (SDAPCD) Air Quality Impact Analysis trigger levels for new or modified stationary sources (SDAPCD Rules 20.2 and 20.3)[1] for air quality, and other applicable thresholds of significance.

Project Overview

The project would involve construction of a vehicular and pedestrian bridge spanning the San Diego River from north to south, connecting Fenton Parkway with Camino Del Rio North in the City. The bridge would span the Mission Valley Community of the City. The proposed project is referenced in the Mission Valley Community Plan (adopted by the City in 2019) and is a long-sought infrastructure enhancement in the Mission Valley Community that would connect residents and businesses south of the San Diego River to land uses north of the river off Friars Road, including the San Diego State University (SDSU) Mission Valley development, which was approved by the Board of Trustees of the California State University (CSU) in 2020 (City of San Diego 2019).

Air Quality

The air quality impact analysis evaluates the potential for significant impacts to air quality due to construction and operational emissions resulting from the project. Criteria air pollutants are defined as pollutants for which the federal and state governments have established ambient air quality standards, or criteria, for outdoor concentrations to protect public health. Criteria air pollutants include ozone (O_3), nitrogen dioxide (NO_2), carbon monoxide (CO), sulfur dioxide (SO_2), coarse particulate matter (PM_{10}), fine particulate matter ($PM_{2.5}$), and lead. Pollutants that are evaluated include volatile organic compounds (VOCs) (also referred to reactive organic gases), oxides of nitrogen (NO_x), CO, sulfur oxides (SO_x), PM_{10}, and $PM_{2.5}$. VOCs and NO_x are important because they are precursors to O_3.

Air Quality Plan Consistency

Regarding consistency with local air quality plans, given that the proposed project would not result in development or growth beyond that which was contemplated by the San Diego Association of Governments (SANDAG's) regional growth projections, it was accounted for in the development of the Regional Air Quality Strategy and State Implementation Plan. As such, implementation of the proposed project would not conflict with or obstruct implementation of the applicable air quality management plans for the region, and impacts would be **less than significant.**

1 The SDAPCD Rule 20.2 and 20.3 trigger levels are specified for new or modified stationary sources, and do not generally apply to mobile sources or general land development projects. However, both the City and County of San Diego have recommended the trigger levels for evaluation of increased emissions discharged to the San Diego Air Basin (SDAB) from proposed land development projects.

Potential to Result in a Cumulatively Considerable Net Increase of Any Nonattainment Criteria Pollutant

The San Diego Air Basin (SDAB), where the project is located has been designated as a national nonattainment area for O_3, and a California nonattainment area for O_3, PM_{10}, and $PM_{2.5}$. Construction of the project would result in the temporary addition of pollutants to the local airshed caused by on-site sources (i.e., off-road construction equipment, soil disturbance, and VOC off-gassing) and off-site sources (i.e., on-road haul trucks, vendor trucks, and worker vehicle trips). Emissions from the construction phase of the project were estimated using the California Emissions Estimator Model (CalEEMod) based on information provided by project engineers, typical construction practices, and default assumptions where appropriate. The analysis concluded that maximum daily construction emissions generated by the proposed project would not exceed the applicable daily significance thresholds for any criteria air pollutant. Additionally, once construction is complete, the project is not expected to result in a substantial net increase in criteria air pollutants beyond periodic maintenance characteristic of typical existing roadways. Further, the project is not expected to increase vehicle mils traveled (VMT) within the region, given that the bridge and roadway expansion will provide a more direct route to and from destinations.

The nonattainment status of the SDAB is the result of cumulative emissions from various sources of air pollutants and their precursors within the SDAB, including motor vehicles, off-road equipment, and commercial and industrial facilities. Construction and operation of the project would generate VOC and NO_x emissions (which are precursors to O_3) and emissions of PM_{10} and $PM_{2.5}$. However, because the project-generated construction and operational emissions of VOC, NO_x, PM_{10}, and $PM_{2.5}$ would not exceed the applicable thresholds, the project would not result in a cumulatively considerable increase in emissions of nonattainment pollutants, and the impact would be **less than significant.**

Exposure of Sensitive Receptors

Carbon Monoxide Hotspots

Even at its peak, the highest level of construction-related traffic for the project would not result in traffic volumes that would cause a CO hotspot; therefore, impacts related to CO near sensitive receptors during construction would be **less than significant.**

Similarly, operation of the project would not expose sensitive receptors to localized high concentrations of CO or contribute traffic volumes to intersections that would cause a CO hotspot. As neither the 1-hour nor the 8-hour CO California Ambient Air Quality Standards would be equaled or exceeded at any of the studied intersections, potential operational CO hotspot impacts would be **less than significant.**

Toxic Air Contaminants

Construction of the project would result in exposure of nearby sensitive receptors (residences) to diesel particulate matter (DPM), which is a toxic air contaminant (TAC). The construction health risk assessment (HRA) determined that the maximum individual cancer risk would exceed the SDAPCD's threshold of significance resulting in a potentially significant impact. Mitigation Measure AQ-1 which requires the use of Tier 4 Final construction equipment, would be incorporated into the project to reduce DPM emissions. The mitigated construction health risk was determined to be less than the SDAPCD's thresholds of significance and the impact would be **less than significant.**

The project would locate a source of TACs in the form of DPM exhaust from vehicles through the provision of a new bridge near existing sensitive receptors (residences). The roadway HRA determined that the project would result in health risks less than the SDAPCD's thresholds of significance and the impact would be **less than significant.**

Other Emissions (Odors)

The analysis of other emissions is focused on the potential for an odor impact to occur. Potential odors produced during project construction would be attributable to architectural coatings, asphalt pavement application, and concentrations of unburned hydrocarbons from tailpipes of construction equipment, all of which would disperse rapidly from the project site and generally occur at magnitudes that would not affect substantial numbers of people. Impacts associated with odors during construction would be **less than significant**. The project would not include land uses with sources that have the potential to generate substantial odors, and impacts associated with odors during operation would be **less than significant**.

Greenhouse Gas Emissions

GHGs are gases that absorb infrared radiation in the atmosphere. Principal GHGs regulated under state and federal law and regulations and that are evaluated herein include carbon dioxide (CO_2), methane (CH_4), and nitrous oxide (N_2O). GHG emissions are measured in metric tons of CO_2 equivalent (MT CO_2e), which account for weighted global warming potential factors for CH_4 and N_2O.

Given that neither the CSU, nor the California Air Resources Board (CARB), nor SDAPCD have established a numerical threshold of significance for GHG emissions for the project region, the approach for evaluating the project's impacts related to GHG emissions relies on consistency with applicable plans, policies, or regulations adopted for the purpose of reducing the emissions of GHGs. The consistency evaluation is the sole basis for determining the significance of the project's GHG-related impacts on the environment.

Nevertheless, and in accordance with Section 15064.4 of the CEQA Guidelines, GHG emissions resulting from implementation of the project were quantitatively estimated using CalEEMod.[2]

Potential to Generate Significant Greenhouse Gas Emissions, and Potential to Conflict with Applicable Greenhouse Gas Reduction Plans

Construction of the project would result in GHG emissions, which are primarily associated with the use of off-road construction equipment, haul trucks, on-road vendor trucks, and worker vehicles. Given that the project would have minor operational emissions (lighting, periodic re-striping), and would result in a decrease in regional VMT from existing conditions, operational emissions would be nominal and were not quantitatively estimated.

The evaluation of the project's potential to conflict with applicable plans, policies, or regulations adopted for the purposes of reducing GHGs emissions includes the following, as summarized individually below:

- CARB's 2022 Scoping Plan Update
- SANDAG's San Diego Forward: The 2021 Regional Plan (Regional Transportation Plan/Sustainable Communities Strategy)

2 CalEEMod is a statewide land use emissions computer model designed to provide a uniform platform to calculate construction and operational emissions from land use development projects.

- The City of San Diego's Climate Action Plan
- CSU's Sustainability Policy
- SDSU Climate Action Plan

The project would not conflict with any of the applicable plans listed above and would support many of the goals and strategies contained within the plans. While construction emissions would be temporary, the proposed project would support waste reduction goals through compliance with the City's Construction and Demolition (C&D) Debris Diversion Ordinance, which requires diversion of 65% of construction debris. Operation of the proposed project would support long-term goals related to reductions in regional VMT, given that the project provides a new bicycle and pedestrian route in an area with limited north–south connectivity, which will substantially reduce trip lengths for these modes and greatly encourage their use. The project will also support decarbonization of the built environment through use of LED streetlights and auto-dimming technology consistent with City goals.

As such, and as discussed in further detail below, the project would not generate GHG emissions that would have a significant impact on the environment, nor would the project conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions the GHGs. Impacts would be **less than significant.**

Mitigation Measures

Mitigation Measure AQ-1 Tier 4 Final Construction Equipment. Prior to the commencement of any construction activities, the applicant or its designee shall provide evidence to San Diego State University (University) that for off-road equipment with engines rated at 25 horsepower or greater, no construction equipment shall be used that is less than Tier 4 Final. An exemption from these requirements may be granted by the University if the applicant documents that equipment with the required tier is not reasonably available and equivalent reductions in PM_{10} exhaust emissions are achieved from other construction equipment. Before an exemption may be considered by the University, the applicant or its designee shall be required to demonstrate that three construction fleet owners/operators in the San Diego Region were contacted and that those owners/operators confirmed Tier 4 equipment could not be located within the San Diego region. The University shall review the exemption request and provide a determination within 10 business days from receipt of the request.

Summary of Findings

The results of this report are summarized in Table 1, below, based on the significance criteria in Sections 2.3 (Air Quality), and 3.3 (GHG Emissions) and consistent with Appendix G of the CEQA Guidelines.

Table 1. Summary of Impact Determinations

Analysis	Report Section	Checklist Question	Significance Determinations	
			Unmitigated	Mitigated
Air Quality				
Would the project conflict with or obstruct implementation of the applicable air quality plan?	2.4.1	AQ-1	Less than Significant	Less than Significant
Would the project result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard?	2.4.2	AQ-2	Less than Significant	Less than Significant
Would the project expose sensitive receptors to substantial pollutant concentrations?	2.4.3	AQ-3	Potentially Significant	Less than Significant
Would the project result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?	2.4.4	AQ-4	Less than Significant	Less than Significant
GHG Emissions				
Would the project generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment, or would the project conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases?	3.4.1	GHG-1 and GHG-2	Less than Significant	Less than Significant

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1 Introduction

1.1 Regional and Local Setting

The location of the proposed bridge (project site) is in the northeast portion of the Mission Valley Community, in the central portion of the City of San Diego (City) metropolitan area (Figure 1, Project Vicinity and Location). The project site is situated south of Fenton Parkway and the Fenton Marketplace and north of Camino Del Rio North and would connect these two roadways. The San Diego River bisects the project site from east to west. Surrounding uses include commercial and residential uses to the north, San Diego State University (SDSU) Mission Valley (including Snapdragon Stadium) to the northeast, office and healthcare uses to the south, and open space, including the San Diego River. The bridge would be located within and adjacent to the City of San Diego's Multi-Habitat Planning Area and the City's Stadium Mitigation Site.

The project site is surrounded by four major freeways—Interstate (I-) 15, I-8, I-805, and State Route 163—accessed via Friars Road. The existing Metropolitan Transit System (MTS) Trolley Green Line and MTS Stadium Trolley Station are located on the north bank of the San Diego River, northwest of the project site, as shown in Figure 1. The proposed project is located in unsectioned land of the La Jolla and La Mesa U.S. Geological Survey 7.5-minute quadrangle.

1.2 Project Description

The proposed project would involve construction of a vehicular and bicycle/pedestrian bridge spanning the San Diego River from north to south (Figure 2, Project Site). The design and construction of the approach roadways and bridge would comply with applicable City, County of San Diego (County), and California Department of Transportation design standards, and American Association of State Highway and Transportation Officials guidelines. The proposed design for the bridge is a conventional post-tensioned, trapezoidal, concrete box girder structure. The bridge would be approximately 450 feet long, 58 feet wide, and 7 feet, 6 inches deep, and would consist of up to four spans. The spans would be supported on concrete seat-type abutments in the river embankments at each end and two to three piers within the river channel, each consisting of two to three approximately 20-foot-tall, 6-foot-diameter circular concrete columns. The proposed project also includes relocation and/or extension of an existing 96-inch reinforced concrete pipe storm drain on the north side of the proposed bridge and a 54-inch storm drain along the proposed southern terminus of the bridge at Camino Del Rio North, both of which discharge directly into the San Diego River. The intersection of Fenton Parkway and River Park Road and the intersection of Mission City Parkway and Camino Del Rio North would also require updates.

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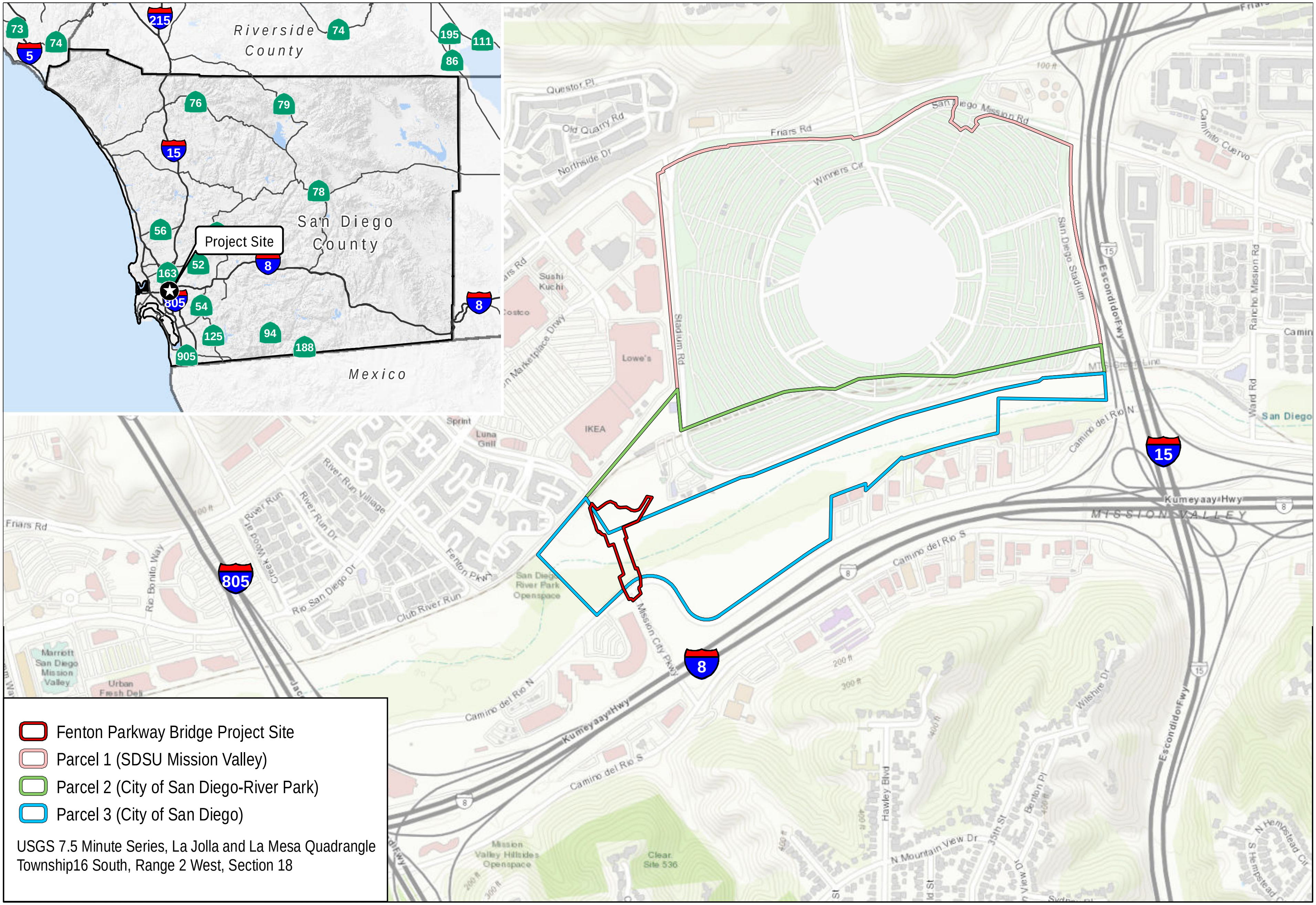

SOURCE: ESRI MAPPING SERVICE; BOWMAN/PDC 3/27/2023

DUDEK

0 500 1,000 Feet

FIGURE 1
Project Vicinity and Location
Fenton Parkway Bridge Project

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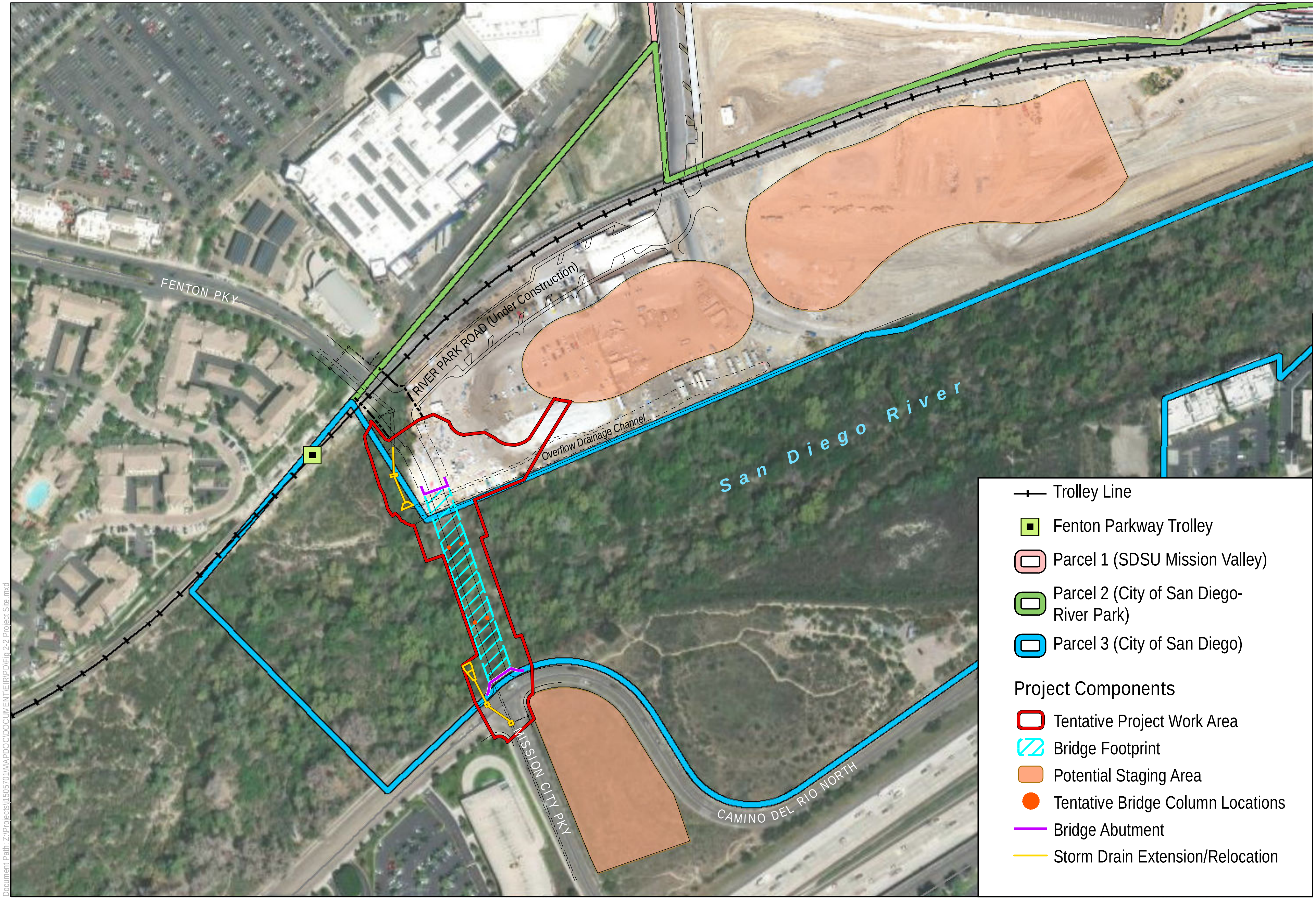

SOURCE: AERIAL-ESRI IMAGERY SERVICE; KLEINFELDER 2/8/2023
DEVELOPMENT-BOWMAN/PDC 2/22/2023; PARCELS-BOWMAN/PDC 3/27/2023

DUDEK

0 150 300 Feet

FIGURE 2
Project Site
Fenton Parkway Bridge Project

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2 Air Quality

2.1 Environmental Setting

2.1.1 Meteorological and Topographical Conditions

The primary factors that determine air quality are the locations of air pollutant sources and the amount of pollutants emitted. Meteorological and topographical conditions, however, are also important. Factors such as wind speed and direction, air temperature gradients and sunlight, and precipitation and humidity interact with physical landscape features to determine the movement and dispersal of air pollutants. The project is located within the San Diego Air Basin (SDAB) and is subject to San Diego Air Pollution Control District (SDAPCD) guidelines and regulations. The SDAB is one of 15 air basins that geographically divide California. The unique climate and topographic features of the SDAB that impact air quality in the region are discussed in further detail below.

Climate and Topography

The weather of the San Diego region, as in most of Southern California, is influenced by the Pacific Ocean and its semi-permanent high-pressure systems that result in dry, warm summers and mild, occasionally wet winters. The average temperature ranges (in degrees Fahrenheit [°F]) from the mid-40s to the high 90s. Most of the region's precipitation falls from November to April, with infrequent (approximately 10%) precipitation during the summer. The average seasonal precipitation along the coast is approximately 10 inches; the amount increases with elevation as moist air is lifted over the mountains (WRCC 2016).

The topography in the San Diego region varies greatly, from beaches on the west to mountains and desert on the east; along with local meteorology, it influences the dispersal and movement of pollutants in the SDAB. The mountains to the east prohibit dispersal of pollutants in that direction and help trap them in inversion layers.

The interaction of ocean, land, and the Pacific High-Pressure Zone maintains clear skies for much of the year and influences the direction of prevailing winds (westerly to northwesterly). Local terrain is often the dominant factor inland, and winds in inland mountainous areas tend to blow through the valleys during the day and down the hills and valleys at night.

San Diego Air Basin Climatology

The SDAB lies in the southwest corner of California and comprises the entire San Diego region, covering 4,260 square miles, and is an area of high air pollution potential. The SDAB experiences warm summers, mild winters, infrequent rainfalls, light winds, and moderate humidity. This usually mild climatological pattern is interrupted infrequently by periods of extremely hot weather, winter storms, or Santa Ana winds.

The SDAB experiences frequent temperature inversions. Subsidence inversions occur during the warmer months as descending air associated with the Pacific High-Pressure Zone meets cool marine air. The boundary between the two layers of air creates a temperature inversion that traps pollutants. The other type of inversion, a radiation inversion, develops on winter nights when air near the ground cools by heat radiation and air aloft remains warm. The shallow inversion layer formed between these two air masses also can trap pollutants. As the pollutants become more concentrated in the atmosphere, photochemical reactions occur that produce ozone (O_3), which contributes to the formation of smog. Smog is a combination of smoke and other particulates, O_3, hydrocarbons, oxides of nitrogen (NO_X) and other chemically reactive compounds which, under certain conditions of weather and sunlight, may result in a murky brown haze that causes adverse health effects (CARB 2022a).

Light daytime winds, predominately from the west, further aggravate the condition by driving air pollutants inland, toward the mountains. During the fall and winter, air quality problems are created due to carbon monoxide (CO) and NO_X emissions. CO concentrations are generally higher in the morning and late evening. In the morning, CO levels are elevated due to cold temperatures and the large number of motor vehicles traveling. Higher CO levels during the late evenings are a result of stagnant atmospheric conditions trapping CO in the area. Since CO is produced almost entirely from automobiles, the highest CO concentrations in the SDAB are associated with heavy traffic. Nitrogen dioxide (NO_2) levels are also generally higher during fall and winter days.

Under certain conditions, atmospheric oscillation results in the offshore transport of air from the Los Angeles region to San Diego County. This often produces high O_3 concentrations, as measured at air pollutant monitoring stations within the County. The transport of air pollutants from Los Angeles to San Diego has also occurred within the stable layer of the elevated subsidence inversion, where high levels of O_3 are transported.

2.1.2 Pollutants and Effects

2.1.2.1 Criteria Air Pollutants

Criteria air pollutants are defined as pollutants for which the federal and state governments have established ambient air quality standards, or criteria, for outdoor concentrations to protect public health. The national and California standards have been set, with an adequate margin of safety, at levels above which concentrations could be harmful to human health and welfare. These standards are designed to protect the most sensitive persons from illness or discomfort. Pollutants of concern include O_3, NO_2, CO, sulfur dioxide (SO_2), particulate matter with an aerodynamic diameter less than or equal to 10 microns (PM_{10}), particulate matter with an aerodynamic diameter less than or equal to 2.5 microns ($PM_{2.5}$), and lead. In California, sulfates, vinyl chloride, hydrogen sulfide (H_2S), and visibility-reducing particles are also regulated as criteria air pollutants. These pollutants, as well as toxic air contaminants (TACs), are discussed in the following paragraphs.[3]

Ozone. O_3 is a strong-smelling, pale blue, reactive, toxic chemical gas consisting of three oxygen atoms. It is a secondary pollutant formed in the atmosphere by a photochemical process involving the sun's energy and O_3 precursors. These precursors are mainly NO_x and volatile organic compounds (VOCs). The maximum effects of precursor emissions on O_3 concentrations usually occur several hours after they are emitted and many miles from the source. Meteorology and terrain play major roles in O_3 formation, and ideal conditions occur during summer and early autumn on days with low wind speeds or stagnant air, warm temperatures, and cloudless skies. O_3 exists in the upper atmosphere O_3 layer (stratospheric O_3) and at the Earth's surface in the troposphere (ground-level O_3).[4] The O_3 that the U.S. Environmental Protection Agency (EPA) and the California Air Resources Board (CARB) regulate as a criteria air pollutant is produced close to the ground level, where people live, exercise, and breathe. Ground-level O_3 is a harmful air pollutant that causes numerous adverse health effects and is thus considered "bad" O_3.

3 The descriptions of the criteria air pollutants and associated health effects are based on the U.S. Environmental Protection Agency's "Criteria Air Pollutants" (EPA 2020a), as well as the California Air Resources Board's "Glossary" (CARB 2022a) and "Fact Sheet: Air Pollution Sources, Effects and Control" (CARB 2009).

4 The troposphere is the layer of the Earth's atmosphere nearest to the surface of the Earth. The troposphere extends outward about 5 miles at the poles and about 10 miles at the equator.

Stratospheric, or "good," O_3 occurs naturally in the upper atmosphere, where it reduces the amount of ultraviolet light (i.e., solar radiation) entering the Earth's atmosphere. Without the protection of the beneficial stratospheric O_3 layer, plant and animal life would be seriously harmed.

O_3 in the troposphere causes numerous adverse health effects; short-term exposures (lasting for a few hours) to O_3 at levels typically observed in Southern California can result in breathing pattern changes, reduction of breathing capacity, increased susceptibility to infections, inflammation of the lung tissue, and some immunological changes (EPA 2020b).

Inhalation of O_3 causes inflammation and irritation of the tissues lining human airways, causing and worsening a variety of symptoms. Exposure to O_3 can reduce the volume of air that the lungs breathe in, thereby causing shortness of breath. O_3 in sufficient doses increases the permeability of lung cells, rendering them more susceptible to toxins and microorganisms. The occurrence and severity of health effects from O_3 exposure vary widely among individuals, even when the dose and the duration of exposure are the same. Research shows adults and children who spend more time outdoors participating in vigorous physical activities are at greater risk from the harmful health effects of O_3 exposure. While there are relatively few studies on the effects of O_3 on children, the available studies show that children are no more or less likely to suffer harmful effects than adults. However, there are a number of reasons why children may be more susceptible to O_3 and other pollutants. Children and teens spend nearly twice as much time outdoors and engaged in vigorous activities as adults. Children breathe more rapidly than adults and inhale more pollution per pound of their body weight than adults. Also, children are less likely than adults to notice their own symptoms and avoid harmful exposures. Further research may be able to better distinguish between health effects in children and adults. Children, adolescents, and adults who exercise or work outdoors, where O_3 concentrations are the highest, are at the greatest risk of harm from this pollutant (CARB 2022b).

Nitrogen Dioxide. NO_2 is a brownish, highly reactive gas that is present in all urban atmospheres. The major mechanism for the formation of NO_2 in the atmosphere is the oxidation of the primary air pollutant nitric oxide (NO), which is a colorless, odorless gas. NO_x plays a major role, together with VOCs, in the atmospheric reactions that produce O_3. NO_x is formed from fuel combustion under high temperature or pressure. In addition, NO_x is an important precursor to acid rain and may affect both terrestrial and aquatic ecosystems. The two major emissions sources are transportation and stationary fuel combustion sources such as electric utility and industrial boilers. NO_2 can irritate the lungs, cause bronchitis and pneumonia, and lower resistance to respiratory infections (EPA 2016).

A large body of health science literature indicates that exposure to NO_2 can induce adverse health effects. The strongest health evidence, and the health basis for the ambient air quality standards for NO_2, results from controlled human exposure studies that show that NO_2 exposure can intensify responses to allergens in allergic asthmatics. In addition, a number of epidemiological studies have demonstrated associations between NO_2 exposure and premature death, cardiopulmonary effects, decreased lung function growth in children, respiratory symptoms, emergency room visits for asthma, and intensified allergic responses. Infants and children are particularly at risk because they have disproportionately higher exposure to NO_2 than adults due to their greater breathing rate for their body weight and their typically greater outdoor exposure duration. Several studies have shown that long-term NO_2 exposure during childhood, the period of rapid lung growth, can lead to smaller lungs at maturity in children with higher levels of exposure compared to children with lower exposure levels. In addition, children with asthma have a greater degree of airway responsiveness compared with adult asthmatics. In adults, the greatest risk is to people who have chronic respiratory diseases, such as asthma and chronic obstructive pulmonary disease (CARB 2022c).

Carbon Monoxide. CO is a colorless, odorless gas formed by the incomplete combustion of hydrocarbon, or fossil fuels. CO is emitted almost exclusively from motor vehicles, power plants, refineries, industrial boilers, ships, aircraft, and trains. In urban areas, such as the project location, automobile exhaust accounts for the majority of CO emissions. CO is a nonreactive air pollutant that dissipates relatively quickly; therefore, ambient CO concentrations generally follow the spatial and temporal distributions of vehicular traffic. CO concentrations are influenced by local meteorological conditions—primarily wind speed, topography, and atmospheric stability. CO from motor vehicle exhaust can become locally concentrated when surface-based temperature inversions are combined with calm atmospheric conditions, which is a typical situation at dusk in urban areas from November to February. The highest levels of CO typically occur during the colder months of the year, when inversion conditions are more frequent.

CO is harmful because it binds to hemoglobin in the blood, reducing the ability of blood to carry oxygen. This interferes with oxygen delivery to the body's organs. The most common effects of CO exposure are fatigue, headaches, confusion and reduced mental alertness, light-headedness, and dizziness due to inadequate oxygen delivery to the brain. For people with cardiovascular disease, short-term CO exposure can further reduce their body's already compromised ability to respond to the increased oxygen demands of exercise, exertion, or stress. Inadequate oxygen delivery to the heart muscle leads to chest pain and decreased exercise tolerance. Unborn babies whose mothers experience high levels of CO exposure during pregnancy are at risk of adverse developmental effects. Unborn babies, infants, elderly people, and people with anemia or with a history of heart or respiratory disease are most likely to experience health effects with exposure to elevated levels of CO (CARB 2022d).

Sulfur Dioxide. SO_2 is a colorless, pungent gas formed primarily from incomplete combustion of sulfur-containing fossil fuels. The main sources of SO_2 are coal and oil used in power plants and industries; as such, the highest levels of SO_2 are generally found near large industrial complexes. In recent years, SO_2 concentrations have been reduced by the increasingly stringent controls placed on stationary source emissions of SO_2 and limits on the sulfur content of fuels.

Controlled human exposure and epidemiological studies show that children and adults with asthma are more likely to experience adverse responses with SO_2 exposure, compared with the non-asthmatic population. Effects at levels near the 1-hour standard are those of asthma exacerbation, including bronchoconstriction accompanied by symptoms of respiratory irritation such as wheezing, shortness of breath, and chest tightness, especially during exercise or physical activity. Also, exposure at elevated levels of SO_2 (above 1 parts per million [ppm]) results in increased incidence of pulmonary symptoms and disease, decreased pulmonary function, and increased risk of mortality. Older people and people with cardiovascular disease or chronic lung disease (such as bronchitis or emphysema) are most likely to experience these adverse effects (CARB 2022e).

SO_2 is of concern both because it is a direct respiratory irritant and because it contributes to the formation of sulfate and sulfuric acid in particulate matter (NRC 2005). People with asthma are of particular concern, both because they have increased baseline airflow resistance and because their SO_2-induced increase in airflow resistance is greater than in healthy people, and it increases with the severity of their asthma (NRC 2005). SO_2 is thought to induce airway constriction via neural reflexes involving irritant receptors in the airways (NRC 2005).

Particulate Matter. Particulate matter pollution consists of very small liquid and solid particles floating in the air, which can include smoke, soot, dust, salts, acids, and metals. Particulate matter can form when gases emitted from industries and motor vehicles undergo chemical reactions in the atmosphere. $PM_{2.5}$ and PM_{10} represent fractions of particulate matter. Coarse particulate matter (PM_{10}) consists of particulate matter that is 10 microns or less in diameter, which is about 1/7 the thickness of a human hair. Major sources of PM_{10} include crushing or grinding operations; dust stirred up by vehicles traveling on roads; wood-burning stoves and fireplaces; dust from construction, landfills, and agriculture; wildfires and brush/waste burning; industrial sources; windblown dust from open lands; and atmospheric chemical and photochemical reactions. Fine particulate matter ($PM_{2.5}$) consists of particulate matter that is 2.5 microns or less in diameter, which is roughly 1/28 the diameter of a human hair. $PM_{2.5}$ results from fuel combustion (e.g., from motor vehicles and power generation and industrial facilities), residential fireplaces, and woodstoves. In addition, $PM_{2.5}$ can be formed in the atmosphere from gases such as sulfur oxides (SO_x), NO_x, and VOCs.

$PM_{2.5}$ and PM_{10} pose a greater health risk than larger-size particles. When inhaled, these tiny particles can penetrate the human respiratory system's natural defenses and damage the respiratory tract. $PM_{2.5}$ and PM_{10} can increase the number and severity of asthma attacks, cause or aggravate bronchitis and other lung diseases, and reduce the body's ability to fight infections. Very small particles of substances such as lead, sulfates, and nitrates can cause lung damage directly or be absorbed into the bloodstream, causing damage elsewhere in the body. Additionally, these substances can transport adsorbed gases such as chlorides or ammonium into the lungs, also causing injury. Whereas PM_{10} tends to collect in the upper portion of the respiratory system, $PM_{2.5}$ is so tiny that it can penetrate deeper into the lungs and damage lung tissue. Suspended particulates also damage and discolor surfaces on which they settle and produce haze and reduce regional visibility.

Several adverse health effects have been associated with exposure to both $PM_{2.5}$ and PM_{10}. For $PM_{2.5}$, short-term exposures (up to 24-hour duration) have been associated with premature mortality, increased hospital admissions for heart or lung causes, acute and chronic bronchitis, asthma attacks, emergency room visits, respiratory symptoms, and restricted activity days. These adverse health effects have been reported primarily in infants, children, and older adults with preexisting heart or lung diseases. In addition, of all of the common air pollutants, $PM_{2.5}$ is associated with the greatest proportion of adverse health effects related to air pollution, both in the United States and worldwide based on the World Health Organization's Global Burden of Disease Project. Short-term exposures to PM_{10} have been associated primarily with worsening of respiratory diseases, including asthma and chronic obstructive pulmonary disease, leading to hospitalization and emergency department visits (CARB 2023a).

Long-term exposure (months to years) to $PM_{2.5}$ has been linked to premature death, particularly in people who have chronic heart or lung diseases, and reduced lung function growth in children. The effects of long-term exposure to PM_{10} are less clear, although several studies suggest a link between long-term PM_{10} exposure and respiratory mortality. The International Agency for Research on Cancer published a review in 2015 that concluded that particulate matter in outdoor air pollution causes lung cancer (CARB 2023a).

Lead. Lead in the atmosphere occurs as particulate matter. Sources of lead include leaded gasoline; the manufacturing of batteries, paints, ink, ceramics, and ammunition; and secondary lead smelters. Prior to 1978, mobile emissions were the primary source of atmospheric lead. Between 1978 and 1987, the phaseout of leaded gasoline reduced the overall inventory of airborne lead by nearly 95%. With the phaseout of leaded gasoline, secondary lead smelters, battery recycling, and manufacturing facilities are becoming lead-emissions sources of greater concern.

Prolonged exposure to atmospheric lead poses a serious threat to human health. Health effects associated with exposure to lead include gastrointestinal disturbances, anemia, kidney disease, and in severe cases, neuromuscular and neurological dysfunction. Of particular concern are low-level lead exposures during infancy and childhood. Such exposures are associated with decrements in neurobehavioral performance, including intelligence quotient (IQ) performance, psychomotor performance, reaction time, and growth. Children are highly susceptible to the effects of lead.

Sulfates. Sulfates are the fully oxidized form of sulfur, which typically occur in combination with metals or hydrogen ions. Sulfates are produced from reactions of SO_2 in the atmosphere and can result in respiratory impairment, as well as reduced visibility.

Vinyl Chloride. Vinyl chloride is a colorless gas with a mild, sweet odor, which has been detected near landfills, sewage plants, and hazardous waste sites, due to the microbial breakdown of chlorinated solvents. Short-term exposure to high levels of vinyl chloride in air can cause nervous system effects, such as dizziness, drowsiness, and headaches. Long-term exposure through inhalation can cause liver damage, including liver cancer.

Hydrogen Sulfide. H_2S is a colorless and flammable gas that has a characteristic odor of rotten eggs. Sources of H_2S include geothermal power plants, petroleum refineries, sewers, and sewage treatment plants. Exposure to H_2S can result in nuisance odors, as well as headaches and breathing difficulties at higher concentrations.

Visibility-Reducing Particles. Visibility-reducing particles are any particles in the air that obstruct the range of visibility. Effects of reduced visibility can include obscuring the viewshed of natural scenery, reducing airport safety, and discouraging tourism. Sources of visibility-reducing particles are the same as for $PM_{2.5}$.

Volatile Organic Compounds. Hydrocarbons are organic gases that are formed from hydrogen and carbon and sometimes other elements. Hydrocarbons that contribute to formation of O_3 are referred to and regulated as VOCs (also referred to as reactive organic gases). Combustion engine exhaust, oil refineries, and fossil-fueled power plants are the sources of hydrocarbons. Other sources of hydrocarbons include evaporation from petroleum fuels, solvents, dry cleaning solutions, and paint.

The primary health effects of VOCs result from the formation of O_3 and its related health effects. High levels of VOCs in the atmosphere can interfere with oxygen intake by reducing the amount of available oxygen through displacement. Carcinogenic forms of hydrocarbons, such as benzene, are considered TACs. There are no separate ambient air quality standards for VOCs as a group.

2.1.2.2 Non-criteria Air Pollutants

Toxic Air Contaminants. A substance is considered toxic if it has the potential to cause adverse health effects in humans, including increasing the risk of cancer upon exposure, or acute and/or chronic non-cancer health effects. A toxic substance released into the air is considered a TAC. TACs are identified by federal and state agencies based on a review of available scientific evidence. In the state of California, TACs are identified through a two-step process that was established in 1983 under the Toxic Air Contaminant Identification and Control Act. This two-step process of risk identification and risk management and reduction was designed to protect residents from the health effects of toxic substances in the air. In addition, the California Air Toxics “Hot Spots” Information and Assessment Act, Assembly Bill (AB) 2588, was enacted by the legislature in 1987 to address public concern over the release of TACs into the atmosphere. The law requires facilities emitting toxic substances to provide local air pollution control districts with information that will allow an assessment of the air toxics problem, identification of air toxics emissions sources, location of resulting hotspots, notification of the public exposed to significant risk, and development of effective strategies to reduce potential risks to the public over 5 years.

Examples include certain aromatic and chlorinated hydrocarbons, certain metals, and asbestos. TACs are generated by a number of sources, including stationary sources, such as dry cleaners, gas stations, combustion sources, and laboratories; mobile sources, such as automobiles; and area sources, such as landfills. Adverse health effects associated with exposure to TACs may include carcinogenic (i.e., cancer-causing) and non-carcinogenic effects. Non-carcinogenic effects typically affect one or more target organ systems and may be experienced on either short-term (acute) or long-term (chronic) exposure to a given TAC.

Diesel Particulate Matter. Diesel particulate matter (DPM) is part of a complex mixture that makes up diesel exhaust. Diesel exhaust is composed of two phases, gas and particle, both of which contribute to health risks. More than 90% of DPM is less than 1 micrometer in diameter (about 1/70 the diameter of a human hair), and thus is a subset of $PM_{2.5}$ (CARB 2022f). DPM is typically composed of carbon particles ("soot," also called black carbon) and numerous organic compounds, including over 40 known cancer-causing organic substances. Examples of these chemicals include polycyclic aromatic hydrocarbons, benzene, formaldehyde, acetaldehyde, acrolein, and 1,3-butadiene (CARB 2022f). CARB classified "particulate emissions from diesel-fueled engines" (i.e., DPM) (17 CCR 93000) as a TAC in August 1998. DPM is emitted from a broad range of diesel engines: on-road diesel engines, including trucks, buses, and cars, and off-road diesel engines, including locomotives, marine vessels, and heavy-duty construction equipment, among others. Approximately 70% of all airborne cancer risk in California is associated with DPM (CARB 2000). To reduce the cancer risk associated with DPM, CARB adopted a diesel risk reduction plan in 2000 (CARB 2000). Because it is part of $PM_{2.5}$, DPM also contributes to the same non-cancer health effects as $PM_{2.5}$ exposure. These effects include premature death; hospitalizations and emergency department visits for exacerbated chronic heart and lung disease, including asthma; increased respiratory symptoms; and decreased lung function in children. Several studies suggest that exposure to DPM may also facilitate development of new allergies (CARB 2022f). Those most vulnerable to non-cancer health effects are children, whose lungs are still developing, and older people, who often have chronic health problems.

Odorous Compounds. Odors are generally regarded as an annoyance rather than a health hazard. Manifestations of a person's reaction to odors can range from psychological (e.g., irritation, anger, or anxiety) to physiological (e.g.,circulatory and respiratory effects, nausea, vomiting, and headache). The ability to detect odors varies considerably among the population and overall is quite subjective. People may have different reactions to the same odor. An odor that is offensive to one person may be perfectly acceptable to another (e.g., coffee roaster). An unfamiliar odor is more easily detected and is more likely to cause complaints than a familiar one. In a phenomenon known as odor fatigue, a person can become desensitized to almost any odor, and recognition may only occur with an alteration in the intensity. The occurrence and severity of odor impacts depend on the nature, frequency, and intensity of the source; wind speed and direction; and the sensitivity of receptors.

Valley Fever. Coccidioidomycosis, more commonly known as "Valley Fever," is an infection caused by inhalation of the spores of the *Coccidioides immitis* fungus, which grows in the soils of the southwestern United States. The fungus is very prevalent in the soils of California's San Joaquin Valley, particularly in Kern County. The ecologic factors that appear to be most conducive to survival and replication of the spores are high summer temperatures, mild winters, sparse rainfall, and alkaline, sandy soils.

San Diego County is not considered a highly endemic region for Valley Fever, as the latest report from the County of San Diego Health and Human Services Agency Public Health Services indicated the County has 13.5 cases per 100,000 people (County of San Diego 2023). In the zip code area of the project site, the case rate is reported as less than or equal to 4.9 cases per 100,000 people during the period between 2011 and 2020 (County of San Diego 2021).

2.1.3 Sensitive Receptors

Some land uses are considered more sensitive to changes in air quality than others, depending on the population groups and the activities involved. People most likely to be affected by air pollution include children, the elderly, athletes, and people with cardiovascular and chronic respiratory diseases. Facilities and structures where these air-pollution-sensitive people live or spend considerable amounts of time are known as sensitive receptors. Land uses where air-pollution-sensitive individuals are most likely to spend time include schools and schoolyards, parks and playgrounds, daycare centers, nursing homes, hospitals, and residential communities (sensitive sites or sensitive land uses) (CARB 2005). The City of San Diego adopts the South Coast Air Quality Management District (SCAQMD) sensitive receptor definition, which identifies examples as long-term health care facilities, rehabilitation centers, convalescent centers, retirement homes, residences—such as medical patients in homes, schools, playgrounds, childcare centers, and athletic facilities (City of San Diego 2022a).

The nearest sensitive receptors are existing multifamily residences located adjacent to the northwest of the project’s boundaries. These existing sensitive receptors represent the nearest land uses with the potential to be impacted by construction and operation of the project.

2.2 Regulatory Setting

2.2.1 Federal Regulations

2.2.1.1 Criteria Air Pollutants

The federal Clean Air Act, passed in 1970 and last amended in 1990, forms the basis for the national air pollution control effort. The U.S. Environmental Protection Agency (EPA) is responsible for implementing most aspects of the Clean Air Act, including setting National Ambient Air Quality Standards (NAAQS) for major air pollutants; setting hazardous air pollutant (HAP) standards; approving state attainment plans; setting motor vehicle emission standards; issuing stationary source emission standards and permits; and establishing acid rain control measures, stratospheric O_3 protection measures, and enforcement provisions. Under the Clean Air Act, NAAQS are established for the following criteria pollutants: O_3, CO, NO_2, SO_2, PM_{10}, $PM_{2.5}$, and lead.

The NAAQS describe acceptable air quality conditions designed to protect the health and welfare of the citizens of the nation. The NAAQS (other than for O_3, NO_2, SO_2, PM_{10}, $PM_{2.5}$, and those based on annual averages or arithmetic mean) are not to be exceeded more than once per year. NAAQS for O_3, NO_2, SO_2, PM_{10}, and $PM_{2.5}$ are based on statistical calculations over 1- to 3-year periods, depending on the pollutant. The Clean Air Act requires the EPA to reassess the NAAQS at least every 5 years to determine whether adopted standards are adequate to protect public health based on current scientific evidence. States with areas that exceed the NAAQS must prepare a State Implementation Plan (SIP) that demonstrates how those areas will attain the NAAQS within mandated time frames.

2.2.1.2 Hazardous Air Pollutants

The 1977 federal Clean Air Act amendments required the EPA to identify National Emission Standards for Hazardous Air Pollutants to protect public health and welfare. HAPs include certain volatile organic chemicals, pesticides, herbicides, and radionuclides that present a tangible hazard, based on scientific studies of exposure to humans and other mammals. Under the 1990 federal Clean Air Act Amendments, which expanded the control program for HAPs, 187 substances and chemical families were identified as HAPs.

2.2.2 State Regulations

2.2.2.1 Criteria Air Pollutants

The federal Clean Air Act delegates the regulation of air pollution control and the enforcement of the NAAQS to the states. In California, the task of air quality management and regulation has been legislatively granted to CARB, with subsidiary responsibilities assigned to air quality management districts and air pollution control districts at the regional and county levels. CARB, which became part of the California Environmental Protection Agency in 1991, is responsible for ensuring implementation of the California Clean Air Act of 1988, responding to the federal Clean Air Act, and regulating emissions from motor vehicles and consumer products.

CARB has established California Ambient Air Quality Standards (CAAQS), which are generally more restrictive than the NAAQS. As stated previously, an ambient air quality standard defines the maximum amount of a pollutant averaged over a specified period of time that can be present in outdoor air without harm to the public's health. For each pollutant, concentrations must be below the relevant CAAQS before a basin can attain the corresponding CAAQS. Air quality is considered "in attainment" if pollutant levels are continuously below the CAAQS and violate the standards no more than once each year. The CAAQS for O_3, CO, SO_2 (1-hour and 24-hour), NO_2, PM_{10}, and $PM_{2.5}$ and visibility-reducing particles are values that are not to be exceeded.

California air districts have based their thresholds of significance for CEQA purposes on the levels that scientific and factual data demonstrate that the air basin can accommodate without affecting the attainment date for the NAAQS or CAAQS. Since an ambient air quality standard is based on maximum pollutant levels in outdoor air that would not harm the public's health, and air district thresholds pertain to attainment of the ambient air quality standard, this means that the thresholds established by air districts are also protective of human health. The NAAQS and CAAQS are presented in Table 2.

Table 2. Ambient Air Quality Standards

Pollutant	Averaging Time	California Standards[a]	National Standards[b]	
		Concentration[c]	Primary[c,d]	Secondary[c,e]
O_3	1 hour	0.09 ppm (180 μg/m^3)	—	Same as primary standard[f]
	8 hours	0.070 ppm (137 μg/m^3)	0.070 ppm (137 μg/m^3)[f]	
NO_2[g]	1 hour	0.18 ppm (339 μg/m^3)	0.100 ppm (188 μg/m^3)	Same as primary standard
	Annual arithmetic mean	0.030 ppm (57 μg/m^3)	0.053 ppm (100 μg/m^3)	
CO	1 hour	20 ppm (23 mg/m^3)	35 ppm (40 mg/m^3)	None
	8 hours	9.0 ppm (10 mg/m^3)	9 ppm (10 mg/m^3)	
SO_2[h]	1 hour	0.25 ppm (655 μg/m^3)	0.075 ppm (196 μg/m^3)	—
	3 hours	—	—	0.5 ppm (1,300 μg/m^3)
	24 hours	0.04 ppm (105 μg/m^3)	0.14 ppm (for certain areas)[g]	—

Table 2. Ambient Air Quality Standards

Pollutant	Averaging Time	California Standards[a]	National Standards[b]	
		Concentration[c]	Primary[c,d]	Secondary[c,e]
	Annual	—	0.030 ppm (for certain areas)[g]	—
PM_{10}[i]	24 hours	50 μg/m³	150 μg/m³	Same as primary standard
	Annual arithmetic mean	20 μg/m³	—	
$PM_{2.5}$[i]	24 hours	—	35 μg/m³	Same as primary standard
	Annual arithmetic mean	12 μg/m³	12.0 μg/m³	15.0 μg/m³
Lead[j,k]	30-day average	1.5 μg/m³	—	—
	Calendar quarter	—	1.5 μg/m³ (for certain areas)[k]	Same as primary standard
	Rolling 3-month average	—	0.15 μg/m³	
H_2S	1 hour	0.03 ppm (42 μg/m³)	—	—
Vinyl chloride[j]	24 hours	0.01 ppm (26 μg/m³)	—	—
Sulfates	24 hours	25 μg/m³	—	—
Visibility reducing particles	8 hours (10:00 a.m. to 6:00 p.m. PST)	Insufficient amount to produce an extinction coefficient of 0.23 per kilometer due to the number of particles when the relative humidity is less than 70%	—	—

Source: CARB 2016.

Notes: O_3 = ozone; ppm = parts per million by volume; μg/m³ = micrograms per cubic meter; NO_2 = nitrogen dioxide; CO = carbon monoxide; mg/m³= milligrams per cubic meter; SO_2 = sulfur dioxide; PM_{10} = coarse particulate matter; $PM_{2.5}$ = fine particulate matter; H_2S = hydrogen sulfide; PST = Pacific Standard Time.

a California standards for O_3, CO, SO_2 (1-hour and 24-hour), NO_2, suspended particulate matter (PM_{10}, $PM_{2.5}$), and visibility-reducing particles are values that are not to be exceeded. All others are not to be equaled or exceeded. CAAQS are listed in the Table of Standards in Section 70200 of Title 17 of the California Code of Regulations.

b National standards (other than O_3, NO_2, SO_2, particulate matter, and those based on annual averages or annual arithmetic mean) are not to be exceeded more than once per year. The O_3 standard is attained when the fourth highest 8-hour concentration measured at each site in a year, averaged over 3 years, is equal to or less than the standard. For PM_{10}, the 24-hour standard is attained when the expected number of days per calendar year with a 24-hour average concentration above 150 μg/m³ is equal to or less than 1. For $PM_{2.5}$, the 24-hour standard is attained when 98% of the daily concentrations, averaged over 3 years, are equal to or less than the standard.

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

d National primary standards: The levels of air quality necessary, with an adequate margin of safety, to protect the public health.

e National secondary standards: The levels of air quality necessary to protect the public welfare from any known or anticipated adverse effects of a pollutant.

f On October 1, 2015, the national 8-hour O_3 primary and secondary standards were lowered from 0.075 to 0.070 ppm.

g To attain the national 1-hour standard, the 3-year average of the annual 98th percentile of the 1-hour daily maximum concentrations at each site must not exceed 100 parts per billion (ppb). Note that the national 1-hour standard is in units of ppb. California standards are in units of ppm. To directly compare the national 1-hour standard to the California standards, the units can be converted from ppb to ppm. In this case, the national standard of 100 ppb is identical to 0.100 ppm.

[h] On June 2, 2010, a new 1-hour SO_2 standard was established, and the existing 24-hour and annual primary standards were revoked. To attain the national 1-hour standard, the 3-year average of the annual 99th percentile of the 1-hour daily maximum concentrations at each site must not exceed 75 ppb. The 1971 SO_2 national standards (24-hour and annual) remain in effect until 1 year after an area is designated for the 2010 standard, except that in areas designated nonattainment of the 1971 standards, the 1971 standards remain in effect until implementation plans to attain or maintain the 2010 standards are approved.

[i] On December 14, 2012, the national annual $PM_{2.5}$ primary standard was lowered from 15 μg/m^3 to 12.0 μg/m^3. The existing national 24-hour $PM_{2.5}$ standards (primary and secondary) were retained at 35 μg/m^3, as was the annual secondary standard of 15 μg/m^3. The existing 24-hour PM_{10} standards (primary and secondary) of 150 μg/m^3 were also retained. The form of the annual primary and secondary standards is the annual mean averaged over 3 years.

[j] CARB has identified lead and vinyl chloride as TACs with no threshold level of exposure for adverse health effects determined. These actions allow for the implementation of control measures at levels below the ambient concentrations specified for these pollutants.

[k] The national standard for lead was revised on October 15, 2008, to a rolling 3-month average. The 1978 lead standard (1.5-μg/m^3 as a quarterly average) remains in effect until 1 year after an area is designated for the 2008 standard, except that in areas designated nonattainment for the 1978 standard, the 1978 standard remains in effect until implementation plans to attain or maintain the 2008 standard are approved.

Local Ambient Air Quality

CARB, air districts, and other agencies monitor ambient air quality at approximately 250 air quality monitoring stations across the state. The SDAPCD monitors local ambient air quality in the vicinity of the project site. Air quality monitoring stations usually measure pollutant concentrations 10 feet above ground level; therefore, air quality is often referred to in terms of ground-level concentrations. The most recent background ambient air quality data from 2019 to 2021 are presented in Table 3.

The San Diego-Kearny Villa Road monitoring station, located at 6125A Kearny Villa Road, San Diego, California, is the air quality monitoring station nearest to the project site, located approximately 4.5 miles north of the project site. The data collected at this station is considered representative of the air quality experienced in the project vicinity. Air quality data for 8-hour O_3, NO_2, and $PM_{2.5}$ from the Kearny Villa Road monitoring station are provided in Table 2-2. Because CO, PM_{10}, and SO_2 are not monitored at the Kearny Villa Road monitoring station, these measurements were taken from the El Cajon monitoring station located at 533 First Street, El Cajon, California 92019 (approximately 11 miles east of the project site). The number of days exceeding the ambient air quality standards are also shown in Table 3.

Table 3. Local Ambient Air Quality Data

Averaging Time	Unit	Agency/ Method	Ambient Air Quality Standard	Measured Concentration by Year			Exceedances by Year		
				2019		2021	2019		2021
Ozone (O_3)[a]									
Maximum 1-hour concentration	ppm	California	0.12	0.083	0.123	0.095	0	2	1
Maximum 8-hour concentration	ppm	California	0.070	0.079	0.081	0.081	1	12	2
		National	0.070	0.071	0.072	0.070	1	10	1
Nitrogen Dioxide (NO_2)[a]									
Maximum 1-hour concentration	ppm	California	0.18	0.047	0.048	0.047	0	0	0
		National	0.100	0.039	0.039	0.035	0	0	0
Annual concentration	ppm	California	0.030	0.009	0.008	0.008	—	—	—
		National	0.053	0.008	0.007	0.007	—	—	—

Table 3. Local Ambient Air Quality Data

Averaging Time	Unit	Agency/ Method	Ambient Air Quality Standard	Measured Concentration by Year			Exceedances by Year		
				2019		2021	2019		2021
Carbon Monoxide (CO)[b]									
Maximum 1-hour concentration	ppm	California	20	—	—	—	0	0	0
		National	35	1.3	1.5	1.2	0	0	0
Maximum 8-hour concentration	ppm	California	9.0	—	—	—	0	0	0
		National	9	1.0	1.4	1.1	0	0	0
Sulfur Dioxide (SO_2)[b]									
Maximum 1-hour concentration	ppm	National[b,]	0.075	0.0008	0.0017	0.0016	0	0	0
Maximum 24-hour concentration	ppm	National	0.14	0.0003	0.0004	0.0003	0	0	0
Annual concentration	ppm	National	0.030	0.00007	0.00009	0.00006	—	—	—
Coarse Particulate Matter (PM_{10})[b]									
Maximum 24-hour concentration	μg/m^3	California	50	37.4	*	*	0	0	0
		National	150	38.7	55.0	40.0	0	0	0
Annual concentration	μg/m^3	California	20	*	*	*	—	—	—
Fine Particulate Matter ($PM_{2.5}$)[a]									
Maximum 24-hour concentration	μg/m^3	National	35	16.2	47.5	20.9	0	5.8	0
Annual concentration	μg/m^3	California	12	8.0	*	*	—	—	—
		National	12.0	7.1	8.9	7.9	0	0	0

Sources:
a CARB 2023b
b EPA 2023a.

Notes: ppm = parts per million by volume; — = not available; μg/m^3 = micrograms per cubic meter; * = insufficient data available to determine the value.

San Diego Air Basin Attainment Designation

Pursuant to the 1990 Clean Air Act Amendments, EPA classifies air basins (or portions thereof) as "attainment" or "nonattainment" for each criteria air pollutant, based on whether the NAAQS have been achieved. Generally, if the recorded concentrations of a pollutant are lower than the standard, the area is classified as "attainment" for that pollutant. If an area exceeds the standard, the area is classified as "nonattainment" for that pollutant. As previously discussed, these standards are set by EPA or CARB for the maximum level of a given air pollutant that can exist in the outdoor air without unacceptable effects on human health or the public welfare. If there is not enough data available to determine whether the standard is exceeded in an area, the area is designated as "unclassified" or "unclassifiable."

The designation of "unclassifiable/attainment" means that the area meets the standard or is expected to be meet the standard despite a lack of monitoring data. Areas that achieve the standards after a nonattainment designation are redesignated as maintenance areas and must have approved maintenance plans to ensure continued attainment of the standards. The California Clean Air Act, like its federal counterpart, called for the designation of areas as "attainment" or "nonattainment," but based on the CAAQS rather than the NAAQS.

Table 4 summarizes SDAB's federal and state attainment designations for each of the criteria pollutants.

Table 4. San Diego Air Basin Attainment Designation

Pollutant	Designation/Classification	
	National Standards	
O_3 (8-hour)	Nonattainment	Nonattainment
O_3 (1-hour)	Attainment[a]	Nonattainment
CO	Attainment	Attainment
PM_{10}	Unclassifiable[b]	Nonattainment
$PM_{2.5}$	Attainment	Nonattainment[c]
NO_2	Attainment	Attainment
SO_2	Attainment	Attainment
Lead	Attainment	Attainment
Sulfates	(No federal standard)	Attainment
H_2S	(No federal standard)	Unclassified
Visibility-reducing particles	(No federal standard)	Unclassified
Vinyl chloride	(No federal standard)	No designation

Source: SDAPCD 2023a.
Designation/Classification Definitions: attainment = meets the standards; nonattainment = does not meet the standards; unclassified or unclassifiable = insufficient data to classify.
Notes: O_3 = ozone; CO = carbon monoxide; PM_{10} = coarse particulate matter; $PM_{2.5}$ = fine particulate matter; NO_2 = nitrogen dioxide; SO_2 = sulfur dioxide; H_2S = hydrogen sulfide.

a The federal 1-hour standard of 0.12 parts per million (ppm) was in effect from 1979 through June 15, 2005. The revoked standard is referenced here because it was employed for such a long period and because this benchmark is addressed in SIPs.

b At the time of designation, if the available data does not support a designation of attainment or nonattainment, the area is designated as unclassifiable.

c CARB has not reclassified the region to attainment yet due to (1) incomplete data, and (2) the use of non-California Approved Samplers (CAS). While data collected does meet the requirements for designation of attainment with federal $PM_{2.5}$ standards, the data completeness requirements for state $PM_{2.5}$ standards substantially exceed federal requirements and mandates, and have historically not been feasible for most air districts to adhere to given local resources. APCD has begun replacing most regional filter-based $PM_{2.5}$ monitors as they reach the end of their useful life with continuous $PM_{2.5}$ air monitors to ensure collected data meets stringent completeness requirements in the future. APCD anticipates these new monitors will be approved as "CAS" monitors once CARB review the list of approved monitors, which has not been updated since 2013.

As shown in Table 4, the SDAB is designated as a nonattainment area for federal O_3 standards, and state O_3, PM_{10}, and $PM_{2.5}$ standards (SDAPCD 2023). The SDAB is designated as an attainment or unclassified area for all other criteria air pollutants.

2.2.2.2 Toxic Air Contaminants

The state Air Toxics Program was established in 1983 under AB 1807 (Tanner). The California TAC list identifies more than 700 pollutants, of which carcinogenic and noncarcinogenic toxicity criteria have been established for a subset of these pollutants pursuant to the California Health and Safety Code. In accordance with AB 2728, the state list includes the (federal) HAPs. In 1987, the Legislature enacted the Air Toxics "Hot Spots" Information and Assessment Act of 1987 (AB 2588) to address public concern over the release of TACs into the atmosphere. AB 2588 law requires facilities emitting toxic substances to provide local air pollution control districts with information that will allow an assessment of the air toxics problem, identification of air toxics emissions sources, location of resulting hotspots, notification of the public exposed to significant risk, and development of effective strategies to reduce potential risks to the public over 5 years. TAC emissions from individual facilities are quantified and prioritized. "High-priority" facilities are required to perform a health risk assessment, and if specific thresholds are exceeded, the facility operator is required to communicate the results to the public in the form of notices and public meetings.

In 2000, CARB approved a comprehensive Diesel Risk Reduction Plan to reduce diesel emissions from both new and existing diesel-fueled vehicles and engines (CARB 2000). The regulation is anticipated to result in an 80% decrease in statewide diesel health risk in 2020 compared with the diesel risk in 2000. Additional regulations apply to new trucks and diesel fuel, including the On-Road Heavy Duty Diesel Vehicle (In-Use) Regulation, the On-Road Heavy Duty (New) Vehicle Program, the In-Use Off-Road Diesel Vehicle Regulation, and the New Off-Road Compression-Ignition (Diesel) Engines and Equipment program. These regulations and programs have timetables by which manufacturers must comply and existing operators must upgrade their diesel-powered equipment. CARB has adopted several Airborne Toxic Control Measures (ATCM) that reduce diesel emissions, including:

- Diesel Particulate Matter Control Measure for On-Road Heavy-Duty Diesel-Fueled Residential and Commercial Solid Waste Collection Vehicles (13 CCR 2020, 13 CCR 2021)
- ATCM for Diesel Particulate Matter from Portable Engines Rated 50 horsepower and greater (17 CCR 93116)
- ATCM for In-Use Diesel-Fueled Transport Refrigeration Units (TRU) and TRU Generator Sets, and Facilities where TRUs operate (13 CCR 2477 and Article 8)
- ATCM to limit diesel-fueled commercial motor vehicle idling (13 CCR 2485)
- ATCM for In-Use Off-Road Diesel-Fueled Fleets (13 CCR 2449 et seq.)
- ATCM for In-Use On-Road Diesel-Fueled Vehicles (13 CCR 2025)

In addition, the Air Toxics "Hot Spots" Information and Assessment Act (AB 2588, 1987, Connelly) was enacted in 1987 and requires stationary sources to report the types and quantities of certain substances released into the air. The goals of the Air Toxics "Hot Spots" Act are to collect emission data, to identify facilities having localized impacts, to ascertain health risks, to notify nearby residents of significant risks, and to reduce those significant risks to acceptable levels.

California Health and Safety Code Section 41700

Section 41700 of the Health and Safety Code states that a person shall not discharge from any source whatsoever quantities of air contaminants or other material that cause injury, detriment, nuisance, or annoyance to any considerable number of persons or to the public; or that endanger the comfort, repose, health, or safety of any of those persons or the public; or that cause, or have a natural tendency to cause, injury or damage to business or property. Section 41700 also applies to sources of objectionable odors.

Air Quality and Land Use Handbook

CARB published the Air Quality and Land Use Handbook in 2005 to provide important air quality information about certain types of facilities (e.g., freeways, refineries, distribution centers, etc.) that should be considered when siting sensitive land uses such as residences. CARB provides recommended siting distances from certain types of facilities when locating new sensitive land uses. The recommendations are advisory and should not be interpreted as defined "buffer zones. If a project is within the siting distance, CARB recommends further analysis. Where possible, CARB recommends a minimum separation between new sensitive land uses and existing sources.

2.2.3 Local Regulations

2.2.3.1 San Diego Air Pollution Control District

While CARB is responsible for the regulation of mobile emission sources within the state, local air quality management districts and air pollution control districts are responsible for enforcing standards and regulating stationary sources. The project site is located within the SDAB and is subject to the guidelines and regulations of SDAPCD.

In San Diego County, O_3 and particulate matter are the pollutants of main concern since exceedances of CAAQS for those pollutants are experienced here in most years. For this reason, the SDAB has been designated as a nonattainment area for the state PM_{10}, $PM_{2.5}$, and O_3 standards. The SDAB is also a federal O_3 attainment (maintenance) area for 1997 8-hour O_3 standard, a O_3 nonattainment area for the 2008 8-hour O_3 standard, and a CO maintenance area (western and central part of the SDAB only). The project area is in the CO maintenance area.

Federal Attainment Plans

In November 2020, the SDAPCD adopted the Air Quality Management Plan for attaining the federal 8-hour 75 parts per billion (ppb) and 70 ppb ozone standards (2020 Attainment Plan), which is the SDAB's input to SIP and required to demonstrate how the SDACPD proposes to attain the federal ozone standards. The plan anticipates attainment of the 75 ppb and 70 ppb NAAQS standards by 2026 and 2032, respectively. The 2020 Attainment Plan includes planning requirements for attaining the O_3 NAAQS including on-road motor vehicle emissions budgets for transportation conformity, a vehicle miles traveled (VMT) offset demonstration, Reasonably Available Control Measures, Reasonable Further Progress, an Attainment Demonstration, and contingency measures in the event of a failure to meet a milestone or to attain by the predicted attainment date (SDAPCD 2020).

State Attainment Plans

SDAPCD and the San Diego Association of Governments (SANDAG) are responsible for developing and implementing the clean air plan for attainment and maintenance of the ambient air quality standards in the SDAB. The Regional Air Quality Strategy (RAQS) for the SDAB was initially adopted in 1991 and is updated every 3 years, most recently in 2022 (SDAPCD 2023b). The RAQS outlines SDAPCD's plans and control measures designed to attain the CAAQS for O_3. The RAQS relies on information from CARB and SANDAG, including mobile and area source emissions, as well as information regarding projected growth in the County and the cities in the County, to forecast future emissions and then determine from that the strategies necessary for the reduction of emissions through regulatory controls. The CARB mobile source emission projections and SANDAG growth projections are based on population, vehicle trends, and land use plans developed by the County and the cities in the County as part of the development of their general plans (SANDAG 2021).

On March 9, 2023, SDAPCD adopted the revised 2022 RAQS for the County. The RAQS plan demonstrates how the San Diego region will further reduce air pollution emissions to meet state health-based standards for ground-level O_3. The 2022 RAQS guides the SDAPCD in deploying tools, strategies, and resources to continue reducing pollutants that are precursors to ground-level O_3, including NO_x and VOC. The 2022 RAQS emphasizes O_3 control measures but also identifies complementary measures and strategies that can reduce emissions of greenhouse gases (GHGs) and PM. It also includes new analyses exploring O_3 and its relationship to public health, mobile sources, under-resourced communities, and GHGs and climate change. Further, the 2022 RAQS identifies strategies to expand SDAPCD regional partnerships, identify more opportunities to engage the public and communities of concern, and integrate environmental justice and equity across all proposed measures and strategies.

Regarding particulate matter emissions reduction efforts, in December 2005, SDAPCD prepared a report titled "Measures to Reduce Particulate Matter in San Diego County" to address implementation of Senate Bill (SB) 656 in San Diego County (SB 656 required additional controls to reduce ambient concentrations of PM_{10} and $PM_{2.5}$) (SDAPCD 2005). In the report, SDAPCD evaluated the implementation of source-control measures that would reduce particulate matter emissions associated with residential wood combustion; various construction activities including earthmoving, demolition, and grading; bulk material storage and handling; carryout and trackout removal and cleanup methods; inactive disturbed land; disturbed open areas; unpaved parking lots/staging areas; unpaved roads; and windblown dust (SDAPCD 2005).

SDAPCD Rules and Regulations

As stated previously, SDAPCD is responsible for planning, implementing, and enforcing federal and state ambient standards in the SDAB. The following rules and regulations apply to all sources in the jurisdiction of SDAPCD:

- **SDAPCD Regulation IV: Prohibitions; Rule 50: Visible Emissions.** Prohibits any activity causing air contaminant emissions darker than 20% opacity for more than an aggregate of 3 minutes in any consecutive 60-minute time period. In addition, Rule 50 prohibits any diesel pile-driving hammer activity causing air contaminant emissions for a period or periods aggregating more than 4 minutes during the driving of a single pile (SDAPCD 1997).
- **SDAPCD Regulation IV: Prohibitions; Rule 51: Nuisance.** Prohibits the discharge, from any source, of such quantities of air contaminants or other materials that cause or have a tendency to cause injury, detriment, nuisance, annoyance to people and/or the public, or damage to any business or property (SDAPCD 1976).
- **SDAPCD Regulation IV: Prohibitions; Rule 55: Fugitive Dust.** Regulates fugitive dust emissions from any commercial construction or demolition activity capable of generating fugitive dust emissions, including active operations, open storage piles, and inactive disturbed areas, as well as track-out and carry-out onto paved roads beyond a Project Site (SDAPCD 2009).
- **SDAPCD Regulation IV: Prohibitions; Rule 67.0.1: Architectural Coatings.** Requires manufacturers, distributors, and end users of architectural and industrial maintenance coatings to reduce VOC emissions from the use of these coatings, primarily by placing limits on the VOC content of various coating categories (SDAPCD 2015).

2.2.3.2 San Diego Association of Governments

SANDAG serves as the metropolitan planning organization (MPO) and council of governments for the San Diego region. SANDAG brings together decision-makers to develop solutions to regional issues including improving equity, transportation, air quality, clean energy, economic development, goods movement, public health, public safety, and housing. To address these regional issues, SANDAG is responsible for developing the Regional Transportation Plan (RTP) and incorporated Sustainable Communities Strategy (SCS). The RTP/SCS is updated every 4 years in collaboration with the 18 cities and unincorporated County of San Diego, in addition to regional, state, and federal partners. The most recent RTP/SCS, San Diego Forward: The 2021 Regional Plan was adopted in 2021 and includes five key transportation strategies, including complete corridors, high-speed transit services, mobility hubs, flexible fleets, and a digital platform to tie the transportation system together (SANDAG 2021).

2.3 Significance Criteria and Methodology

2.3.1 Thresholds of Significance

The significance criteria used to evaluate the project impacts to air quality is based on the recommendations provided in Appendix G of the CEQA Guidelines. For the purposes of this air quality analysis, a significant impact would occur if the project would (14 CCR 15000 et seq.):

1. Conflict with or obstruct implementation of the applicable air quality plan.
2. Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard.
3. Expose sensitive receptors to substantial pollutant concentrations.
4. Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people.[5]

Appendix G of the CEQA Guidelines (14 CCR 15000 et seq.) indicates that, where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to determine whether a project would have a significant impact on air quality.

As part of its air quality permitting process, SDAPCD has established thresholds in Rule 20.2 requiring the preparation of air quality impact assessments for permitted stationary sources. SDAPCD sets forth quantitative emission thresholds below which a stationary source would not have a significant impact on ambient air quality. Project-related air quality impacts estimated in this environmental analysis would be considered significant if any of the applicable significance thresholds presented in Table 5 are exceeded.[6]

For CEQA purposes, these screening criteria can be used as numeric methods to demonstrate that the project's total emissions would or would not result in a significant impact to air quality.

Table 5. Screening-Level Thresholds for Air Quality Impact Analysis

Pollutant	Total Emissions (pounds per Day)
Volatile Organic Compounds (VOC)	137[a]
Oxides of Nitrogen (NO_x)	250
Carbon Monoxide (CO)	550
Oxides of Sulfur (SO_x)	250
Respirable Particulate Matter (PM_{10})	100

5 City of San Diego CEQA guidance for air quality includes thresholds in addition to those contained in Appendix G of the CEQA Guidelines. The relevant additional threshold applicable to the project requires evaluation of the project's potential to result in emissions of particulate matter (dust) that exceed 100 pounds per day. Given that the SDAPCD Air Quality Impact Analysis trigger level for total PM_{10} is also 100 pounds per day and inclusive of dust, this additional significance threshold is captured within the approach used herein.

6 The SDAPCD Rule 20.2 and 20.3 trigger levels are specified for new or modified stationary sources, and do not generally apply to mobile sources or general land development projects. However, both the City and County of San Diego have recommended the trigger levels for evaluation of increased emissions discharged to the SDAB from proposed land development projects.

Table 5. Screening-Level Thresholds for Air Quality Impact Analysis

Pollutant	Total Emissions (pounds per Day)
Fine Particulate Matter ($PM_{2.5}$)	67

Sources: City of San Diego 2022c; SDAPCD 2021.
Note:
[a] VOC threshold based on the significance thresholds recommended by the Monterey Bay Unified Air Pollution Control District for the North Central Coast Air Basin, which has similar federal and state attainment status as the SDAB for O_3.

The thresholds listed in Table 5 represent screening-level thresholds that can be used to evaluate whether project-related emissions would cause a significant impact on air quality. Emissions below the screening-level thresholds would not cause a significant impact. For nonattainment pollutants, if emissions exceed the thresholds shown in Table 5, the project could have the potential to result in a cumulatively considerable net increase in these pollutants and thus could have a significant impact on the ambient air quality.

SDAPCD Rule 51 (Public Nuisance) prohibits emission of any material that causes nuisance to a considerable number of persons or endangers the comfort, health, or safety of any person (SDAPCD 1976). A project that involves a use that would produce objectionable odors would be deemed to have a significant odor impact if it would affect a considerable number of off-site receptors.

2.3.2 Approach and Methodology

The California Emissions Estimator Model (CalEEMod) 2022 Version 2022.1 was used to estimate emissions from construction of the project (CAPCOA 2022). CalEEMod is a statewide computer model developed in cooperation with air districts throughout the state to quantify criteria air pollutant and GHG emissions associated with construction activities and operation of a variety of land use projects, including bridge construction and other linear projects. CalEEMod input parameters, including the land use type used to represent the project and its size, construction schedule, and anticipated use of construction equipment, were based on information provided by the applicant or default model assumptions if project specifics were unavailable. Given that the project will result in a net reduction in vehicle miles traveled in the region (VMT), there will only be a nominal increase in emissions with project operation (e.g., routine maintenance). Accordingly, operational criteria air pollutant emissions were not estimated and were assessed qualitatively.

2.3.2.1 Construction Emissions

As described in Section 1.2, Project Description, the project would involve construction of a vehicular and bicycle/pedestrian bridge spanning the San Diego River from north to south, connecting Fenton Parkway and Camino Del Rio North. In addition to bridge infrastructure, construction would also include roadway expansion and other offsite improvements.

For the purposes of this analysis, two potential construction methods were evaluated Pre-Cast, and Cast-in-Place. Conceptual schedules were developed based on available information provided by the project engineers, typical construction practices, and CalEEMod default assumptions. Construction phasing is intended to represent a schedule of anticipated activities for use in estimating potential project-generated construction emissions.

Pre-Cast Bridge Construction

The project was assumed to require the following construction phases, with likely overlaps provided by project engineers (durations are approximate):

- Environmentally Sensitive Areas (ESA) Fencing, Clearing, Grubbing, and Mobilization: 3 weeks
- Cast-In-Drilled-Hole (CIDH) Piles (Pier 2,3,4): 4 weeks
- Ground Improvements (Abut 1): 3 weeks
- Column Form, Rebar, Pour (Pier 2,3,4): 6 weeks
- Embankment Grading (Abut 1): 1 week
- Excavation (Abut 1): 1 week
- Ground Improvements (Abut 5): 3 weeks
- Cap Falsework (Pier 2,3,4): 6 weeks
- Cap Form, Rebar, Pour (Pier 2,3,4): 7 weeks
- Embankment Grading (Abut 5): 1 week
- Excavation (Abut 5): 1 week
- Form, Rebar, Pour (Abut 1 & 5, Stem, Walls, Diaphragms & Deck): 22 weeks
- Erect Precast Girders: 1 week
- Cure Deck, Strip Overhangs: 2 weeks
- Riprap (Abut 1 & 5): 4 weeks
- Sidewalk Barrier Installation and Deck Grind: 3 weeks

Pre-Cast Off-site Improvements

- Grubbing and Land Clearing: 1 week
- Grading and Excavation: 2.5 weeks
- Drainage, Utilities, and Sub-Grade: 2 weeks
- Paving: 1 week
- Architectural Coating: 1 week

Table 6 provides the construction equipment mix and vehicle trips assumed for estimating project-generated Pre-Cast construction emissions associated with each phase.

Table 6. Pre-Cast Construction Method Scenario Assumptions

	One Way Trips per Day			Equipment		
Phase	Worker		Haul	Type		Hrs/day
Bridge Construction						
General Construction	24	0	0	Aerial lift	1	8
				Air compressors	1	8
				Cranes	1	8
				Forklifts	1	8
				Generator sets	4	8
				Welders	1	8
ESA Fencing; Clear and Grub; Mobilization	16	4	8	Excavators	1	8
				Graders	1	8
				Rubber-tired loaders	1	8
				Rubber-tired dozers	1	8
				Scrapers	1	8
				Chipper/Other Construction Equipment	1	8
CIDH Piles (Pier 2, 3, 4)	20	338	0	Bore/drill rig	1	8
				Cranes	1	8
				Rubber-tired loaders	1	8
				Generator sets	3	8
Ground Improvements Abut 1	10	6	26	Cranes	1	10
				Drill rig	1	10
				Generator/powerpack	1	10
				Air compressor	1	10
				Telehandler	1	10
				Rubber-tired loader	1	10
Column Form, Rebar, Pour (Pier 2, 3, 4)	24	116	0	Cranes	1	8
Embankment Grading (Abut 1)	12	4	4	Excavators	1	8
				Rubber-tired dozers	1	8
				Rubber-tired loaders	1	8
				Rollers	1	8
Excavation Abut 1	8	130	6	Excavators	1	8
				Rubber-tired loaders	1	8
Ground Improvements Abut 5	10	6	26	Cranes	1	10
				Drill rig	1	10
				Generator/powerpack	1	10
				Air compressor	1	10
				Telehandler/Forklift	1	10
				Rubber-tired loader	1	10
Cap Falsework (Pier 2, 3, 4)	24	0	0	Pile driver	1	8
				Cranes	1	8

Table 6. Pre-Cast Construction Method Scenario Assumptions

Phase	One Way Trips per Day			Equipment		
	Worker		Haul	Type		Hrs/day
Cap Form, Rebar, Pour (Pier 2, 3, 4)	24	116	0	Cranes	1	8
Embankment Grading (Abut 5)	12	4	0	Excavators	1	8
				Rubber-tired dozers	1	8
				Rubber-tired loaders	1	8
				Roller compactor	1	8
Excavation Abut 5	8	130	6	Excavators	1	8
				Rubber-tired loaders	1	8
Form, Rebar, Pour (Abut 1 and 5 Footing, Stem, Walls, and diaphragms and deck)	24	116	0	Cranes	1	8
Erect Precast Girders	24	0	0	Pile driver	1	8
				Cranes	1	8
Cure Deck, Strip Overhangs	4	56	0	Cranes	1	8
Riprap (Abut 1 and 5)	8	0	4	Excavators	1	8
				Rubber-tired loaders	1	8
Sidewalk Barrier Install, Deck Grind	4	56	0	Cranes	1	8
Offsite Improvements						
Grubbing and Land Clearing	6	2	6	Crawler tractors	1	8
				Excavators	1	8
Grading and Excavation	30	1	156	Excavators	3	8
				Graders	1	8
				Crawler tractors	1	8
				Rollers	2	8
				Rubber-tired loaders	1	8
				Scrapers	2	8
				Tractors/loaders/ backhoes	2	8
Drainage, Utilities, and Sub-Grade	26	2	12	Tractors/loaders/ backhoes	2	8
				Scrapers	2	8
				Rough terrain forklifts	1	8
				Plate compactors	1	8
				Pumps	1	8
				Air compressors	1	8
				Graders	1	8
				Generator sets	1	8
Paving	18	2	—	Rollers	3	8
				Pavers	1	8
				Paving equipment	1	8

Table 6. Pre-Cast Construction Method Scenario Assumptions

Phase	One Way Trips per Day			Equipment		
	Worker		Haul	Type		Hrs/day
				Tractors/loaders/ backhoes	2	8
Architectural Coating	6	2	—	Air compressors	1	6

Source: Kleinfelder, personal communication, Keith Gazaway, June 2023.

Cast-in-Place Bridge Construction

The project was assumed to require the following construction phases, with likely overlaps provided by project engineers (durations are approximate):

- ESA Fencing, Clearing, Grubbing, and Mobilization: 3 weeks
- CIDH Piles (Pier 2,3): 4 weeks
- Ground Improvements (Abut 1): 3 weeks
- Column Form, Rebar, Pour (Pier 2,3): 4 weeks
- Embankment Grading (Abut 1): 1 week
- Excavation (Abut 1): 1 week
- Ground Improvements (Abut 4): 3 weeks
- Embankment Grading (Abut 4): 1 week
- Excavation (Abut 4): 1 week
- CIDH Piles (Abut 1, 4): 9 weeks
- Form, Rebar, Pour (Abut 1 & 4, Footing, Stem, Walls): 13 weeks
- Erect Falsework: 8 weeks
- Form, Rebar, Pour (Soffit, Stems, Deck): 23 weeks
- Cure Deck, Stress Bridge, Strip Falsework: 7 weeks
- Riprap (Abut 1 & 5): 4 weeks
- Sidewalk Barrier Installation and Deck Grind: 3 weeks

Pre-Cast Off-site Improvements

- Grubbing and Land Clearing: 1 week
- Grading and Excavation: 2.5 weeks
- Drainage, Utilities, and Sub-Grade: 2 weeks
- Paving: 1 week
- Architectural Coating: 1 week

Table 7 provides the construction equipment mix and vehicle trips assumed for estimating project-generated Cast-in-Place construction emissions associated with each phase.

Table 7. Cast-in-Place Construction Method Scenario Assumptions

Phase	One Way Trips per Day			Equipment		
	Worker		Haul	Type		Hrs/day
Bridge Construction						
General Construction	24	0	0	Aerial lift	1	8
				Air compressors	1	8
				Cranes	1	8
				Forklifts	1	8
				Generator sets	4	8
				Welders	1	8
ESA Fencing; Clear and Grub; Mobilization	16	4	8	Excavators	1	8
				Graders	1	8
				Rubber-tired loaders	1	8
				Rubber-tired dozer	1	8
				Scrapers	1	8
				Chipper/Other Construction Equipment	1	8
CIDH Piles (Pier 2, 3)	20	338	0	Bore/drill rig	1	8
				Cranes	1	8
				Rubber-tired loaders	1	8
				Generator sets	3	8
Ground Improvements Abut 1	10	6	26	Cranes	1	10
				Drill rig	1	10
				Generator/powerpack	1	10
				Air compressor	1	10
				Telehandler	1	10
				Rubber-tired loaders	1	10
Column Form, Rebar, Pour (Pier 2, 3)	24	116	0	Cranes	1	8
Embankment Grading (Abut 1)	12	4	4	Excavators	1	8
				Rubber-tired dozers	1	8
				Rubber-tired loaders	1	8
				Rollers	1	8
Excavation Abut 1	8	130	6	Excavators	1	8
				Rubber-tired loaders	1	8
Ground Improvements Abut 4	10	6	26	Cranes	1	10
				Drill rig	1	10
				Generator/powerpack	1	10
				Air compressor	1	10
				Telehandler/Forklift	1	10
				Rubber-tired loaders	1	10
Embankment Grading (Abut 4)	12	4	0	Excavators	1	8
				Bulldozer	1	8
				Rubber-tired loaders	1	8

Table 7. Cast-in-Place Construction Method Scenario Assumptions

Phase	One Way Trips per Day			Equipment		
	Worker		Haul	Type		Hrs/day
				Roller compactor	1	8
Excavation Abut 4	8	130	6	Excavators	1	8
				Rubber-tired loaders	1	8
CIDH Piles (Abut 1, 4 Footing, Stem, Walls)	20	338	0	Bore/Drill Rig	1	8
				Cranes	1	8
				Rubber-tired loaders	1	8
				Generator sets	3	8
Form, Rebar, Pour (Abut 1, 4 Footing, Stem, Walls)	44	116[1]	0	Cranes	1	8
Erect Falsework	40	0	0	Cranes	1	8
Form, Rebar, Pour (Soffit, Stems, Deck)	54	116[1]	0	Cranes	1	8
Cure Deck, Stress Bridge, Strip Falsework	40	56	—	Cranes	1	8
Riprap (Abut 1 and 4)	8	—	4	Excavators	1	8
				Rubber-tired loaders	1	8
Sidewalk Barrier Install, Deck Grind	4	56	—	Cranes	1	8
Offsite Improvements						
Grubbing and Land Clearing	6	2	6	Crawler tractors	1	8
				Excavators	1	8
Grading and Excavation	30	1	156	Excavators	3	8
				Graders	1	8
				Crawler tractors	1	8
				Rollers	2	8
				Rubber-tired loaders	1	8
				Scrapers	2	8
				Tractors/loaders/ backhoes	2	8
Drainage, Utilities, and Sub-Grade	26	2	12	Tractors/loaders/ backhoes	2	8
				Scrapers	2	8
				Rough terrain forklifts	1	8
				Plate compactors	1	8
				Pumps	1	8
				Air compressors	1	8
				Graders	1	8
				Generator sets	1	8
Paving	18	2	—	Rollers	3	8
				Pavers	1	8
				Paving equipment	1	8

Table 7. Cast-in-Place Construction Method Scenario Assumptions

Phase	One Way Trips per Day			Equipment		
	Worker		Haul	Type		Hrs/day
				Tractors/loaders/ backhoes	2	8
Architectural Coating	6	2	—	Air compressors	1	6

Source: Kleinfelder, 2024, personal communication Keith Gazaway
Notes:
1 An additional 200 concrete trucks (400 truck trips) were added to the modeling for the form, rebar, and pour, which would occur over the period of 1 day.

Material Import/Export

Proposed project construction would include approximately 17,500 cubic yards of import and approximately 4,450 cubic yards of material export during the ground improvement, excavation, grubbing/land clearing, and utilities phases. Detailed construction equipment modeling assumptions are provided in Appendix A, Air Quality and Greenhouse Gas Emissions CalEEMod Output Files.

Entrained dust results from the exposure of earth surfaces to wind from the direct disturbance and movement of soil, resulting in PM_{10} and $PM_{2.5}$ emissions. Construction of project components would be subject to SDAPCD Rule 55 – Fugitive Dust Control. Compliance with Rule 55 would limit fugitive dust (PM_{10} and $PM_{2.5}$) that may be generated during grading and construction activities. Standard construction practices that would be employed to reduce fugitive dust emissions include watering of the active sites two times per day, depending on weather conditions.

Internal combustion engines used by construction equipment, vendor trucks (i.e., delivery trucks), haul trucks, and worker vehicles would result in emissions of VOCs, NO_x, CO, PM_{10}, and $PM_{2.5}$. The application of architectural coatings, such as roadway striping and signage, and application of asphalt pavement would also produce VOC emissions; however, the contractor is required to procure architectural coatings from a supplier in compliance with the requirements of SDAPCD Rule 67.0.1 for Architectural Coatings.

2.3.2.2 Health Risk Assessments

Construction Health Risk Assessment

A Health Risk Assessment (HRA) was performed to evaluate potential health risk associated with construction of the project. Construction of the project has the potential to expose nearby sensitive receptors (existing residences) to TAC emissions in the form of DPM from offroad equipment and onroad trucks. The following discussion summarizes the dispersion modeling and supporting modeling is provided in Appendix B.

For risk assessment purposes, PM_{10} in diesel exhaust is considered DPM, originating mainly from off-road equipment operating at a defined location for a given length of time at a given distance from sensitive receptors. Less-intensive, more-dispersed emissions result from on road vehicle exhaust (e.g., heavy-duty diesel trucks). For the construction HRA, the CalEEMod scenario for the project was adjusted to reduce diesel truck one-way trip distances to 1,000 feet (0.19 miles) to estimate emissions from truck pass-by at proximate receptors. The air dispersion modeling methodology was based on SDAPCD's accepted modeling practices (SDAPCD 2022). Air dispersion modeling was performed using the EPA's American Meteorological Society/Environmental Protection Agency Regulatory Model (AERMOD) Version 23132 modeling system (computer software) with the Lakes Environmental Software implementation/user interface, AERMOD View Version 12.0.0. The HRA followed the Office of Environmental Health Hazard Assessment (OEHHA) 2015 guidelines (OEHHA 2015) and SDAPCD guidance to calculate the health risk impacts at all proximate receptors as further discussed below. The dispersion modeling included the use of standard regulatory default options. AERMOD parameters were selected consistent with the SDAPCD and EPA guidance and identified as representative of the Project site and Project activities. Principal parameters of this modeling are presented in Table 8.

Table 8. American Meteorological Society/Environmental Protection Agency Regulatory Model Principal Parameters

Parameter	Details
Meteorological Data	The SDAPCD was consulted to obtain the most representative meteorological data set for the project site. The SDAPCD provided meteorological data for the Kearney Villa Road meteorological station, which is located at 6125A Kearney Villa Road, San Diego approximately 4.5 miles north of the project site. The latest three-year data set from the Chula Vista station was for the 2019-2021 years.
Urban versus Rural Option	The rural dispersion option is the modeling default for San Diego County; however, urban dispersion is allowed if the land area meets the criteria as defined in Section 4.4.1 in the OEHHA 2015 Guidance Manual (SDAPCD 2022a). Urban dispersion option was selected due to the developed nature of the surrounding area.
Terrain Characteristics	Digital elevation model files were imported into AERMOD so that complex terrain features were evaluated as appropriate for the site. This accounts for complex terrain within 2 kilometers of the site. The National Elevation Dataset (NED) dataset with resolution of 1 arc-second was used. The AERMAP terrain preprocessor, which can process U.S. Geological Survey (USGS) Digital Elevation Model (DEM) data and data from the NED, is also used to generate the terrain elevations for the receptor locations. The AERMAP program generates an output file that contains the receptor pathway data for AERMOD. The default elevated option in AERMOD was used to determine ground-level concentrations.
Source Release Characterizations	Air dispersion modeling of DPM emissions was conducted assuming the off-road equipment would operate in accordance with the modeling scenario estimated in CalEEMod (Appendix A). The construction equipment and on-site truck travel DPM emissions were modeled as a line of adjacent volume sources across the project site to represent project construction with a release height of 5 meters, plume height of 10 meters, and plume width of 10 meters (SCAQMD 2008).
Receptors	Two uniform Cartesian receptor grids with 20-meter spacing to establish the impact area and evaluate locations of maximum health risk impact. Discrete receptors were placed over residential receptors in closest proximity to the site and at school sites in the surrounding area. Receptors were placed at both ground-level and at elevated heights (11 meters) to simulate multi-level buildings.

Source: See Appendix B.
Notes: AERMOD = American Meteorological Society/Environmental Protection Agency Regulatory Model; SDAPCD = San Diego Air Pollution Control District; SCAQMD = South Coast Air Quality Management District

Regarding receptors, the construction scenario used two uniform Cartesian receptor grids with 20-meter spacing to establish the impact area and evaluate locations of maximum health risk impact. Discrete receptors were placed over residential receptors in closest proximity to the site and at school sites in the surrounding area.

The health risk calculations were performed using the Hotspots Analysis and Reporting Program Version 2 (HARP2) Air Dispersion and Risk Tool (ADMRT, Version 22118). AERMOD was run with all sources emitting unit emissions (1 gram per second) to obtain the necessary input values for HARP2. The line of volume sources was partitioned evenly based on the 1 gram per second emission rate. The ground-level concentration plot files were then used to estimate the long-term cancer health risk to an individual, and the non-cancer chronic health indices and the results were compared to the SDAPCD thresholds to assess project significance. There is no reference exposure level for acute health impacts from DPM, and, thus, acute risk was not evaluated.

Roadway Health Risk Assessment

CARB's Air Quality and Land Use Handbook: A Community Health Perspective encourages consideration of the health impacts of siting sensitive receptors near sources of TAC emissions such as freeways, high volume roadways, distribution centers, rail yards, gasoline stations, etc. and prescribes recommended separation distances (CARB 2005). The proposed project does not involve the siting of sensitive receptors; however, it would locate a potential source of TAC emissions in the form of DPM from vehicle travel closer to existing receptors by constructing the bridge. For the roadway health risk, the operation year 2027 was assumed consistent with completion of project construction.

As stated previously, for risk assessment purposes, PM_{10} in diesel exhaust is considered DPM, originating mainly from diesel-fueled vehicle travel. Under California regulatory guidelines, DPM is used as a surrogate measure of carcinogen exposure for the mixture of chemicals that make up diesel exhaust as a whole. CalEPA is a proponent of using the surrogate approach to quantifying cancer risks associated with diesel exhaust over a component-based approach, which involves estimating risks for each of the individual components of a mixture. CalEPA has concluded that "potential cancer risk from inhalation exposure to whole diesel exhaust will outweigh the multi-pathway cancer risk from the speciated components" (OEHHA 2003). Gasoline vehicles also result in TACs; however, DPM is the primary driver of risk from highways and will be the only TAC assessed.

Average Daily Trip (ADT) data from the Fenton Parkway Bridge Transportation Study (Fehr & Peers 2023) was used to provide the total daily vehicle trips traveling along the bridge. EMFAC2021 vehicle data for San Diego County for year 2027 was used to estimate the percentage breakdown of trucks versus passenger vehicles. Using the County data is a conservative estimate as the County data includes the entirety of the County, which would include more truck travel, whereas the project site would be a local road and likely have less truck travel. Based on the ADT of 12,600 vehicles per day, approximately 646 of those vehicles would be trucks and 11,954 vehicles would be passenger vehicles. EMFAC2021 data was also used to estimate the quantity of vehicles that would be diesel-fueled. Based on the data, approximately 65% of the trucks would be diesel-fueled, whereas less than 1% of passenger vehicles would be diesel-fueled. This equates to 421 trucks and 74 passenger vehicles. The remaining vehicles would be a combination of gasoline, electric, natural gas, and plug-in hybrids. PM_{10} emission factors for diesel-fueled passenger vehicle and trucks were estimated using EMFAC2021 San Diego County data for year 2027.

Conservatively, the 2027 emission factor data set was used for the entire duration of the analysis (i.e., 30 years). Use of the 2027 emission factor would overstate potential impacts since this approach does not include reductions in emissions due to fleet turnover or cleaner technology with lower emissions. The travel DPM emissions were calculated by applying the exhaust PM_{10} emission factor from EMFAC and the total trip number over the length of the distance traveled over the bridge.

The dispersion modeling was performed using AERMOD (Version 23132). The vehicle traffic was modeled as a line of adjacent volume sources running along the new Fenton Parkway Bridge. Receptors were placed into two uniform

Cartesian receptor grids with 20-meter spacing to establish the impact area and evaluate locations of maximum health risk impact. Discrete receptors were placed over residential receptors in closest proximity to the site and at school sites in the surrounding area.

As previously described, health effects from carcinogenic air toxics are usually described in terms of cancer risk. The SDAPCD recommends a carcinogenic (cancer) risk threshold of 10 in one million. Some TACs increase noncancer health risk due to long-term (chronic) exposures. A hazard index less than one (1.0) means that adverse health effects are not expected. Within this analysis, noncarcinogenic exposures of less than 1.0 are considered less than significant. The exhaust from diesel engines is a complex mixture of gases, vapors, and particles, many of which are known human carcinogens. DPM has established cancer risk factors and relative exposure values for long-term chronic health hazard impacts. No short-term, acute relative exposure values are established and regulated and are therefore not addressed in this assessment.

Dudek evaluated the project's potential cancer and noncancer health impacts using exposure periods appropriate to evaluate long-term emission increases (third trimester of pregnancy to 30 years). Emissions dispersion of DPM was modeled using AERMOD, then cancer risk and noncancer health impacts subsequently using the CARB HARP2 (ADMRT, Version 22118). The health risk results were then compared to SDAPCD thresholds to assess project significance. Principal parameters of this modeling are presented in Table 8.

Table 9. Roadway Health Risk Assessment American Meteorological Society/ U.S. Environmental Protection Agency Regulatory Model Operational Principal Parameters

Parameter	Details
Meteorological Data	The SDAPCD was consulted to obtain the most representative meteorological data set for the project site. The SDAPCD provided meteorological data for the Kearney Villa Road meteorological station, which is located at 6125A Kearney Villa Road, San Diego approximately 4.5 miles north of the project site. The latest three-year data set from the Chula Vista station was for the 2019-2021 years.
Urban versus Rural Option	The rural dispersion option is the modeling default for San Diego County; however, urban dispersion is allowed if the land area meets the criteria as defined in Section 4.4.1 in the OEHHA 2015 Guidance Manual (SDAPCD 2022a). Urban dispersion option was selected due to the developed nature of the surrounding area.
Terrain Characteristics	Digital elevation model files were imported into AERMOD so that complex terrain features were evaluated as appropriate for the site. This accounts for complex terrain within 2 kilometers of the site. The National Elevation Dataset (NED) dataset with resolution of 1 arc-second was used. The AERMAP terrain preprocessor, which can process U.S. Geological Survey (USGS) Digital Elevation Model (DEM) data and data from the NED, is also used to generate the terrain elevations for the receptor locations. The AERMAP program generates an output file that contains the receptor pathway data for AERMOD. In addition, both the default elevated option in AERMOD and the non-default option of flat were run for the terrain to estimate maximum ground-level concentrations.
Source Release Characterizations	Vehicle travel was modeled as line adjacent volume sources. Trucks and non-trucks were modeled as separate line volume sources to account for different plume and release characteristics resulting in a total of eight separate line volume sources. Plume height was assumed to be 6.8 meters for trucks and 2.6 meters for non-trucks (EPA 2021b). A release height was estimated for each source assuming 1/2 of the plume height, which equals 3.4 meters for trucks and 1.3 meters for non-trucks (EPA 2021). The plume width was estimated for each segment based on the width of the traveling lanes plus 6 meters (or approximately 10 feet on each side) to account for vehicle wake (EPA 2021).

Table 9. Roadway Health Risk Assessment American Meteorological Society/ U.S. Environmental Protection Agency Regulatory Model Operational Principal Parameters

Parameter	Details
Receptors	Two uniform Cartesian receptor grids with 20-meter spacing to establish the impact area and evaluate locations of maximum health risk impact. Discrete receptors were placed over residential receptors in closest proximity to the site and at school sites in the surrounding area. Receptors were placed at both ground-level and at elevated heights (11 meters) to simulate multi-level buildings.

Source: See Appendix B.
Note: AERMOD = American Meteorological Society/Environmental Protection Agency Regulatory Model; SDAPCD = San Diego Air Pollution Control District

Cancer risk is defined as the increase in probability (chance) of an individual developing cancer due to exposure to a carcinogenic compound, typically expressed as the increased chances in one million. Maximum Individual Cancer Risk is the estimated probability of a maximally exposed individual potentially contracting cancer as a result of exposure to TACs over a period of 30 years for residential receptor locations. The HRA assumes exposure would start in the third trimester of pregnancy through 30 years for all residential sensitive receptor locations. The exposure pathway for DPM is inhalation only.

2.4 Impact Analysis

2.4.1 Would the project conflict with or obstruct implementation of the applicable air quality plan?

Pre-Cast and Cast-in-Place Construction Methods

As stated in Section 2.2.3, Local Regulations, SDAPCD and SANDAG are responsible for developing and implementing the clean air plans for attainment and maintenance of the NAAQS and CAAQS in the SDAB; specifically, the SIP and RAQS.[7] The federal O_3 attainment plan, which is part of the SIP, was adopted in 2020. The SIP includes a demonstration that current strategies and tactics will attain acceptable air quality in the SDAB based on the NAAQS. The RAQS was initially adopted in 1991 and is updated every 3 years (most recently in 2022). The RAQS outlines SDAPCD's plans and control measures designed to attain the CAAQS for O_3. The SIP and RAQS rely on information from CARB and SANDAG, including mobile and area source emissions, as well as information regarding projected growth in San Diego County and the cities in the County, to project future emissions and then determine from that the strategies necessary for the reduction of emissions through regulatory controls. CARB mobile source emission projections and SANDAG growth projections are based on population, vehicle trends, and land use plans developed by San Diego County and the cities in the County as part of the development of their general plans.

As mentioned above, the SIP and RAQS rely on SANDAG growth projections based on population, vehicle trends, and land use plans developed by the cities and by the County as part of development of their general plans. As such, projects that involve development that is consistent with the growth anticipated by local plans would be

7 For the purpose of this discussion, the relevant federal air quality plan is the O_3 attainment plan (SDAPCD 2020). The RAQS is the applicable plan for purposes of state air quality planning. Both plans reflect growth projections in the SDAB.

consistent with the SIP and RAQS. However, if a project involves development that is greater than that anticipated in the local plan and/or SANDAG's growth projections, that project might be in conflict with the SIP and RAQS, and may contribute to a potentially significant cumulative impact on air quality.

The proposed project would span the San Diego River, connecting Fenton Parkway with Camino Del Rio North in the Mission Valley Community of the City of San Diego. The proposed project is referenced in the Mission Valley Community Plan (adopted by the City in 2019) and is a long-sought infrastructure enhancement in the Mission Valley Community that would connect residents and businesses south of the San Diego River to land uses north of the river off Friars Road, including the SDSU Mission Valley development, which was approved by the Board of Trustees of the California State University (CSU) in 2020 (City of San Diego 2019). The project would involve construction of a vehicular and pedestrian bridge spanning the San Diego River from north to south.

The project does not include a change in zoning or land use designation, and no housing is proposed. Construction of the project would require workforce travel from the surrounding region but would be temporary and would cease once construction is complete. The proposed project would not directly or indirectly promote population growth or increase VMT in the region. Implementation of the project would not result in development or growth beyond that which was contemplated by SANDAG for their regional growth projections used in the SDAPCD air quality management plans. Therefore, the proposed project would not conflict with or obstruct implementation of the applicable air quality plan, and impacts would be less than significant.

Level of Significance Before Mitigation

Impacts would be less than significant.

Mitigation Measures

No mitigation is required.

Level of Significance After Mitigation

Impacts would be less than significant without mitigation.

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

Air pollution is largely a cumulative impact. The nonattainment status of regional pollutants is a result of past and present development, and SDAPCD develops and implements plans for future attainment of the NAAQS and CAAQS. Based on these considerations, project-level thresholds of significance for criteria pollutants are relevant in the determination of whether the project's individual emissions would have a cumulatively significant impact on air quality.

In considering cumulative impacts from the proposed project, the analysis must specifically evaluate a project's contribution to the cumulative increase in pollutants for which the SDAB is designated as nonattainment for the CAAQS and NAAQS. As discussed previously, the SDAB has been designated as a national nonattainment area for O_3, and a California nonattainment area for O_3, PM_{10}, and $PM_{2.5}$. Construction and operation of the project would result in emissions of criteria air pollutants, which may result in a cumulatively considerable increase in emissions of criteria air pollutants for which the SDAB is designated as nonattainment under the NAAQS or CAAQS. The following discussion evaluates potential short-term construction and long-term operational impacts that would result from implementation of the proposed project.

Construction Emissions

Construction of the proposed project would result in the temporary addition of pollutants to the local airshed caused by on-site sources (i.e., off-road construction equipment, soil disturbance, and VOC off-gassing) and off-site sources (vendor and haul truck trips, and worker vehicle trips). Construction emissions can vary substantially day to day, depending on the level of activity, the specific type of operation, and for dust, the prevailing weather conditions.

Criteria air pollutant emissions associated with construction activities were quantified using CalEEMod. Default values provided by the program were used where detailed proposed project information was not available. A detailed depiction of the construction schedule—including information regarding phasing, equipment used during each phase, haul trucks, vendor trucks, and worker vehicles—is included in Section 2.3.2., Approach and Methodology, above.

Development of the proposed project would generate air pollutant emissions from entrained dust, off-road equipment, vehicle emissions, asphalt pavement application, and architectural coatings. As described previously, fugitive dust would be limited through compliance with SDAPCD Rule 55, which requires the restriction of visible emissions of fugitive dust beyond the property line (SDAPCD 2009).

Pre-Cast Construction Method Emissions

Table 10 shows the estimated maximum unmitigated daily construction emissions associated with the conceptual construction phases of the project using the Pre-Cast method of construction. Complete details of the emissions calculations are provided in Appendix A, Air Quality and Greenhouse Gas Emissions CalEEMod Output Files.

Table 10. Pre-Cast Construction Method Estimated Maximum Daily Construction Criteria Air Pollutant Emissions

Construction Period	VOC	NO_x	CO	SO_x	PM_{10}	$PM_{2.5}$
	Pounds Per Day					
Summer 2025*	3.24	33.21	30.65	0.09	3.34	1.57
Winter 2025*	10.67	124.46	101.95	0.27	20.13	8.81
Maximum Daily Emissions**	**10.67**	**124.46**	**101.95**	**0.27**	**20.13**	**8.81**
SDAPCD Threshold	75	250	550	250	100	55
Threshold Exceeded?	**No**	**No**	**No**	**No**	**No**	**No**

Source: Appendix A.
Notes: VOC = volatile organic compound; NO_x = oxides of nitrogen; CO = carbon monoxide; SO_x = sulfur oxides; PM_{10} = coarse particulate matter; $PM_{2.5}$ = fine particulate matter; SDAPCD= San Diego Air Pollution Control District.
* CalEEMod modeling presented in Appendix A for the Pre-Cast Scenario was prepared using an earlier construction date of 2024, however, work would occur in 2025 or later. The use of an earlier construction year provides a "worst-case scenario" estimate of emissions because equipment and vehicle emission factors for later years would be slightly less due to more stringent standards for in-use off-road equipment and heavy-duty trucks, as well as fleet turnover replacing older equipment and vehicles in later years.
** Emissions shown are unmitigated, however, the project would include the use of Tier 4 equipment pursuant to Mitigation Measure AQ-1, which is required to address impacts to sensitive receptors, which would further reduce emissions.

As shown in Table 10, maximum daily construction emissions from the Pre-Cast construction method would not exceed the SDAPCD significance thresholds for any criteria air pollutant during project construction, and short-term construction air quality impacts would be **less than significant.**

Cast-in-Place Construction Method Emissions

Table 11 shows the estimated maximum unmitigated daily construction emissions associated with the conceptual construction phases of the project using the Cast-in-Place construction method. Complete details of the emissions calculations are provided in Appendix A, Air Quality and Greenhouse Gas Emissions CalEEMod Output Files.

Table 11. Cast-in-Place Construction Method Estimated Maximum Daily Construction Criteria Air Pollutant Emissions

Construction Period	VOC	NO_x	CO	SO_x	PM_{10}	$PM_{2.5}$
	Pounds Per Day					
Summer 2025	3.67	43.33	36.84	0.16	6.47	2.43
Winter 2025	6.87	74.01	69.56	0.23	14.11	6.88
Winter 2026	5.91	63.80	60.91	0.20	9.92	3.44
Maximum Daily Emissions*	**6.87**	**74.01**	**69.56**	**0.23**	**14.11**	**6.88**
SDAPCD Threshold	75	250	550	250	100	55
Threshold Exceeded?	**No**	**No**	**No**	**No**	**No**	**No**

Source: Appendix A.
Notes: VOC = volatile organic compound; NO_x = oxides of nitrogen; CO = carbon monoxide; SO_x = sulfur oxides; PM_{10} = coarse particulate matter; $PM_{2.5}$ = fine particulate matter; SDAPCD= San Diego Air Pollution Control District.
* Emissions shown are unmitigated, however, the project would include the use of Tier 4 equipment pursuant to Mitigation Measure AQ-1, which is required to address impacts to sensitive receptors, which would further reduce emissions.

As shown in Table 11, maximum daily construction emissions would not exceed the SDAPCD significance thresholds for any criteria air pollutant during project construction, and short-term construction air quality impacts would be **less than significant.**

Operational Emissions

Pre-Cast and Cast-in-Place Construction Methods

Once project construction is complete, the project would provide a two-lane roadway extension of Fenton Parkway south with a bridge over the San Diego River Park Road to Camino Del Rio North. The roadway extension would include separated bike lanes and sidewalks, providing a new high-water crossing over the San Diego River. Similar to existing conditions, there could be occasional routine maintenance (e.g., re-striping, re-paving, etc.) during operation of the roadway expansion; however, these activities would be minor and result in only a nominal increase of emissions. Additionally, per the transportation study prepared for the proposed project, the project is not expected to increase area VMT because the project provides a more direct route to and from destinations (Fehr & Peers 2023). Because the project would not result in a net increase in transportation related emissions in the region, which is the source of operational air pollutant emissions for the project, long-term operational activities, there would be no significant air quality impacts associated with operational air pollutant emissions.

As discussed above, the SDAB has been designated as a national nonattainment area for O_3, and a California nonattainment area for O_3, PM_{10}, and $PM_{2.5}$. The nonattainment status is the result of cumulative emissions from various sources of air pollutants and their precursors within the SDAB, including motor vehicles, off-road equipment, and commercial and industrial facilities. Construction and operation of the project would generate VOC and NO_x emissions (which are precursors to O_3) and emissions of PM_{10} and $PM_{2.5}$. However, as indicated, project-generated construction emissions and operational emissions would not exceed the emission-based significance thresholds for VOC, NO_x, PM_{10}, or $PM_{2.5}$.

Because the project-generated construction and operational emissions of VOC, NOx, PM_{10}, and $PM_{2.5}$ that would not exceed the SDAPCD thresholds, the project would not result in a cumulatively considerable increase in emissions of nonattainment pollutants. Therefore, the Project's cumulative air quality impact would be **less than significant.**

Health Effects of Criteria Pollutants

Pre-Cast and Cast-in-Place Construction Methods

Project construction and operation would not exceed regional significance thresholds for VOC, NO_x, CO, SO_x, PM_{10}, or $PM_{2.5}$. VOCs and NO_x are precursors to O_3, for which the SDAB is designated as nonattainment with respect to the NAAQS and CAAQS. The health effects associated with O_3 are generally associated with reduced lung function. The contribution of VOC and NO_x to regional ambient O_3 concentrations is the result of complex photochemistry. The increases in O_3 concentrations in the SDAB due to O_3 precursor emissions tend to be found downwind from the source location to allow time for the photochemical reactions to occur. However, the potential for exacerbating excessive O_3 concentrations would also depend on the time of year that the VOC emissions would occur because exceedances of the O_3 CAAQS/NAAQS tend to occur between April and October when solar radiation is highest. The holistic effect of a single project's emissions of O_3 precursors is speculative due to the lack of quantitative methods to assess this impact. Operation of the project would not exceed the regional significance threshold for NO_x; therefore, implementation of the project would contribute minimally to regional O_3 concentrations and the associated health effects.

Operation of the project would not contribute to exceedances of the NAAQS and CAAQS for NO_2. Health effects that result from NO_2 and NO_x include respiratory irritation, which could be experienced by nearby receptors during the periods of heaviest use of off-road construction equipment. However, project construction would be relatively short term, and off-road construction equipment would be operating at various portions of the site and would not be concentrated in one portion of the site at any one time. In addition, existing NO_2 concentrations in the area are well below the NAAQS and CAAQS standards. Because project generated NO_x emissions would not exceed the regional significance threshold, the project would not result in potential health effects associated with NO_2 and NO_x.

CO tends to be a localized impact associated with congested intersections. The associated potential for CO hotspots is discussed in Section 2.4.3 and are determined to be a less-than-significant impact. Furthermore, the existing CO concentrations in the area are well below the NAAQS and CAAQS standards. Thus, the project's CO emissions would not contribute to significant health effects associated with this pollutant.

Construction and operation of the project would also not exceed regional thresholds for PM_{10} or $PM_{2.5}$ and would not contribute to exceedances of the NAAQS and CAAQS for particulate matter or would obstruct the SDAB from coming into attainment for these pollutants. Additionally, the project would implement dust control strategies and be required to comply with SDAPCD Rule 55, Fugitive Dust, which limits the amount of fugitive dust generated during construction (SDAPCD 2009). Due to the minimal contribution of particulate matter during construction and operation, the Project is not anticipated to result in health effects associated with PM_{10} or $PM_{2.5}$.

In summary, because implementation of the project would not result in exceedances of the SDAPCD regional significance thresholds during construction and operation, the potential health effects associated with criteria air pollutants are considered **less than significant.** Furthermore, there are numerous scientific and technological complexities associated with correlating criteria air pollutant emissions from an individual project to specific health effects or potential additional nonattainment days, and there are currently no modeling tools that could provide reliable and meaningful additional information regarding health effects from criteria air pollutants generated by individual projects within the SDAPCD jurisdiction.

Level of Significance Before Mitigation

Impacts would be less than significant.

Mitigation Measures

No mitigation is required.

Level of Significance After Mitigation

Impacts would be less than significant without mitigation.

2.4.3 Would the project expose sensitive receptors to substantial pollutant concentrations?

Carbon Monoxide Hotspots

Pre-Cast and Cast-in-Place Construction Methods

Mobile-source impacts occur on two basic scales of motion. Regionally, travel associated with a project could add to regional trip generation and increase the VMT within the local airshed and the SDAB. Locally, traffic associated with a project will be added to the City's roadway system. If such traffic occurs during periods of poor atmospheric ventilation, consists of a large number of vehicles "cold-started" and operating at pollution-inefficient speeds, and operates on roadways already crowded with non-project traffic, there is a potential for the formation of microscale CO "hotspots" in the area immediately around points of congested traffic. Because of continued improvement in mobile emissions at a rate faster than the rate of vehicle growth and/or congestion, the potential for CO hotspots in the basin is steadily decreasing.

During construction, the project would generate trips associated with construction worker vehicles and vendor and haul trucks. Title 40 of the California Code of Regulations, Section 93.123(c)(5), Procedures for Determining Localized CO, PM_{10}, and PM_2 Concentrations (hot-spot analysis), states that "CO, PM_{10}, and $PM_{2.5}$ hot-spot analyses are not required to consider construction-related activities, which cause temporary increases in emissions. Each site which is affected by construction-related activities shall be considered separately, using established 'Guideline' methods. Temporary increases are defined as those which occur only during the construction phase and last five years or less at any individual site" (40 CFR 93.123). While project construction would involve on-road vehicle trips from trucks and workers during construction, construction activities would last up to approximately 11 months and therefore would not require a project-level construction hotspot analysis.

As discussed above, high CO concentrations would be associated with severely congested intersections operating at an unacceptable level of service (LOS) (LOS E or worse is unacceptable). Projects contributing to adverse traffic impacts may result in the formation of a CO hotspot. Additional analysis of CO hotspot impacts would be conducted if a project would result in a significant impact or contribute to an adverse traffic impact (i.e., LOS E or worse) at a signalized intersection that would potentially subject sensitive receptors to CO hotspots. According to the project's transportation study, operation of the project would result in a nominal amount of vehicular traffic and would not result in intersections operating at or below LOS E (Fehr & Peers 2023). Therefore, the project would not result in CO hotspot-related impacts. As such, potential project-generated impacts associated with CO hotspots would be **less than significant.**

Toxic Air Contaminants

Pre-Cast and Cast-in-Place Construction Methods

Construction Health Risks

Project impacts may include emissions of pollutants identified by the state and federal government as TACs or HAPs. The greatest potential for TAC emissions during construction would be DPM emissions from heavy equipment operations and heavy-duty trucks, and the associated health impacts to sensitive receptors. The conceptual construction schedule approved for analysis assumes construction of the project would occur over a period of 11 months for the Pre-Cast construction method and 14 months for the Cast-in-Place construction method. The closest sensitive receptors to the project site are multifamily residences immediately adjacent on the northwest boundary of the site[8]. As such, a construction health risk assessment was performed for the project using the methodology discussed in Section 2.3.2.2, Health Risk Assessments, above.

Based on results from the HRA, the maximally exposed individual resident (MEIR) off site would be located at a multifamily residence located northwest of the intersection of Fenton Parkway and River Park Road. Table 12 summarizes the results of the HRA for proposed project construction, and detailed results are provided in Appendix B, Health Risk Assessment Output Files.

Table 12. Construction Activity Health Risk Assessment Results Prior to Mitigation

Impact Parameter	Units	Project Impact	CEQA Threshold	Level of Significance
Offsite – Pre-Cast Construction Method				
Cancer Risk	Per Million	29.15	10	Potentially Significant
HIC	Not Applicable	0.04	1	Less than Significant
Offsite – Cast-in-Place Construction Method				
Cancer Risk	Per Million	29.21	10	Potentially Significant
HIC	Not Applicable	0.03	1	Less than Significant

Source: Appendix B.
Notes: HIC = Chronic Hazard Index.

The results of the HRA demonstrate that the TAC exposure from construction diesel exhaust emissions would result in a cancer risk of 29.15 in a million for the Pre-Cast construction method and 29.21 in a million for the Cast-in-Place construction method. The Pre-Cast construction method would have a Chronic Hazard Index of 0.04 and the Cast-in-Place construction method would have a Chronic Hazard index of 0.03. The chronic hazard index for both

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8 While the project site is surrounded by other land uses, such as offices uses, a library, and retail/commercial properties, these are not considered sensitive uses as they are transient in nature, and DPM health risk is related to long-term exposure.

construction methods would be below the 1.0 significance threshold; however, the both construction methods would exceed the cancer risk threshold of 10 in 1 million and would be potentially significant without mitigation.

Mitigation Measure AQ-1 (MM-AQ-1) would require that all diesel-fueled off-road construction equipment greater than 25 horsepower be zero-emissions or equipped with CARB Tier 4 Final compliant engines (as set forth in Section 2423 of Title 13 of the California Code of Regulations, and Part 89 of Title 40 of the Code of Federal Regulations). An exemption from these requirements may be granted, at the University's discretion, if the contractor documents that the required tier is not reasonably available and corresponding reductions in diesel particulate matter are achieved from other construction equipment to remain below the applicable SDAPCD cancer risk threshold. Table 11 summarizes the results of the HRA for project construction after mitigation.

Table 13. Construction Activity Health Risk Assessment Results With Mitigation

Impact Parameter	Units	Project Impact	CEQA Threshold	Level of Significance
Offsite – Pre-Cast Construction Method				
Cancer Risk	Per Million	7.28	10	Less than Significant
HIC	Not Applicable	0.009	1	Less than Significant
Offsite- Cast-in-Place Construction Method				
Cancer Risk	Per Million	8.32	10	Less than Significant
HIC	Not Applicable	0.008	1	Less than Significant

Source: Appendix B.
Notes: HIC = Chronic Hazard Index.

As shown in Table 13, mitigated project construction emissions would result in a cancer risk of 7.28 in a million at the MEIR for the Pre-Cast construction method and 8.32 in a million for the Cast-in-Place construction method, which are both less than the significance threshold of 10 in 1 million. Mitigated project construction emissions would result in a chronic hazard index of 0.009 for the Pre-Cast construction method and 0.008 for the Cast-in-Place construction method, which are below the 1.0 significance threshold. The project construction health impacts would be **less than significant with mitigation.**

Pre-Cast and Cast-in-Place Construction Methods

Roadway Health Risks

As noted previously, the project would locate a source of TAC in the form of DPM closer to existing receptors by constructing the new bridge. Similar to the construction HRA, the closest sensitive receptors to the project site are multifamily residences immediately adjacent on the northwest boundary of the site. A roadway HRA was performed for the project using the methodology discussed in Section 2.3.2.2, Health Risk Assessments, above. Based on results from the operational HRA, the MEIR would be located at a multifamily residence located northwest of the intersection of Fenton Parkway and River Park Road. Table 14 summarizes the results of the roadway HRA for proposed project, and detailed results are provided in Appendix B, Health Risk Assessment Output Files.

Table 14. Summary of Maximum Roadway Cancer and Chronic Health Risks

Impact Parameter	Units	Project Impact	CEQA Threshold	Level of Significance
Offsite				
Cancer Risk	Per Million	1.02	10	Less than Significant
HIC	Not Applicable	0.0003	1	Less than Significant

Source: Appendix B.
Notes: HIC = Chronic Hazard Index.

The results of the roadway HRA demonstrate that the TAC exposure from roadway vehicle diesel exhaust emissions would result in a cancer risk of 1.02 in a million and a chronic hazard index of 0.0003. The project cancer risk would not exceed the cancer risk threshold of 10 in 1 million nor would the chronic hazard index exceed the 1.0 significance threshold; thus, the residential receptors near the new bridge would have cancer and chronic health risk impacts that are less than the SDAPCD health risk thresholds. The impact would be **less than significant.**

Level of Significance Before Mitigation

Impacts would be potentially significant.

Mitigation Measures

Mitigation Measure AQ-1 — Tier 4 Final Construction Equipment. Prior to the commencement of any construction activities, the applicant or its designee shall provide evidence to the San Diego State University (University) that for off-road equipment with engines rated at 25 horsepower or greater, no construction equipment shall be used that is less than Tier 4 Final. An exemption from these requirements may be granted by the University if the applicant documents that equipment with the required tier is not reasonably available and equivalent reductions in PM_{10} exhaust emissions are achieved from other construction equipment. Before an exemption may be considered by the University, the applicant shall be required to demonstrate that three construction fleet owners/operators in the San Diego Region were contacted and that those owners/operators confirmed Tier 4 equipment could not be located within the San Diego region. The University shall review the exemption request and provide a determination within 10 business days from receipt of the request.

Level of Significance After Mitigation

Impacts would be less than significant with mitigation.

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

Pre-Cast and Cast-in-Place Construction Methods

The occurrence and severity of potential odor impacts depends on numerous factors. The nature, frequency, and intensity of the source; the wind speeds and direction; and the sensitivity of receiving location each contribute to the intensity of the impact. Although offensive odors seldom cause physical harm, they can be annoying and cause distress among the public and generate citizen complaints.

Odors potentially would be generated from vehicles and equipment exhaust emissions during construction of the project. Potential odors produced during construction would be attributable to concentrations of unburned hydrocarbons from tailpipes of construction equipment. Such odors would disperse rapidly from the project site and generally occur at magnitudes that would not affect substantial numbers of people. Therefore, impacts associated with odors during construction would be **less than significant.**

Land uses and industrial operations associated with odor complaints include agricultural uses, wastewater treatment plants, food-processing plants, chemical plants, composting, refineries, landfills, dairies, and fiberglass molding (SCAQMD 1993). The project would not create any new sources of odor from these types of operations. Therefore, project operations would result in an odor impact that is **less than significant.**

Level of Significance Before Mitigation

Impacts would be less than significant.

Mitigation Measures

No mitigation is required.

Level of Significance After Mitigation

Impacts would be less than significant without mitigation.

3 Greenhouse Gas Emissions

3.1 Environmental Setting

3.1.1 Climate Change Overview

Climate change refers to any significant change in measures of climate, such as temperature, precipitation, or wind patterns, lasting for an extended period (i.e., decades or longer). The Earth's temperature depends on the balance between energy entering and leaving the planet's system. Many factors, both natural and human, can cause changes in Earth's energy balance, including variations in the sun's energy reaching Earth, changes in the reflectivity of Earth's atmosphere and surface, and changes in the greenhouse effect, which affects the amount of heat retained by Earth's atmosphere (EPA 2023b).

The greenhouse effect is the trapping and build-up of heat in the atmosphere (troposphere) near the Earth's surface. The greenhouse effect traps heat in the troposphere through a threefold process as follows: Short-wave radiation emitted by the Sun is absorbed by the Earth, the Earth emits a portion of this energy in the form of long-wave radiation, and GHGs in the upper atmosphere absorb this long-wave radiation and emit it into space and toward the Earth. The greenhouse effect is a natural process that contributes to regulating the Earth's temperature and creates a pleasant, livable environment on the Earth. Human activities that emit additional GHGs to the atmosphere increase the amount of infrared radiation that gets absorbed before escaping into space, thus enhancing the greenhouse effect and causing the Earth's surface temperature to rise.

The scientific record of the Earth's climate shows that the climate system varies naturally over a wide range of time scales and that, in general, climate changes prior to the Industrial Revolution in the 1700s can be explained by natural causes such as changes in solar energy, volcanic eruptions, and natural changes in GHG concentrations. Recent climate changes, in particular the warming observed over the past century, however, cannot be explained by natural causes alone. Rather, it is extremely likely that human activities have been the dominant cause of that warming since the mid-twentieth century and is the most significant driver of observed climate change (IPCC 2013; EPA 2023b). Human influence on the climate system is evident from the increasing GHG concentrations in the atmosphere, positive radiative forcing, observed warming, and improved understanding of the climate system (IPCC 2013). The atmospheric concentrations of GHGs have increased to levels unprecedented in the last 800,000 years, primarily from fossil fuel emissions and secondarily from emissions associated with land use changes (IPCC 2013). Continued emissions of GHGs will cause further warming and changes in all components of the climate system, which is discussed further in Section 3.1.5, Potential Effects of Climate Change.

3.1.2 Greenhouse Gases

A GHG is any gas that absorbs infrared radiation in the atmosphere; in other words, GHGs trap heat in the atmosphere. As defined in California Health and Safety Code, Section 38505(g), for purposes of administering many of the State's primary GHG emissions reduction programs, GHGs include carbon dioxide (CO_2), methane (CH_4), nitrous oxide (N_2O), hydrofluorocarbons (HFCs), perfluorocarbons (PFCs), sulfur hexafluoride (SF_6), and nitrogen trifluoride (NF_3). (See also CEQA Guidelines, Section 15364.5.) Some GHGs, such as CO_2, CH_4, and N_2O, occur naturally and are emitted into the atmosphere through natural processes and human activities. Of these gases, CO_2 and CH_4 are emitted in the greatest quantities from human activities. Manufactured GHGs, which have a much greater heat-absorption potential than CO_2, include fluorinated gases, such as HFCs, PFCs, and SF_6, which are associated with certain industrial products and processes. The following paragraphs provide a summary of the most common GHGs and their sources.[9]

Carbon Dioxide. CO_2 is a naturally occurring gas and a by-product of human activities and is the principal anthropogenic GHG that affects the Earth's radiative balance. Natural sources of CO_2 include respiration of bacteria, plants, animals, and fungus; evaporation from oceans; volcanic out-gassing; and decomposition of dead organic matter. Human activities that generate CO_2 are from the combustion of fuels such as coal, oil, natural gas, and wood and changes in land use.

Methane. CH_4 is produced through both natural and human activities. CH_4 is a flammable gas and is the main component of natural gas. Methane is produced through anaerobic (without oxygen) decomposition of waste in landfills, flooded rice fields, animal digestion, decomposition of animal wastes, production and distribution of natural gas and petroleum, coal production, and incomplete fossil fuel combustion.

Nitrous Oxide. N_2O is produced through natural and human activities, mainly through agricultural activities and natural biological processes, although fuel burning and other processes also create N_2O. Sources of N_2O include soil cultivation practices (microbial processes in soil and water), especially the use of commercial and organic fertilizers, manure management, industrial processes (such as in nitric acid production, nylon production, and fossil-fuel-fired power plants), vehicle emissions, and using N_2O as a propellant (e.g., rockets, racecars, and aerosol sprays).

Fluorinated Gases. Fluorinated gases (also referred to as F-gases) are synthetic powerful GHGs emitted from many industrial processes. Fluorinated gases are commonly used as substitutes for stratospheric ozone-depleting substances (e.g., chlorofluorocarbons [CFCs], hydrochlorofluorocarbons [HCFCs], and halons). The most prevalent fluorinated gases include the following:

- **Hydrofluorocarbons:** HFCs are compounds containing only hydrogen, fluorine, and carbon atoms. HFCs are synthetic chemicals used as alternatives to ozone-depleting substances in serving many industrial, commercial, and personal needs. HFCs are emitted as by-products of industrial processes and are used in manufacturing.
- **Perfluorocarbons:** PFCs are a group of human-made chemicals composed of carbon and fluorine only. These chemicals were introduced as alternatives, with HFCs, to the ozone depleting substances. The two main sources of PFCs are primary aluminum production and semiconductor manufacturing. Since PFCs have stable molecular structures and do not break down through the chemical processes in the lower atmosphere, these chemicals have long lifetimes, ranging between 10,000 and 50,000 years.
- **Sulfur Hexafluoride:** SF_6 is a colorless gas soluble in alcohol and ether and slightly soluble in water. SF_6 is used for insulation in electric power transmission and distribution equipment, semiconductor manufacturing, the magnesium industry, and as a tracer gas for leak detection.
- **Nitrogen Trifluoride:** NF_3 is used in the manufacture of a variety of electronics, including semiconductors and flat panel displays.

9 The descriptions of GHGs are summarized from the Intergovernmental Panel on Climate Change (IPCC) Second Assessment Report (1995), IPCC Fourth Assessment Report (2007), CARB's "Glossary of Terms Used in GHG Inventories" (2018), and EPA's "Glossary of Climate Change Terms" (2016d).

Chlorofluorocarbons. CFCs are synthetic chemicals that have been used as cleaning solvents, refrigerants, and aerosol propellants. CFCs are chemically unreactive in the lower atmosphere (troposphere) and the production of CFCs was prohibited in 1987 due to the chemical destruction of stratospheric O_3.

Hydrochlorofluorocarbons. HCFCs are a large group of compounds, whose structure is very close to that of CFCs—containing hydrogen, fluorine, chlorine, and carbon atoms—but including one or more hydrogen atoms. Like HFCs, HCFCs are used in refrigerants and propellants. HCFCs were also used in place of CFCs for some applications; however, their use in general is being phased out.

Black Carbon. Black carbon is a component of fine particulate matter, which has been identified as a leading environmental risk factor for premature death. It is produced from the incomplete combustion of fossil fuels and biomass burning, particularly from older diesel engines and forest fires. Black carbon warms the atmosphere by absorbing solar radiation, influences cloud formation, and darkens the surface of snow and ice, which accelerates heat absorption and melting. Black carbon is a short-lived species that varies spatially, which makes it difficult to quantify the global warming potential (GWP). Diesel particulate matter emissions are a major source of black carbon and are TACs that have been regulated and controlled in California for several decades to protect public health. In relation to declining diesel particulate matter from the CARB's regulations pertaining to diesel engines, diesel fuels, and burning activities, CARB estimates that annual black carbon emissions in California have reduced by 70% between 1990 and 2010, with 95% control expected by 2020 (CARB 2014).

Water Vapor. The primary source of water vapor is evaporation from the ocean, with additional vapor generated by sublimation (change from solid to gas) from ice and snow, evaporation from other water bodies, and transpiration from plant leaves. Water vapor is the most important, abundant, and variable GHG in the atmosphere and maintains a climate necessary for life.

Ozone. Tropospheric O_3, which is created by photochemical reactions involving gases from both natural sources and human activities, acts as a GHG. Stratospheric O_3, which is created by the interaction between solar ultraviolet radiation and molecular oxygen (O_2), plays a decisive role in the stratospheric radiative balance. Depletion of stratospheric O_3, due to chemical reactions that may be enhanced by climate change, results in an increased ground-level flux of ultraviolet-B radiation.

Aerosols. Aerosols are suspensions of particulate matter in a gas emitted into the air through burning biomass (plant material) and fossil fuels. Aerosols can warm the atmosphere by absorbing and emitting heat and can cool the atmosphere by reflecting light.

3.1.3 Global Warming Potential

Gases in the atmosphere can contribute to climate change both directly and indirectly. Direct effects occur when the gas itself absorbs radiation. Indirect radiative forcing occurs when chemical transformations of the substance produce other GHGs, when a gas influences the atmospheric lifetimes of other gases, and/or when a gas affects atmospheric processes that alter the radiative balance of the Earth (e.g., affect cloud formation or albedo) (EPA 2023c). The Intergovernmental Panel on Climate Change (IPCC) developed the GWP concept to compare the ability of each GHG to trap heat in the atmosphere relative to another gas. The GWP of a GHG is defined as the ratio of the time-integrated radiative forcing from the instantaneous release of 1 kilogram of a trace substance relative to that of 1 kilogram of a reference gas (IPCC 2014). The reference gas used is CO_2; therefore, GWP-weighted emissions are measured in metric tons of CO_2 equivalent (MT CO_2e).

The current version of CalEEMod (version 2022.1.1.14) assumes that the GWP for CH_4 is 25 (so emissions of 1 MT of CH_4 are equivalent to emissions of 25 MT of CO_2), and the GWP for N_2O is 298, based on the IPCC Fourth Assessment Report (IPCC 2007). The GWP values identified in CalEEMod were applied to the project.

3.1.4 Sources of Greenhouse Gas Emissions

Per the EPA's Inventory of U.S. Greenhouse Gas Emissions and Sinks: 1990–2021, total U.S. GHG emissions were approximately 6,340.2 million MT CO_2e (MMT CO_2e) in 2021 (EPA 2023d). Total U.S. emissions have decreased by 2.3% from 1990 to 2021, down from a high of 15.8% above 1990 levels in 2007. Emissions increased from 2020 to 2021 by 5.2% (314.3 MMT CO_2e). Net emissions (i.e., including sinks) were 5,586.0 MMT CO_2e in 2021. Overall, net emissions increased 6.4% from 2020 to 2021 and decreased 16.6% from 2005 levels Between 2020 and 2021, the increase in total GHG emissions was driven largely by an increase in CO_2 emissions from fossil fuel combustion due to economic activity rebounding after the height of the COVID-19 pandemic. The CO_2 emissions from fossil fuel combustion increased by 6.8% from 2020 to 2021, including a 11.4% increase in transportation sector emissions and a 7.0% increase in electric power sector emissions. The increase in electric power sector emissions was due in part to an increase in electricity demand of 2.4% since 2020. Overall, there has been a decrease in electric power sector emissions from 1990 through 2021, which reflects the combined impacts of long-term trends in many factors, including population, economic growth, energy markets, technological changes including energy efficiency, and the carbon intensity of energy fuel choices (EPA 2023d).

According to California's 2000–2020 GHG emissions inventory (2022 edition), California emitted approximately 369 MMT CO_2e in 2020, including emissions resulting from out-of-state electrical generation (CARB 2022g). The sources of GHG emissions in California include transportation, industry, electric power production from both in-state and out-of-state sources, residential and commercial activities, agriculture, high-GWP substances, and recycling and waste. Table 15, Greenhouse Gas Emissions Sources in California, presents California GHG emission source categories and their relative contributions to the emissions inventory in 2020.

Table 15. Greenhouse Gas Emissions Sources in California

Source Category	Annual GHG Emissions (MMT CO_2e)[a]	Percent of Total[a]
Transportation	135.9	37%
Industrial	73.5	20%
Electric power	59.4	16%
Commercial and Residential	38.8	10%
Agriculture	31.8	9%
High GWP substances	21.4	6%
Recycling and waste	8.9	2%
Total	**369.2**	**100%**

Source: CARB 2022g.
Notes: GHG = greenhouse gas; MMT CO_2e = million metric tons of carbon dioxide equivalent; GWP = global warming potential.
Emissions reflect the 2020 California GHG inventory by Scoping Plan Category (CARB 2022g).
[a] Percentage of total and annual GHG emissions have been rounded, and total may not sum due to rounding.

3.1.5 Potential Effects of Climate Change

Globally, climate change has the potential to affect numerous environmental resources through uncertain impacts related to future air temperatures and precipitation patterns. The 2014 IPCC Synthesis Report (IPCC

2014) indicated that warming of the climate system is unequivocal, and since the 1950s, many of the observed changes are unprecedented over decades to millennia. Signs that global climate change has occurred include warming of the atmosphere and ocean, diminished amounts of snow and ice, rising sea levels, and ocean acidification (IPCC 2014).

In California, climate change impacts have the potential to affect sea-level rise, agriculture, snowpack and water supply, forestry, wildfire risk, public health, frequency of severe weather events, and electricity demand and supply. The primary effect of global climate change has been a rise in average global tropospheric temperature. Global surface temperature in the first two decades of the twenty-first century (2001-2020) was 0.99 [0.84 to 1.10]°C higher than 1850–1900 (IPCC 2023). Global surface temperature has increased faster since 1970 than in any other 50-year period over at least the last 2,000 years (IPCC 2023). Scientific modeling predicts that continued emissions of GHGs at or above current rates would induce more extreme climate changes during the twenty-first century than were observed during the twentieth century. Human activities, principally through emissions of GHGs, have unequivocally caused global warming, with global surface temperature reaching 1.1°C above 1850–1900 in 2011–2020 (IPCC 2023).

Although climate change is driven by global atmospheric conditions, climate change impacts are felt locally. A scientific consensus confirms that climate change is already affecting California. The Office of Environmental Health Hazard Assessment identified various indicators of climate change in California, which are scientifically based measurements that track trends in various aspects of climate change. Many indicators reveal discernible evidence that climate change is occurring in California and is having significant, measurable impacts in the state. Changes in the state's climate have been observed, including an increase in annual average air temperature, more frequent extreme heat events, more extreme drought, a decline in winter chill, an increase in cooling degree days and a decrease in heating degree days, and an increase in variability of statewide precipitation (OEHHA 2022).

Warming temperatures and changing precipitation patterns have altered California's physical systems—the ocean, lakes, rivers and snowpack—upon which the state depends. Winter snowpack and spring snowmelt runoff from the Sierra Nevada and southern Cascade Mountains provide approximately one-third of the state's annual water supply. Impacts of climate on physical systems have been observed such as high variability of snow-water content (i.e., amount of water stored in snowpack), decrease in spring snowmelt runoff, glacier change (loss in area), rise in sea levels, increase in average lake water temperature and coastal ocean temperature, and a decrease in dissolved oxygen in coastal waters (OEHHA 2022).

Impacts of climate change on biological systems, including humans, wildlife, and vegetation, have also been observed including climate change impacts on terrestrial, marine, and freshwater ecosystems. As with global observations, species responses include those consistent with warming: elevational or latitudinal shifts in range, changes in the timing of key plant and animal life cycle events, and changes in the abundance of species and in community composition. Humans are better able to adapt to a changing climate than plants and animals in natural ecosystems. Nevertheless, climate change poses a threat to public health as warming temperatures and changes in precipitation can affect vector-borne pathogen transmission and disease patterns in California as well as the variability of heat-related deaths and illnesses. In addition, since 1950, the area burned by wildfires each year has been increasing.

The California Natural Resources Agency (CNRA) has released four California Climate Change Assessments (in 2006, 2009, 2012, and 2018), which have addressed the following: acceleration of warming across the state, more intense and frequent heat waves, greater riverine flows, accelerating sea level rise, more intense and frequent drought, more severe and frequent wildfires, more severe storms and extreme weather events, shrinking snowpack and less overall precipitation, and ocean acidification, hypoxia, and warming. To address local and regional governments' need for information to support action in their communities, the Fourth Assessment (CNRA 2018) includes reports for nine regions of the state, including the San Diego region, where the project is located. Key projected climate changes for the San Diego region include the following (CNRA 2018):

- Continued future warming over the San Diego region. Across the region, average maximum temperatures are projected to increase by 5°F to 10°F by the end of the twenty-first century.
- Extreme temperatures are also expected to increase. Heat wave frequency is expected to increase with more intensity and duration.
- Precipitation is expected to remain highly variable, but with shifts in character. There will be wetter winters, drier springs, and more frequent and severe droughts.
- Sea level along San Diego is expected to rise approximately 1 foot by the mid-twenty-first century, and by 3 feet or more by 2100.
- Wildfire risk will continue to increase in the future as the climate warms, with increased risk for large catastrophic wildfires driven by increased Santa Ana wind events.

3.2 Regulatory Setting

3.2.1 Federal Regulations

Massachusetts v. U.S. Environmental Protection Agency

In *Massachusetts v. EPA* (April 2007), the U.S. Supreme Court ruled that CO_2 was a pollutant and directed the EPA administrator to determine whether GHG emissions from new motor vehicles cause or contribute to air pollution that may reasonably be anticipated to endanger public health or welfare, or whether the science is too uncertain to make a reasoned decision. In making these decisions, the EPA administrator is required to follow the language of Section 202(a) of the Clean Air Act. On December 7, 2009, the administrator signed a final rule with two distinct findings regarding GHGs under Section 202(a) of the Clean Air Act:

- The elevated concentrations of GHGs—CO_2, CH_4, N_2O, hydrofluorocarbons, perfluorocarbons, and SF_6—in the atmosphere threaten the public health and welfare of current and future generations. This is referred to as the "endangerment finding."
- The combined emissions of GHGs—CO_2, CH_4, N_2O, and hydrofluorocarbons—from new motor vehicles and new motor vehicle engines contribute to the GHG air pollution that endangers public health and welfare. This is referred to as the "cause or contribute finding."

These two findings were necessary to establish the foundation for regulation of GHGs from new motor vehicles as air pollutants under the Clean Air Act.

Energy Independence and Security Act

The Energy Independence and Security Act of 2007 (Public Law 110-140), among other key measures, would do the following, which would aid in the reduction of national GHG emissions (EPA 2007):

- Increase the supply of alternative fuel sources by setting a mandatory Renewable Fuel Standard requiring fuel producers to use at least 36 billion gallons of biofuel in 2022.

- Set a target of 35 miles per gallon for the combined fleet of cars and light trucks by model year 2020, and direct National Highway Traffic Safety Administration (NHTSA) to establish a fuel economy program for medium- and heavy-duty trucks and create a separate fuel economy standard for work trucks.
- Prescribe or revise standards affecting regional efficiency for heating and cooling products and procedures for new or amended standards, energy conservation, energy-efficiency labeling for consumer electronic products, residential boiler efficiency, electric motor efficiency, and home appliances.

Federal Vehicle Standards

In 2007, in response to the *Massachusetts v. EPA* U.S. Supreme Court ruling discussed above, the Bush Administration issued Executive Order (EO) 13432 directing EPA, the Department of Transportation, and the Department of Energy to establish regulations that reduce GHG emissions from motor vehicles, non-road vehicles, and non-road engines by 2008. In 2009, NHTSA issued a final rule regulating fuel efficiency and GHG emissions from cars and light-duty trucks for model year 2011; and, in 2010, the EPA and NHTSA issued a final rule regulating cars and light-duty trucks for model years 2012 through 2016 (75 FR 25324–25728).

In 2010, President Obama issued a memorandum directing the Department of Transportation, Department of Energy, EPA, and NHTSA to establish additional standards regarding fuel efficiency and GHG reduction, clean fuels, and advanced vehicle infrastructure. In response to this directive, EPA and NHTSA proposed stringent, coordinated federal GHG and fuel economy standards for model years 2017 through 2025 light-duty vehicles. The proposed standards projected to achieve 163 grams per mile of CO_2 in model year 2025, on an average industry fleet-wide basis, which is equivalent to 54.5 miles per gallon if this level were achieved solely through fuel efficiency. The final rule was adopted in 2012 for model years 2017 through 2021 (77 FR 62624–63200). On January 12, 2017, the EPA finalized its decision to maintain the current GHG emissions standards for model years 2022–2025 cars and light trucks.

In addition to the regulations applicable to cars and light-duty trucks described above, in 2011, EPA and NHTSA announced fuel economy and GHG standards for medium- and heavy-duty trucks for model years 2014 through 2018. The standards for CO_2 emissions and fuel consumption are tailored to three main vehicle categories: combination tractors, heavy-duty pickup trucks and vans, and vocational vehicles. According to EPA, this regulatory program will reduce GHG emissions and fuel consumption for the affected vehicles by 6% to 23% over the 2010 baselines (76 FR 57106–57513).

In August 2016, EPA and NHTSA announced the adoption of the phase two program related to the fuel economy and GHG standards for medium- and heavy-duty trucks. The phase two program will apply to vehicles with model year 2018 through 2027 for certain trailers, and model years 2021 through 2027 for semi-trucks, large pickup trucks, vans, and all sizes of buses and work trucks. The final standards are expected to lower CO_2 emissions by approximately 1.1 billion MT and reduce oil consumption by up to 2 billion barrels over the lifetime of the vehicles sold under the program (EPA and NHTSA 2016).

On April 2, 2018, EPA, under administrator Scott Pruitt, reconsidered the final determination for light-duty vehicles and withdrew its previous 2017 determination, stating that the current standards may be too stringent and therefore should be revised as appropriate (83 FR 16077–16087).

In August 2018, EPA and NHTSA proposed to amend certain fuel economy and GHG standards for passenger cars and light trucks and establish new standards for model years 2021 through 2026. Compared to maintaining the post-2020 standards then in place, the 2018 proposal would increase U.S. fuel consumption by about half a million barrels per day (2% to 3% of total daily consumption, according to the Energy Information Administration) and would impact the global climate by 3/1000th of 1°C by 2100 (EPA and NHTSA 2018). California and other states have stated their intent to challenge federal actions that would delay or eliminate GHG reduction measures and have committed to cooperating with other countries to implement global climate change initiatives.

In 2019, EPA and NHTSA published the Safer Affordable Fuel-Efficient Vehicles Rule Part One: One National Program (SAFE-1) (84 FR 51310), which revoked California's authority to set its own GHG emissions standards and set zero-emission vehicle (ZEV) mandates in California. However, in March 2022, EPA reinstated California's authority under the Clean Air Act to implement its own GHG emission standards and ZEV sales mandate. In March 2020, Part Two was issued, which set CO_2 emissions standards and Corporate Average Fuel Economy standards for passenger vehicles and light-duty trucks for model years 2021 through 2026.

In response to EO 13990, on December 21, 2021, NHTSA finalized the Corporate Average Fuel Economy Preemption rulemaking to withdraw its portions of the Part One Rule. The final rule concluded that the Part One Rule overstepped the agency's legal authority and established overly broad prohibitions that did not account for a variety of important state and local interests.

In March 2022, NHTSA established new fuel economy standards that would require an industry-wide fleet average of approximately 49 miles per gallon for passenger cars and light trucks in model year 2026, by increasing fuel efficiency by 8% annually for model years 2024 and 2025, and 10% annually for model year 2026.

The Inflation Reduction Act of 2022

The Inflation Reduction Act was signed into law by President Biden in August 2022. The bill includes specific investment in energy and climate reform and is projected to reduce GHG emissions within the United States by 40% as compared to 2005 levels by 2030. The bill allocates funds to boost renewable energy infrastructure (e.g., solar panels and wind turbines), includes tax credits for the purchase of electric vehicles, and includes measures that will make homes more energy efficient.

The Inflation Reduction Act authorized EPA to implement the Greenhouse Gas Reduction Fund program, a historic, $27 billion investment to mobilize financing and private capital to combat the climate crisis and ensure American economic competitiveness. The Greenhouse Gas Reduction Fund will be designed to achieve the following program objectives: reduce GHG emissions and other air pollutants; deliver the benefits of GHG- and air-pollution-reducing projects to American communities, particularly low-income and disadvantaged communities; and mobilize financing and private capital to stimulate additional deployment of GHG and air pollution reducing projects (EPA 2023e).

3.2.2 State Regulations

The statewide GHG emissions regulatory framework is summarized in this subsection by category: state climate change targets, building energy, renewable energy and energy procurement, mobile sources, water, solid waste, and other state actions. The following text describes EOs, ABs, SBs, and other plans and policies that would directly or indirectly reduce GHG emissions and/or address climate change issues.

3.2.2.1 State Climate Change Targets

The state has taken a number of actions to address climate change. These actions are summarized below, and include EOs, legislation, and CARB plans and requirements.

Executive Order S-3-05

EO S-3-05 (June 2005) identified GHG emissions-reduction targets and laid out responsibilities among the state agencies for implementing the EO and for reporting on progress toward the targets. This EO identified the following targets:

- By 2010, reduce GHG emissions to 2000 levels.
- By 2020, reduce GHG emissions to 1990 levels.
- By 2050, reduce GHG emissions to 80% below 1990 levels.

EO S-3-05 also directed the California Environmental Protection Agency to report biannually on progress made toward meeting the GHG targets and the impacts to California due to global warming, including impacts to water supply, public health, agriculture, the coastline, and forestry.

Assembly Bill 32

In furtherance of the goals identified in EO S-3-05, the Legislature enacted AB 32, the California Global Warming Solutions Act of 2006 (California Health and Safety Code Sections 38500–38599). AB 32 provided initial direction on creating a comprehensive multiyear program to limit California's GHG emissions at 1990 levels by 2020, and initiate the transformations required to achieve the state's long-range climate objectives.

Executive Order B-30-15

EO B-30-15 (April 2015) identified an interim GHG-reduction target in support of targets previously identified under EO S-3-05 and AB 32. EO B-30-15 set an interim target goal of reducing GHG emissions to 40% below 1990 levels by 2030 to keep California on its trajectory toward meeting or exceeding the long-term goal of reducing GHG emissions to 80% below 1990 levels by 2050, as set forth in EO S-3-05. To facilitate achieving this goal, EO B-30-15 called for CARB to update the Climate Change Scoping Plan (Scoping Plan) to express the 2030 target in terms of millions of metric tons (MMT) CO2e. The EO also called for state agencies to continue to develop and implement GHG emission-reduction programs in support of the reduction targets.

Senate Bill 32 and Assembly Bill 197

SB 32 and AB 197 (enacted in 2016) are companion bills. SB 32 codified the 2030 emissions-reduction goal of EO B-30-15 by requiring CARB to ensure that statewide GHG emissions are reduced to 40% below 1990 levels by 2030. AB 197 established the Joint Legislative Committee on Climate Change Policies, consisting of at least three members of the Senate and three members of the Assembly, to provide ongoing oversight over implementation of the state's climate policies. AB 197 also added two members of the Legislature to the Board as nonvoting members; requires CARB to make available and update (at least annually via its website) emissions data for GHGs, criteria air pollutants, and TACs from reporting facilities; and requires CARB to identify specific information for GHG emissions-reduction measures when updating the Scoping Plan.

Executive Order B-55-18

EO B-55-18 (September 2018) identified a policy for the state to achieve carbon neutrality as soon as possible (no later than 2045) and achieve and maintain net negative emissions thereafter. The goal is an addition to the existing statewide targets of reducing the state's GHG emissions. CARB will work with relevant state agencies to ensure that future Scoping Plans identify and recommend measures to achieve the carbon neutrality goal.

Assembly Bill 1279

The Legislature enacted AB 1279, the California Climate Crisis Act, in September 2022. The bill declares the policy of the state to achieve net zero GHG emissions as soon as possible, but no later than 2045, and achieve and maintain net negative GHG emissions thereafter. Additionally, the bill requires that by 2045, statewide anthropogenic GHG emissions be reduced to at least 85% below 1990 levels.

Although AB 1279 establishes an overall policy to achieve net zero GHG emissions as soon as possible, but no later than 2045, recognizing the need to implement carbon dioxide removal and carbon capture, utilization and storage technologies, the Legislature established a specific target of 85% below 1990 levels by 2045 for anthropogenic GHG emissions. Therefore, the net zero target does not directly apply to development projects, but the 2045 target of 85% below 1990 levels represents the reductions required to contribute to accomplishing the state's overall net zero policy.

California Air Resources Board's Climate Change Scoping Plan

One specific requirement of AB 32 is for CARB to prepare a scoping plan for achieving the maximum technologically feasible and cost-effective GHG emission reductions by 2020 (California Health and Safety Code Section 38561[a]), and to update the plan at least once every 5 years. In 2008, CARB approved the first scoping plan: The Climate Change Proposed Scoping Plan: A Framework for Change (Scoping Plan; CARB 2008). The Scoping Plan included a mix of recommended strategies that combined direct regulations, market-based approaches, voluntary measures, policies, and other emission-reduction programs calculated to meet the 2020 statewide GHG emission limit and initiate the transformations needed to achieve the state's long-range climate objectives.

In 2014, CARB approved the first update to the Scoping Plan. The First Update to the Climate Change Scoping Plan: Building on the Framework (First Update) defined the state's GHG emission reduction priorities for the next 5 years and laid the groundwork to start the transition to the post-2020 goals set forth in EO S-3-05 and EO B-16-2012 (CARB 2014). The First Update concluded that California was on track to meet the 2020 target but recommended that a 2030 mid-term GHG reduction target be established to ensure a continuum of action to reduce emissions. The First Update recommended a mix of technologies in key economic sectors to reduce emissions through 2050, including energy demand reduction through efficiency and activity changes; large-scale electrification of on-road vehicles, buildings, and industrial machinery; decarbonizing electricity and fuel supplies; and the rapid market penetration of efficient and clean energy technologies.

In December 2017, CARB released the 2017 Climate Change Scoping Plan Update (Second Update) for public review and comment (CARB 2017a). The Second Update builds on the successful framework established in the initial Scoping Plan and First Update, while identifying new technologically feasible and cost-effective strategies that will serve as the framework to achieve the 2030 GHG target and define the state's climate change priorities to 2030 and beyond. The strategies' known commitments include implementing renewable energy and energy efficiency (including the mandates of SB 350), increased stringency of the Low Carbon Fuel Standard, measures identified in the Mobile Source and Freight Strategies, measures identified in the proposed Short-Lived Climate Pollutant (SLCP) Plan, and increased stringency of SB 375 targets. To fill the gap in additional reductions needed to achieve the 2030 target, the Second Update recommends continuing the Cap-and-Trade Program and a measure to reduce GHGs from refineries by 20%. The Second Update was approved by CARB's Governing Board on December 14, 2017.

CARB adopted the 2022 Scoping Plan Update in December 2022. The 2022 Scoping Plan outlines the state's plan to reach carbon neutrality by 2045 or earlier, while also assessing the progress the state is making toward achieving GHG reduction goals by 2030. Per the Legislative Analyst's Office, the 2022 Scoping Plan identifies a more aggressive 2030 GHG goal. As it relates to the 2030 goal, perhaps the most significant change in the 2022 plan (as compared to previous Scoping Plans) is that it identifies a new GHG target of 48% below the 1990 level, compared to the current statutory goal of 40% below. Current law requires the state to reduce GHG emissions by at least 40% below the 1990 level by 2030 but does not specify an alternative goal. According to CARB, a focus on the lower target is needed to put the state on a path to meeting the newly established 2045 goal, consistent with the overall path to 2045 carbon neutrality. The carbon neutrality goal requires CARB to expand proposed actions from only the reduction of anthropogenic sources of GHG emissions to also include those that capture and store carbon (e.g., through natural and working lands, or mechanical technologies). The carbon reduction programs build on and accelerate those currently in place, including moving to zero-emission transportation; phasing out use of fossil gas use for heating homes and buildings; reducing chemical and refrigerants with high GWP; providing communities with sustainable options for walking, biking, and public transit; displacement of fossil-fuel fired electrical generation through use of renewable energy alternatives (e.g., solar arrays and wind turbines); and scaling up new options such as green hydrogen (CARB 2022h).

The 2022 Scoping Plan Update also emphasizes that there is no realistic path to carbon neutrality without carbon removal and sequestration, and to achieve the state's carbon neutrality goal, carbon reduction programs must be supplemented by strategies to remove and sequester carbon. Strategies for carbon removal and sequestration include carbon capture and storage from anthropogenic point sources, where CO_2 is captured as it leaves a facility's smokestack and is injected into geologic formations or used in industrial materials (e.g., concrete); and carbon dioxide removal from ambient air, through mechanical (e.g., direct air capture with sequestration) or nature-based (e.g., management of natural and working lands) applications.

The 2022 Scoping Plan details "Local Actions" in Appendix D. The Local Actions includes recommendations intended to build momentum for local government actions that align with the state's climate goals, with a focus on local GHG reduction strategies (commonly referred to as climate action planning) and approval of new land use development projects, including through environmental review under CEQA. The recommendations provided in Appendix D are non-binding and should not be interpreted as a directive to local governments, but rather as evidence-based analytical tools to assist local governments with their role as essential partners in achieving California's climate goals. Appendix D recognizes consistency with a CEQA-qualified GHG reduction plan, such as a climate action plan (CAP), as a preferred option for evaluating potential GHG emission impacts under CEQA. Absent a qualified GHG reduction plan, Appendix D provides recommendations for key attributes that residential and mixed-use projects should achieve that would align with the state's climate goals, including electric vehicle (EV) charging infrastructure, infill location, no loss or conversion of natural and working lands, transit-supportive densities or proximity to transit stops, reducing parking requirements, provision of affordable housing (20% of units), and all-electric appliances with no natural gas connection (CARB 2022h). Projects that achieve all key attributes are considered clearly consistent with the state's climate and housing goals and would have a less-than-significant GHG impact under CEQA. However, projects that do not achieve all attributes are not considered to result in a potentially significant GHG emission impact (CARB 2022h).

California Air Resources Board's Regulations for the Mandatory Reporting of GHG Emissions

CARB's Regulation for the Mandatory Reporting of GHG Emissions (17 CCR 95100–95157) incorporated by reference certain requirements that EPA promulgated in its Final Rule on Mandatory Reporting of GHGs (40 CFR, Section 98). Specifically, Section 95100(c) of the Mandatory Reporting Regulation incorporated those requirements that EPA promulgated in the Federal Register on October 30, 2009; July 12, 2010; September 22, 2010; October 28, 2010; November 30, 2010; December 17, 2010; and April 25, 2011. In general, entities subject to the Mandatory Reporting Regulation that emit over 10,000 MT CO_2e per year are required to report annual GHG emissions through the California Electronic GHG Reporting Tool. Certain sectors, such as refineries and cement plants, are required to report regardless of emission levels. Entities that emit more than the 25,000 MT CO_2e per year threshold are required to have their GHG emissions report verified by a CARB-accredited third party.

Executive Order B-18-12

EO B-18-12 (April 2012) directed state agencies, departments, and other entities under the governor's executive authority to take action to reduce entity-wide GHG emissions by at least 10% by 2015 and 20% by 2020, as measured against a 2010 baseline. EO B-18-12 also identified goals for existing state buildings for reducing grid-based energy purchases and water use.

Senate Bill 605 and Senate Bill 1383

SB 605 (2014) requires CARB to complete a comprehensive strategy to reduce emissions of SLCPs in the state (California Health and Safety Code Section 39730) and SB 1383 (2016) requires CARB to approve and implement that strategy by January 1, 2018 (California Public Resources Code Sections 42652–43654). SB 1383 also establishes specific targets for the reduction of SLCPs (40% below 2013 levels by 2030 for CH_4 and HFCs, and 50% below 2013 levels by 2030 for anthropogenic black carbon) and provides direction for reductions from dairy and livestock operations and landfills. Accordingly, and as mentioned above, CARB adopted its SLCP Reduction Strategy in March 2017 (CARB 2017b). The SLCP Reduction Strategy establishes a framework for the statewide reduction of emissions of black carbon, methane, and fluorinated gases (CARB 2017b).

Assembly Bill 1757

AB 1757 (September 2022) requires the California Natural Resources Agency (CNRA) to determine a range of targets for natural carbon sequestration, and for nature-based climate solutions that reduce GHG emissions for future years 2030, 2038, and 2045. These targets are to be determined by no later than January 1, 2024, and are established to support the state's goals to achieve carbon neutrality and foster climate adaptation and resilience.

3.2.2.2 Building Energy

California Code of Regulations, Title 24, Part 6

The California Building Standards Code was established in 1978 and serves to enhance and regulate California's building standards. While not initially promulgated to reduce GHG emissions, Part 6 of Title 24 specifically established Building Energy Efficiency Standards that are designed to ensure that new and existing buildings in California achieve energy efficiency and preserve outdoor and indoor environmental quality. These energy efficiency standards are reviewed every 3 years by the Building Standards Commission and the California Energy Commission (CEC) and revised if necessary (California Public Resources Code Section 25402[b][1]). The regulations receive input from members of industry, as well as the public, to "reduce the wasteful, uneconomic, inefficient, or unnecessary consumption of energy" (California Public Resources Code Section 25402). These regulations are carefully scrutinized and analyzed for technological and economic feasibility (California Public Resources Code Section 25402[d]) and cost effectiveness (California Public Resources Code Section 25402[b][2–3]). As a result, these standards save energy, increase electricity supply reliability, increase indoor comfort, avoid the need to construct new power plants, and help preserve the environment.

The current Title 24, Part 6 standards, referred to as the 2022 Title 24 Building Energy Efficiency Standards, became effective on January 1, 2023. The 2022 Energy Code focuses on four key areas in newly constructed homes and businesses quality (CEC 2021):

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

California Code of Regulations, Title 24, Part 11

In addition to CEC's efforts, in 2008, the California Building Standards Commission adopted the nation's first green building standards. The California Green Building Standards Code (Part 11 of Title 24), which is commonly referred to as California's Green Building Standards (CALGreen), establishes minimum mandatory standards and voluntary standards pertaining to the planning and design of sustainable site development, energy efficiency (in excess of the California Energy Code requirements), water conservation, material conservation, and interior air quality. The CALGreen standards took effect in January 2011 and instituted mandatory minimum environmental performance standards for all ground-up new construction of commercial, low-rise residential and state-owned buildings and schools and hospitals. The 2022 CALGreen standards are the current applicable standards. For nonresidential projects, some of the key mandatory CALGreen 2022 standards involve requirements related to bicycle parking, designated parking for clean air vehicles, EV charging stations for passenger vehicles, medium-heavy duty and heavy duty trucks , shade trees, water conserving plumbing fixtures and fittings, outdoor potable water use in landscaped areas, recycled water supply systems, construction waste management, excavated soil and land clearing debris, and commissioning (24 CCR, Part 11).

California Code of Regulations, Title 20

Title 20 of the California Code of Regulations requires manufacturers of appliances to meet state and federal standards for energy and water efficiency (20 CCR 1401–1410). CEC certifies an appliance based on a manufacturer's demonstration that the appliance meets the standards. New appliances regulated under Title 20 include refrigerators, refrigerator-freezers, and freezers; room air conditioners and room air-conditioning heat pumps; central air conditioners; spot air conditioners; vented gas space heaters; gas pool heaters; plumbing fittings and plumbing fixtures; fluorescent lamp ballasts; lamps; emergency lighting; traffic signal modules; dishwaters; clothes washers and dryers; cooking products; electric motors; low voltage dry-type distribution transformers; power supplies; televisions and consumer audio and video equipment; and battery charger systems. Title 20 presents protocols for testing each type of appliance covered under the regulations and appliances must meet the standards for energy performance, energy design, water performance, and water design. Title 20 contains three types of standards for appliances: federal and state standards for federally regulated appliances, state standards for federally regulated appliances, and state standards for non-federally regulated appliances.

Senate Bill 1

SB 1 (2006) established a $3 billion rebate program to support the goal of the state to install rooftop solar energy systems with a generation capacity of 3,000 megawatts through 2016. SB 1 added sections to the California Public Resources Code, including Chapter 8.8 (California Solar Initiative), that require building projects applying for ratepayer-funded incentives for photovoltaic systems to meet minimum energy-efficiency levels and performance requirements (California Public Resources Code Sections 25780–25784). Section 25780 established that it is a goal of the state to establish a self-sufficient solar industry. The goals included establishing solar energy systems as a viable mainstream option for both homes and businesses within 10 years of adoption and placing solar energy systems on 50% of new homes within 13 years of adoption. SB 1, also termed “Go Solar California,” was previously titled “Million Solar Roofs.”

Assembly Bill 1470

This bill established the Solar Water Heating and Efficiency Act of 2007 (California Public Utilities Code Sections 2851–2869). The bill makes findings and declarations of the Legislature relating to the promotion of solar water heating systems and other technologies that reduce natural gas demand.

Assembly Bill 1109

Enacted in 2007, AB 1109 required CEC to adopt minimum energy efficiency standards for general-purpose lighting to reduce electricity consumption by 50% for indoor residential lighting and by 25% for indoor commercial lighting (California Public Resources Code Section 25402.5.4).

3.2.2.3 Renewable Energy and Energy Procurement

Senate Bill 1078, Senate Bill 1368, Executive Order S-14-08, Executive Order S-21-09 and Senate Bill X1-2, and Senate Bill 1020

SB 1078 (2002) (California Public Utilities Code Section 399.11 et seq.) established the Renewables Portfolio Standard program, which required an annual increase in renewable generation by the utilities equivalent to at least 1% of sales, with an aggregate goal of 20% by 2017. This goal was subsequently accelerated, requiring utilities to obtain 20% of their power from renewable sources by 2010 (see SB 107, EO S-14-08, and EO S-21-09).

SB 1368 (2006), required CEC to develop and adopt regulations for GHG emission performance standards for the long-term procurement of electricity by local publicly owned utilities (California Public Utilities Code Section 8340–8341). These standards must be consistent with the standards adopted by the California Public Utilities Commission (CPUC).

EO S-14-08 (2008) focused on the contribution of renewable energy sources to meet the electrical needs of California while reducing the GHG emissions from the electrical sector. This EO required that all retail suppliers of electricity in California serve 33% of their load with renewable energy by 2020. Furthermore, the EO directed state agencies to take appropriate actions to facilitate reaching this target. CNRA, in collaboration with CEC and the California Department of Fish and Wildlife, was directed to lead this effort.

EO S-21-09 (2009) directed CARB to adopt a regulation consistent with the goal of EO S-14-08 by July 31, 2010. CARB was further directed to work with CPUC and CEC to ensure that the regulation builds on the Renewables Portfolio Standard program and was applicable to investor-owned utilities, publicly owned utilities, direct access providers, and community choice providers. Under this order, CARB was to give the highest priority to those renewable resources that provide the greatest environmental benefits with the least environmental costs and impacts on public health, and those that can be developed the most quickly in support of reliable, efficient, cost-effective electricity system operations. On September 23, 2010, CARB initially approved regulations to implement a Renewable Electricity Standard; however, this regulation was not finalized because of subsequent legislation (SB X1-2) signed by Governor Brown in April 2011.

SB X1-2 expanded Renewables Portfolio Standard by establishing a renewable energy target of 20% of the total electricity sold to retail customers in California per year by December 31, 2013, and 33% by December 31, 2020, and in subsequent years. Under the bill, a renewable electrical generation facility is one that uses biomass, solar thermal, photovoltaic, wind, geothermal, fuel cells using renewable fuels, small hydroelectric generation (30 megawatts or less), digester gas, municipal solid waste conversion, landfill gas, ocean wave, ocean thermal, or tidal current, and that meets other specified requirements with respect to its location. SB X1-2 applies to all electricity retailers in the state, including publicly owned utilities, investor-owned utilities, electricity service providers, and community choice aggregators. All these entities must meet the renewable energy goals listed above.

SB 350 (2015) further expanded the Renewables Portfolio Standard program by establishing a goal of 50% of the total electricity sold to retail customers in California per year by December 31, 2030. In addition, SB 350 included the goal to double the energy efficiency savings in electricity and natural gas final end uses (such as heating, cooling, lighting, or class of energy uses on which an energy-efficiency program is focused) of retail customers through energy conservation and efficiency. The bill also requires CPUC, in consultation with CEC, to establish efficiency targets for electrical and gas corporations consistent with this goal.

SB 100 (2018) increased the standards set forth in SB 350, establishing that 44% of the total electricity sold to retail customers in California per year by December 31, 2024; 52% by December 31, 2027; and 60% by December 31, 2030, be secured from qualifying renewable energy sources. SB 100 states that it is the policy of the state that eligible renewable energy resources and zero-carbon resources supply 100% of the retail sales of electricity to California. This bill requires that the achievement of 100% zero-carbon electricity resources do not increase the carbon emissions elsewhere in the western grid and that the achievement not be achieved through resource shuffling.

SB 1020 (September 2022) revises the standards from SB 100, requiring the following percentage of retail sales of electricity to California end-use customers to come from eligible renewable energy resources and zero-carbon resources: 90% by December 31, 2035; 95% by December 31, 2040; and 100% by December 31, 2045.

3.2.2.4 Mobile Sources

State Vehicle Standards (Assembly Bill 1493 and Executive Order B-16-12)

AB 1493 (July 2002) was enacted in a response to the transportation sector accounting for more than half of California's CO_2 emissions. AB 1493 required CARB to set GHG emission standards for passenger vehicles, light-duty trucks, and other vehicles determined by CARB to be vehicles that are primarily used for noncommercial personal transportation in the state. The bill required that CARB set GHG emission standards for motor vehicles manufactured in 2009 and all subsequent model years. CARB adopted the standards in September 2004. EO B-16-12 (March 2012) required that state entities under the governor's direction and control support and facilitate the rapid commercialization of ZEVs. It ordered CARB, CEC, CPUC, and other relevant agencies to work with the Plug-In Electric Vehicle Collaborative and the California Fuel Cell Partnership to establish benchmarks to help achieve benchmark goals by 2015, 2020, and 2025. On a statewide basis, EO B-16-12 identified a target reduction of GHG emissions from the transportation sector equaling 80% less than 1990 levels by 2050. This directive did not apply to vehicles that have special performance requirements necessary for the protection of the public safety and welfare. As explained under the "Federal Vehicle Standards" description in Section 3.2.1, Federal Regulations, EPA and NHTSA approved the SAFE Vehicles Rule Part One and Two, which revoked California's authority to set its own GHG emissions standards and set ZEV mandates in California.

As also explained in Section 3.2.1, in March 2022, EPA reinstated California's authority under the Clean Air Act to implement its own GHG emission standards and ZEV sales mandate. EPA's action concludes its reconsideration of the 2019 SAFE-1 rule by finding that the actions taken under the previous administration as a part of SAFE-1 were decided in error and are now entirely rescinded.

Heavy-Duty Diesel

CARB adopted the final Heavy-Duty Truck and Bus Regulation on December 31, 2014, to reduce DPM, a major source of black carbon, and NO_x emissions from heavy-duty diesel vehicles (13 CCR, Part 2025). The rule requires that DPM filters be applied to newer heavier trucks and buses by January 1, 2012, with older vehicles required to comply by January 1, 2015. The rule will require nearly all diesel trucks and buses to be compliant with the 2010 model year engine requirement by January 1, 2023. CARB also adopted an ACTM to limit idling of diesel-fueled commercial vehicles on December 12, 2013. This rule requires diesel-fueled vehicles with gross vehicle weights greater than 10,000 pounds to idle no more than 5 minutes at any location (13 CCR, Part 2485).

Executive Order S-1-07

EO S-1-07 (January 2007, implementing regulation adopted in April 2009) sets a declining Low Carbon Fuel Standard for GHG emissions measured in CO_2e grams per unit of fuel energy sold in California. The Low Carbon Fuel Standard requires reduction in the carbon intensity of California vehicle fuels (e.g., diesel and gasoline) by at least 20% by 2030 as compared to the 2010 baseline. The regulation also include crediting opportunities to promote ZEV adoption, alternative jet fuel, carbon capture and sequestration and advanced technologies to achieve further decarbonization from the transportation sector (CARB 2023c).

Senate Bill 375

SB 375 (California Government Code Section 65080) addresses GHG emissions associated with the transportation sector through regional transportation and sustainability plans. SB 375 requires CARB to adopt regional GHG-reduction targets for the automobile and light-truck sector for 2020 and 2035, and to update those targets every 8 years. SB 375 requires the state's 18 regional MPOs to prepare an SCS as part of their RTP that will achieve the GHG-reduction targets set by CARB. If an MPO is unable to devise an SCS to achieve the GHG-reduction target, the MPO must prepare an alternative planning strategy demonstrating how the GHG-reduction target would be achieved through alternative development patterns, infrastructure, or additional transportation measures or policies.

An SCS does not (1) regulate the use of land; (2) supersede the land use authority of cities and counties; or (3) require that a city's or county's land use policies and regulations, including those in a general plan, be consistent with it (California Government Code Section 65080[b][2][K]). Nonetheless, SB 375 makes regional and local planning agencies responsible for developing those strategies as part of the federally required metropolitan transportation planning process and the state-mandated housing element process.

Advanced Clean Cars Program and Zero-Emissions Vehicle Program

The Advanced Clean Cars I program (January 2012) is an emissions-control program for model years 2015 through 2025 (CARB 2012). The program combines the control of smog- and soot-causing pollutants and GHG emissions into a single coordinated package of regulations: the low-emission vehicle regulation for criteria air pollutant and GHG emissions and a technology-forcing regulation for ZEVs that contributes to both types of emission reductions (CARB 2022i). The package includes elements to reduce smog-forming pollution, reduce GHG emissions, promote clean cars, and provide the fuels for clean cars. To improve air quality, CARB has implemented new emission standards to reduce smog-forming emissions beginning with 2015 model year vehicles. It is estimated that in 2025 cars will emit 75% less smog-forming pollution than the average new car sold in 2015. The ZEV program will act as the focused technology of the Advanced Clean Cars I program by requiring manufacturers to produce increasing numbers of ZEVs and plug-in hybrid EVs in the 2018 to 2025 model years.

The Advanced Clean Cars II program, which was adopted in August 2022, established the next set of low-emission vehicle and ZEV requirements for model years after 2025 to contribute to meeting federal ambient air quality ozone standards and California's carbon neutrality standards (CARB. 2022). The main objectives of Advanced Clean Cars II are as follows:

- Maximize criteria and GHG emission reductions through increased stringency and real-world reductions.
- Accelerate the transition to ZEVs through both increased stringency of requirements and associated actions to support wide-scale adoption and use.

The Advanced Clean Cars II rulemaking package also considers technological feasibility, environmental impacts, equity, economic impacts, and consumer impacts.

Executive Order N-79-20

EO N-79-20 (September 2020) requires CARB to develop regulations as follows: (1) Passenger vehicle and truck regulations requiring increasing volumes of new ZEVs sold in the state towards the target of 100% of in-state sales by 2035; (2) medium- and heavy-duty vehicle regulations requiring increasing volumes of new zero-emission trucks and buses sold and operated in the state towards the target of 100% of the fleet transitioning to ZEVs by 2045 everywhere feasible and for all drayage trucks to be zero emission by 2035; and (3) strategies, in coordination with other state agencies, the EPA, and local air districts, to achieve 100% zero emissions from off-road vehicles and equipment operations in the state by 2035. EO N-79-20 called for the development of a ZEV Market Development Strategy, which was released February 2021, to be updated every 3 years, that ensures coordination and implementation of the EO and outlines actions to support new and used ZEV markets. In addition, the EO specifies identification of near-term actions, and investment strategies, to improve clean transportation, sustainable freight, and transit options; and calls for development of strategies, recommendations, and actions by July 15, 2021, to manage and expedite the responsible closure and remediation of former oil extraction sites as the state transitions to a carbon-neutral economy.

Advanced Clean Trucks Regulation

The Advanced Clean Trucks Regulation was also approved by CARB in 2020. The purpose of the regulation is to accelerate the market for ZEVs in the medium- and heavy-duty truck sector and to reduce air pollutant emissions generated from on-road mobile sources (CARB 2021). The regulation has two components, (1) a manufacturer sales requirement and (2) a reporting requirement:

- **Zero-emission truck sales:** Manufacturers who certify Class 2b–8 chassis or complete vehicles with combustion engines will be required to sell zero-emission trucks as an increasing percentage of their annual California sales from 2024 to 2035. By 2035, zero-emission truck/chassis sales would need to be 55% of Class 2b–3 truck sales, 75% of Class 4–8 straight truck sales, and 40% of truck tractor sales.
- **Company and fleet reporting:** Large employers, including retailers, manufacturers, brokers, and others, will be required to report information about shipments and shuttle services. Fleet owners with 50 or more trucks will be required to report about their existing fleet operations. This information will help identify future strategies to ensure that fleets purchase available zero-emission trucks and place them in service where suitable to meet their needs.

3.2.2.5 Water

Senate Bill X7-7

SB X7-7, or the Water Conservation Act of 2009, required that all water suppliers increase their water use efficiency with an overall goal of reducing per-capita urban water use by 20% by December 31, 2020. Each urban water supplier was required to develop water use targets to meet this goal.

Executive Order B-29-15

In response to the ongoing drought in California, EO B-29-15 (April 2015) set a goal of achieving a statewide reduction in potable urban water usage of 25% relative to water use in 2013. The term of the EO extended through February 28, 2016, although many of the directives have become permanent water-efficiency standards and requirements. The EO includes specific directives that set strict limits on water usage in the state. In response to EO B-29-15, the California Department of Water Resources has modified and adopted a revised version of the Model Water Efficient Landscape Ordinance that, among other changes, significantly increases the requirements for landscape water use efficiency and broadens its applicability to include new development projects with smaller landscape areas.

Executive Order N-10-21

In response to a state of emergency due to severe drought conditions, EO N-10-21 (July 2021) called on all Californians to voluntarily reduce their water use by 15% from their 2020 levels. Actions suggested in EO N-10-21 include reducing landscape irrigation, running dishwashers and washing machines only when full, finding and fixing leaks, installing water-efficient showerheads, taking shorter showers, using a shut-off nozzle on hoses, and taking cars to commercial car washes that use recycled water.

3.2.2.6 Solid Waste

Assembly Bill 939, Assembly Bill 341, Assembly Bill 1826, and Senate Bill 1383

In 1989, AB 939, known as the Integrated Waste Management Act (California Public Resources Code Section 40000 et seq.), was passed because of the increase in waste stream and the decrease in landfill capacity. The statute established the California Integrated Waste Management Board (replaced in 2010 by the California Department of Resources Recycling and Recovery, or CalRecycle), which oversees a disposal reporting system. AB 939 mandated a reduction of waste being disposed where jurisdictions were required to meet diversion goals of all solid waste through source reduction, recycling, and composting activities of 25% by 1995 and 50% by the year 2000.

AB 341 (2011) amended the California Integrated Waste Management Act of 1989 to include a provision declaring that it is the policy goal of the state that not less than 75% of solid waste generated be source-reduced, recycled, or composted by the year 2020, and annually thereafter. In addition, AB 341 required CalRecycle to develop strategies to achieve the state's policy goal. CalRecycle has conducted multiple workshops and published documents that identify priority strategies that it believes would assist the state in reaching the 75% goal by 2020. CalRecycle data from 2019 indicated that the California achieved a 37% diversion rate but will fall short of the 75% diversion rate. While California is unlikely to meet the 75% recycling goal by 2020 as set out in AB 341, CalRecycle remains committed to achieving this goal. Implementation of new legislation, such as SB 1383 and SB 1335, are important steps in reducing waste and building new markets for recycled materials.

AB 1826 (Chapter 727, Statutes of 2014, effective 2016) requires businesses to recycle their organic waste (i.e., food waste, green waste, landscape and pruning waste, nonhazardous wood waste, and food-soiled paper waste that is mixed in with food waste) depending on the amount of waste they generate per week. This law also requires local jurisdictions across the state to implement an organic waste recycling program to divert organic waste generated by businesses, including multifamily residential dwellings that consist of five or more units. The minimum threshold of organic waste generation by businesses decreases over time, which means an increasingly greater proportion of the commercial sector will be required to comply.

SB 1383 (2016) requires a 50% reduction in organic waste disposal from 2014 levels by 2020 and a 75% reduction by 2025—essentially requiring the diversion of up to 27 million tons of organic waste—to reduce GHG emissions. SB 1383 also requires that not less than 20% of edible food that is currently disposed be recovered for human consumption by 2025.

SB 1335 (2018) aims to ensure food service packaging fits into the state's recycling and composting systems, encourage packaging design improvements to protect public health and wildlife, create more takeback and reuse options at state facilities, and reduce contamination in recycling and composting streams.

3.2.2.7 Other State Actions

Senate Bill 97

SB 97 (2007) directed the Governor's Office of Planning and Research and CNRA to develop guidelines under CEQA for the mitigation of GHG emissions. CNRA adopted the CEQA Guidelines amendments in December 2009, which became effective in March 2010.

Under the amended CEQA Guidelines, a lead agency has the discretion to determine whether to use a quantitative or qualitative analysis or apply performance standards to determine the significance of GHG emissions resulting from a particular project (14 CCR 15064.4[a]). The CEQA Guidelines require a lead agency to consider the extent to which the project complies with regulations or requirements adopted to implement a statewide, regional, or local plan for the reduction or mitigation of GHG emissions (14 CCR 15064.4[b]). The CEQA Guidelines also allow a lead agency to consider feasible means of mitigating the significant effects of GHG emissions, including reductions in emissions through the implementation of project features or off-site measures (14 CCR 15126.4[c]). The adopted amendments do not establish a GHG emission threshold, instead allowing a lead agency to develop, adopt, and apply its own thresholds of significance or those developed by other agencies or experts. CNRA also acknowledged that a lead agency could consider compliance with regulations or requirements implementing AB 32 in determining the significance of a project's GHG emissions (CNRA 2009).

With respect to GHG emissions, CEQA Guidelines Section 15064.4(a), as subsequently amended in 2018, states that lead agencies "shall make a good-faith effort, based to the extent possible on scientific and factual data, to describe, calculate or estimate" GHG emissions. The CEQA Guidelines now note that an agency "shall have discretion to determine, in the context of a particular project, whether to: (1) Quantify greenhouse gas emissions resulting from a project; and/or (2) Rely on a qualitative analysis or performance-based standards" (14 CCR 15064.4[a]). Section 15064.4(b) states that the lead agency should consider the following when assessing the significance of impacts from GHG emissions on the environment: (1) the extent to which a project may increase or reduce GHG emissions as compared to the existing environmental setting; (2) whether the project emissions exceed a threshold of significance that the lead agency determines applies to the project; and (3) the extent to which the project complies with regulations or requirements adopted to implement a statewide, regional, or local plan for the reduction or mitigation of GHG emissions (14 CCR 15064.4[b]).

Executive Order S-13-08

EO S-13-08 (November 2008) is intended to hasten California's response to the impacts of global climate change, particularly sea-level rise. Therefore, the EO directs state agencies to take specified actions to assess and plan for such impacts. The final 2009 California Climate Adaptation Strategy report was issued in December 2009, and an update, Safeguarding California: Reducing Climate Risk, followed in July 2014. To assess the state's vulnerability, the report summarizes key climate change impacts to the state for the following areas: agriculture, biodiversity and habitat, emergency management, energy, forestry, ocean and coastal ecosystems and resources, public health, transportation, and water. Issuance of Safeguarding California: Implementation Action Plans followed in March 2016. In January 2018, CNRA released the Safeguarding California Plan: 2018 Update*,* which communicates current and needed actions that state government should take to build climate change resiliency.

3.2.3 California State University Regulations

3.2.3.1 CSU Sustainability Policy

The CSU Board of Trustees adopted its first systemwide Sustainability Policy in May 2014, and most recently revised the Sustainability Policy in May 2022. The Sustainability Policy was developed to integrate sustainability into all facets of the CSU, including academics, facilities operations, built environment, and student life. The Sustainability Policy focuses mainly on energy and GHG emissions, and largely aligns with the State of California's energy and GHG emissions reduction goals (CSU 2022). It aims to reduce the environmental impact of construction and operation of buildings and to integrate sustainability across the curriculum through 11 broad policies, including

University Sustainability; Climate Action Plan; Energy Resilience and Procurement; Energy Conservation, Carbon Reduction, and Utility Management; Water Conservation; Sustainable Procurement; Waste Management; Sustainable Food Service; Sustainable Building & Lands Practices; Physical Plant Management; and Transportation.

3.2.3.2 San Diego State University Climate Action Plan (CAP)

The SDSU CAP was adopted in May 2017 to provide goals and strategies to achieve carbon neutrality and improve sustainability efforts campus-wide. The CAP includes results of a baseline emissions inventory that summarizes GHG emissions from campus operations in 2015 and projected emissions to future years to inform development of appropriate reduction strategies. While the SDSU CAP does include goals and strategies that would result in a reduction of GHG emissions at the proposed project site, the SDSU CAP is not considered qualified per CEQA Guidelines Section 15183.5. Additionally, the CAP was prepared with focus on the SDSU main campus location in the College Area of the City of San Diego. Therefore, inclusion of this plan is for informational purposes only.

3.2.4 Local Regulations

3.2.4.1 San Diego Association of Governments

As discussed in Section 3.2.2.4, Mobile Sources, the passage of SB 375 requires MPOs to prepare an SCS in their RTP. SANDAG serves as the MPO for the San Diego region and is responsible for developing and adopting a SCS that integrates transportation, land use, and housing to meet GHG reduction targets set by CARB. The RTP/SCS is updated every 4 years in collaboration the 18 cities and unincorporated County of San Diego, in addition to regional, state, and federal partners. The most recent, San Diego Forward: The 2021 Regional Plan, was adopted in 2021 and provides guidance on meeting or exceed GHG targets through implementation of five key transportation strategies, including complete corridors, high-speed transit services, mobility hubs, flexible fleets, and a digital platform to tie the transportation system together. Through these strategies, the 2021 Regional Plan is projected to reduce per capita GHG emissions from cars and light-duty trucks to 20% below 2005 levels by 2035, exceeding the regions state-mandated target of 19% (SANDAG 2021).

3.2.4.2 City of San Diego Climate Action Plan

The City Council adopted the 2022 Climate Action Plan (City's CAP) in August 2022. The City's CAP establishes a community-wide goal of net zero GHG emissions by 2035, and identifies the following six key strategies to achieve goals and targets of the plan (City of San Diego 2022c):

1. Decarbonization of the Built Environment
2. Access to Clean and Renewable Energy
3. Mobility and Land Use
4. Circular Economy and Clean Communities
5. Resilient Infrastructure and Health Ecosystems
6. Emerging Climate Actions

In addition to the plan, the City provided a memorandum with guidance on addressing CEQA analysis of GHG emissions for public infrastructure projects (City of San Diego 2022b). Per the memorandum, environmental analysis for public infrastructure projects should include a discussion of overall consistency with each of the strategies of the City's CAP (listed above), specifically identifying project features that would meet goals of the plan.

3.2.4.3 Mission Valley Community Plan

The Mission Valley Community Plan Update is intended to be a blueprint for future development in Mission Valley, where the proposed project is located. The Update was adopted by the City of San Diego's City Council on September 10, 2019 (City of San Diego 2019). It provides Design Guidelines and Policies for Development to implement the City's 2015 CAP, maximize transit ridership, and increase mobility options, among others. The Update references the proposed project, highlighting the roadway expansion as an important development to help support mobility within the eastern portion of the community.

3.3 Significance Criteria and Methodology

3.3.1 Thresholds of Significance

The significance criteria used to evaluate the project's GHG emissions impacts is based on the recommendations provided in Appendix G of the CEQA Guidelines and consistent with the City of San Diego's CEQA Significance Determination Thresholds (City of San Diego 2022a). For the purposes of this GHG emissions analysis, the project would have a significant environmental impact if it would (14 CCR 15000 et seq.):

1. Generate GHG emissions, either directly or indirectly, that may have a significant impact on the environment?
2. Conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of GHGs?[10]

CEQA Guidelines

Global climate change is a cumulative impact; a project participates in this potential impact through its incremental contribution combined with the cumulative increase of all other sources of GHGs. There are currently no established thresholds for assessing whether the GHG emissions of a project, such as the proposed project, would be considered a cumulatively considerable contribution to global climate change; however, all reasonable efforts should be made to minimize a project's contribution to global climate change. In addition, while GHG impacts are recognized exclusively as cumulative impacts (CAPCOA 2008), GHG emissions impacts must also be evaluated on a project-level under CEQA.

With respect to GHG emissions, CEQA Guidelines Section 15064.4(a) states that lead agencies "shall make a good-faith effort, based to the extent possible on scientific and factual data, to describe, calculate or estimate" GHG emissions resulting from a project. The CEQA Guidelines note that an agency has the discretion to either quantify a project's GHG emissions or rely on a "qualitative analysis or performance-based standards" (14 CCR 15064.4[a]). A lead agency may use a "model or methodology" to estimate greenhouse gas emissions and has the discretion to select the model or methodology it considers "most appropriate to enable decision makers to intelligently take into account the project's incremental contribution to climate change" (14 CCR 15064.4[c]). The CEQA Guidelines provide that the lead agency should consider the following when determining the significance of impacts from GHG emissions on the environment (14 CCR 15064.4[b]):

[10] The CSU acknowledges that the time of preparation of this Draft Air Quality and Greenhouse Gas Emissions Technical Report, the City's 2022 CAP is the subject of litigation, so any reference to the City's CAP and analysis of the project's potential conflict with the City's CAP is for informational purposes only.

The extent a project may increase or reduce GHG emissions as compared to the existing environmental setting.

1. Whether the project emissions exceed a threshold of significance that the lead agency determines applies to the project.
2. The extent to which the project complies with regulations or requirements adopted to implement a statewide, regional, or local plan for the reduction or mitigation of GHG emissions.

In addition, the CEQA Guidelines specify that "[w]hen adopting or using thresholds of significance, a lead agency may consider thresholds of significance previously adopted or recommended by other public agencies, or recommended by experts, provided the decision of the lead agency to adopt such thresholds is supported by substantial evidence" (14 CCR 15064.7[c]).

The extent to which a project increases or decreases GHG emissions in the existing environmental setting should be estimated in accordance with Section 15064.4, Determining the Significance of Impacts from Greenhouse Gas Emissions, of the CEQA Guidelines. The CEQA Guidelines indicate that when calculating GHG emissions resulting from a project, lead agencies shall make a good-faith effort based on scientific and factual data (Section 15064.4 (a)), and lead agencies have discretion to select the model or methodology deemed most appropriate for enabling decision makers to intelligently assess the project's incremental contribution to climate change (Section 15064.4 (c)).

The CEQA Guidelines do not indicate an amount of GHG emissions that constitutes a significant impact on the environment. Instead, they authorize the lead agency to consider thresholds of significance previously adopted or recommended by other public agencies or recommended by experts, provided the decision of the lead agency to adopt such thresholds is supported by substantial evidence (State CEQA Guidelines Sections 15064.4(a) and 15064.7(c)).

Governor's Office of Planning and Research Guidance

The Governor's Office of Planning and Research technical advisory titled, CEQA and Climate Change: Addressing Climate Change through California Environmental Quality Act (CEQA) Review, states that "public agencies are encouraged but not required to adopt thresholds of significance for environmental impacts. Even in the absence of clearly defined thresholds for GHG emissions, the law requires that such emissions from CEQA projects must be disclosed and mitigated to the extent feasible whenever the lead agency determines that the project contributes to a significant, cumulative climate change impact" (OPR 2018). Furthermore, the advisory document indicates that "in the absence of regulatory standards for GHG emissions or other scientific data to clearly define what constitutes a 'significant impact,' individual lead agencies may undertake a project-by-project analysis, consistent with available guidance and current CEQA practice" (OPR 2008).

Approach to Determining Significance

Given that neither the CSU, nor CARB, nor SDAPCD have established a numerical threshold of significance for GHG emissions for the project region, the approach for evaluating the project's impacts related to GHG emissions relies on consistency with applicable plans, policies, or regulations adopted for the purpose of reducing the emissions of GHGs. The consistency evaluation is the sole basis for determining the significance of the project's GHG-related impacts on the environment.

Nevertheless, and in accordance with Section 15064.4 of the CEQA Guidelines, GHG emissions resulting from implementation of the project were quantitatively estimated. The potential impacts from project-related GHG emissions were assessed based on the total increase above the existing environmental setting, which is currently undeveloped. The GHG emissions associated with implementation of the project were estimated using industry standard and accepted software tools, techniques, and emissions factors, as described below under Section 3.3.1. Estimation of emissions is for informational purposes only, for comparison with existing environmental conditions. The significance of the project's GHG impacts is based on the project's compliance with statewide GHG reduction regulations and requirements. Guidance on reduction strategies for GHG emissions has been provided at the state level through the CARB Scoping Plans, and at the local level through the SANDAG RTP/SCS, the City's CAP, CSU's Sustainability Policy, and the SDSU CAP.

If the proposed project is consistent with or exceeds the actions outlined in the applicable state plans and local plans, the project could appropriately rely on their use as showing compliance with performance-based standards adopted to fulfill the statewide goal for reducing GHG emissions. The project's compliance with regulatory programs adopted by CARB, and other state and local agencies is therefore used to evaluate the significance of the project's GHG emissions.

3.3.2 Approach and Methodology

3.3.2.1 Construction

Consistent with the air quality approach described in Section 2.3.2, CalEEMod 2022 was used to estimate potential project-generated GHG emissions during construction for both Pre-Cast and Cast-in-Place construction methods. Construction of the project would result in GHG emissions primarily associated with use of off-road construction equipment, on-road hauling and vendor (material delivery) trucks, and worker vehicles. All details for construction criteria air pollutants discussed in Section 2.3.2, are also applicable for the estimation of construction-related GHG emissions. As such, please refer to Section 2.3.2 for a discussion of construction emissions calculation methodology and assumptions. For additional details see Appendix A, Air Quality and Greenhouse Gas Emissions CalEEMod Output Files.

3.3.2.2 Operation

The proposed project is expected to have only minor increases in GHG emissions during operations related to street lighting and periodic maintenance (e.g., re-striping). As such, operational GHG emissions were not quantitatively estimated.

3.4 Impact Analysis

As discussed in Section 3.3.1, the significance of the project's GHG emission impacts is determined through an evaluation of compliance with regulations and requirements adopted to implement statewide, regional, and local plans for the purpose of reducing GHG emissions. While the GHG emissions increase associated with the project was quantified, the estimate is provided for informational purposes in accordance with Section 15064.4 of the CEQA Guidelines and is not used for determination of significance. As such, the Appendix G thresholds are considered together below, beginning with the evaluation of the project's compliance with applicable plans.

3.4.1 Would the project generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?

Estimated GHG Emissions

As discussed above, project-generated GHG emissions are presented for informational purposes and are not used in determining the significance of potential GHG-related impacts. Construction of the project would result in GHG emissions, which are primarily associated with the use of off-road construction equipment, haul trucks, on-road vendor trucks, and worker vehicles. Given that the project would have minor operational emissions (lighting, periodic re-striping), and would result in a decrease in regional VMT from existing conditions, operational emissions would be nominal and were not quantitatively estimated. Construction and operational GHG emissions related to the proposed project are discussed further below.

Pre-Cast Construction Method

Construction Emissions

CalEEMod 2022 was used to calculate the annual GHG emissions based on the construction assumptions presented in Section 3.3.1 for the Pre-Cast construction method. On-site sources of GHG emissions include off-road equipment and off-site sources including vendor trucks and worker vehicles. Table 16 presents construction emissions for the project using the Pre-Cast construction method in 2025 from on-site and off-site emission sources.

Table 16. Pre-Cast Construction Method Estimated Annual Construction Greenhouse Gas Emissions

Year	CO_2	CH_4	N_2O	R	CO_2e
	Metric Tons per Year				
2025*	1,164.51	0.05	0.08	0.62	1,189.24
				Total	**1,189.24**
				Amortized 30-Year Construction Emissions	*39.64*

Source: See Appendix A for complete results.
Notes: CO_2 = carbon dioxide; CH_4 = methane; N_2O = nitrous oxide; R = refrigerant; CO_2e = carbon dioxide equivalent; <0.01 = reported value less than 0.01. The values shown are the annual emissions reflect CalEEMod "mitigated" output.
Totals may not add due to rounding.
* CalEEMod modeling presented in Appendix A for the Pre-Cast Scenario was prepared using an earlier construction date of 2024, however, work would occur in 2025 or later. The use of an earlier construction year provides a "worst-case scenario" estimate of emissions because equipment and vehicle emission factors for later years would be slightly less due to more stringent standards for in-use off-road equipment and heavy-duty trucks, as well as fleet turnover replacing older equipment and vehicles in later years.

As shown in Table 16, the estimated total GHG emissions during construction of the project using the Pre-Cast method of construction would be approximately 1,189 MT CO_2e over the construction period. Estimated project-generated construction emissions amortized over 30 years[11] would be approximately 40 MT CO_2e per year. As with project-generated construction criteria air pollutant emissions, GHG emissions generated during construction of the

[11] Consistent with industry standard practice and guidance provided in the South Coast Air Quality Management District's GHG guidance (SCAQMD 2008).

project would be short-term in nature, lasting only for the duration of the construction period, and would not represent a long-term source of GHG emissions.

Cast-in-Place Construction Method

Construction Emissions

CalEEMod 2022 was used to calculate the annual GHG emissions based on the construction assumptions presented in Section 3.3.1 for the Cast-in-Place construction method. On-site sources of GHG emissions include off-road equipment and off-site sources including vendor trucks and worker vehicles. Table 17 presents construction emissions for the project in 2025 from on-site and off-site emission sources.

Table 17. Cast-in-Place Construction Method Estimated Annual Construction Greenhouse Gas Emissions

Year	CO_2	CH_4	N_2O	R	CO_2e
	Metric Tons per Year				
2025	1.215.93	0.05	0.09	0.82	1,246.02
2026	218.04	0.01	0.01	0.09	222.75
				Total	**1,468.77**
				Amortized 30-Year Construction Emissions	*48.96*

Source: See Appendix A for complete results.
Notes: CO_2 = carbon dioxide; CH_4 = methane; N_2O = nitrous oxide; R = refrigerant; CO_2e = carbon dioxide equivalent; <0.01 = reported value less than 0.01. The values shown are the annual emissions reflect CalEEMod “mitigated” output.
Totals may not add due to rounding.

As shown in Table 17, the estimated total GHG emissions during construction of the project using the Cast-in-Place construction method would be approximately 1,468.77 MT CO_2e over the construction period. Estimated project-generated construction emissions amortized over 30 years[12] would be approximately 49 MT CO_2e per year. As with project-generated construction criteria air pollutant emissions, GHG emissions generated during construction of the project would be short-term in nature, lasting only for the duration of the construction period, and would not represent a long-term source of GHG emissions.

Operational Emissions

Pre-Cast and Cast-in-Place Construction Methods

Once project construction is complete, the project would provide a two-lane roadway extension of Fenton Parkway south with a bridge over the San Diego River Park Road to Camino Del Rio North. The roadway extension would include separated bike lanes and sidewalks, providing a new high-water crossing over the San Diego River. Similar to existing conditions, there could be occasional routine maintenance (e.g., re-striping, re-paving, etc.) during operation of the roadway expansion; however, these activities would be minor and result in only a nominal increase GHG emissions.

12 Consistent with industry standard practice and guidance provided in the South Coast Air Quality Management District’s GHG guidance (SCAQMD 2008).

Additionally, per the transportation study prepared for the proposed project, the project is expected to result in a decrease in VMT within a three-mile and five-mile radius because the project provides a more direct route to and from destinations (Fehr & Peers 2023). Because the project will result in a reduction in VMT, it will also necessarily result in a reduction in GHG emissions from vehicles. Moreover, as the vehicle fleet is replaced overtime with more fuel-efficient vehicles and ZEVs, GHG emissions tied to the project will be reduced. Finally, through the installation of protected bike lanes and sidewalks, providing easy last mile connections to the MTS Green Line trolley transit stop and regional bike networks, the project will also increase the use of multimodal transit, reducing reliance on vehicles and also reducing GHG emissions in the region.

Level of Significance Before Mitigation

As noted previously, there is no numeric threshold appropriate to evaluate the significance of project-generated GHG emissions. As such, the estimation of GHG emissions increase generated by the project provided above is for informational purposes in accordance with Section 15064.4 of the State CEQA Guidelines. The significance of the projects GHG emission impacts is determined through an evaluation of compliance with regulations and requirements adopted to implement statewide, regional, and local plans for the purpose of reducing GHG emissions, as discussed below under Section 3.4.2. As discussed in Section 3.4.2, impacts would be **less than significant.**

Mitigation Measures

No mitigation is required.

Level of Significance After Mitigation

Impacts would be less than significant.

3.4.2 Would the project conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of GHGs?

Applicable plans for the proposed project include the CSU Sustainability Policy, as most recently revised in May 2022; the 2017 Climate Action Plan for SDSU (SDSU CAP); the City of San Diego's Climate Action Plan (City's CAP), SANDAG's RTP/SCS, and CARB's Scoping Plan. Each of these plans is described below along with an analysis of the proposed project's potential to conflict with the related GHG emission reduction goals.

Pre-Cast and Cast-in-Place Construction Methods

Project Potential to Conflict with the California State University Sustainability Policy

As discussed previously, the CSU Sustainability Policy was developed to integrate sustainability into all facets of the CSU, including academics, facilities operations, built environment, and student life. The Sustainability Policy largely aligns with the state's energy and GHG emissions reduction goals and aims to reduce impacts from construction and operation activities associated with CSU. Actions within the CSU Sustainability Policy address energy resilience and procurement; energy conservation, carbon reduction and utility management; water conservation; sustainable procurement; waste management; sustainable food service; sustainable building and lands practices; physical plant management; and transportation. The proposed project would comply with all relevant requirements of the CSU Sustainability Policy, which include those related to waste management, and transportation.

To reduce emissions from solid waste, CSU seeks to reduce landfill bound waste to 50% of total campus waste by 2030 and divert at least 80% from the landfill by 2040 in pursuit of their zero-waste goal. The proposed project would be consistent with the CSU's solid waste targets as it will minimize waste during construction through compliance with the City's Construction and Demolition (C&D) Debris Diversion Ordinance, which requires diversion of 65% of construction debris. The project would also not conflict with the CSU's future zero waste goals, as long-term operation is not anticipated to result in solid waste production.

To reduce emissions from transportation, the CSU Sustainability Policy encourages and promotes use of alternative transportation and the development of transportation demand management plans to reduce VMT at the CSU campuses. As discussed previously, the proposed project involves a roadway expansion and infrastructure enhancement to connect residents and businesses south of the San Diego River to land uses north of the river off Friars Road, including the SDSU Mission Valley development. The roadway expansion and bridge include separated bike lanes and sidewalks, which will promote alternative travel along the new high-water crossing over the San Diego River. The proposed project is not expected to increase VMT within the region, given that the expansion provides a more direct route to and from destinations. As such, the proposed project would support the CSU's goal of GHG emission reductions from mobile sources and waste. Therefore, the proposed project would not conflict with the CSU Sustainability Policy.

Project Potential to Conflict with the 2017 Climate Action Plan for San Diego State University

Emissions sources in the SDSU CAP's baseline inventory and emissions projections include energy use, solid waste, water use, and student and faculty/staff commute (i.e., mobile source emissions) associated with activity at SDSU's main campus. Overall, emissions from energy use and mobile sources accounted for the majority of GHG emissions in the baseline inventory, and therefore present the greatest opportunity for future GHG emissions reductions. Consistent with the SDSU CAP, the proposed project would include features that support SDSU's goals for reducing emissions from the energy and mobile sectors.

The CAP vision for energy highlights a shift from natural gas-based co-generation toward grid energy and on-site renewables. For solid waste, the CAP aims to encourage recycling and move toward zero-waste in the future. The CAP's vision for water use is to encourage efficient landscaping (e.g., drought-resistant and native species, limited turf, and efficient irrigation systems), and ensure ultra-low flow and high-performance fixtures are used for potable systems. As a public infrastructure improvement, the proposed project will not result in significant energy use, and emissions related to energy would be limited to minimal streetlighting. The project would also not result in long-term increases in solid waste production but would minimize waste during construction through compliance with the City's C&D Debris Diversion Ordinance, which requires diversion of 65% of construction debris. While there are no water use components anticipated with operation of the proposed project, all landscaping/re-planting associated with the proposed project would use drought-resistant and native species.

The SDSU CAP's vision for transportation emissions includes improvement of bicycle and pedestrian amenities and overall reduction in single-occupancy vehicle trips to the campus. As discussed previously, the proposed project involves a roadway expansion and infrastructure enhancement to connect residents and businesses south of the San Diego River to land uses north of the river off Friars Road, including the SDSU Mission Valley development, which was approved by the Board of Trustees of the CSU in 2020 (City of San Diego 2019). The roadway expansion and bridge include separated bike lanes and sidewalks, which will promote alternative travel along the new high-water crossing over the San Diego River. This new bicycle and pedestrian route in an area with limited north–south connectivity is expected to substantially reduce trip lengths for these modes and greatly encourage their use. Additionally, the controlled intersection crossings and designated bicycle facilities through intersections will enhance multimodal safety, in addition to enhancing first-mile/last mile access to the existing Fenton Parkway trolley station. The proposed project is also expected to decrease VMT within the region, given that the expansion provides a more direct route to and from destinations. <u>As such, the proposed project would support the vision of and not conflict with the relevant goals of the SDSU CAP.</u>

Project Potential to Conflict with the City of San Diego's Climate Action Plan

The City's Climate Action Plan is a local regulation and therefore is not binding on CSU, which is a state agency. Nevertheless, because the City will ultimately own and operate the proposed project following its construction, and because the proposed project is located within the territorial limits of the City, an analysis of the proposed project's consistency with the City's CAP is provided for informational purposes. This analysis does not form the basis for concluding whether the project has a significant CEQA impact; it is informational only.

As discussed previously, the City's 2022 CAP included CAP Consistency Regulations (in replacement of their previous checklist) for general land use project-level analyses. For public infrastructure projects, the City prepared a memo (Climate Action Plan Consistency for Plan- and Policy-Level Environmental Documents and Public Infrastructure Projects Memo), which outlines an alternative approach to evaluating project consistency with the CAP that is more appropriate for infrastructure projects (City of San Diego 2022b). Per the City's recommended approach, environmental analysis for public infrastructure projects should include a discussion of overall consistency with each of the City's CAP key strategies, specifically identifying project features that would meet goals of the plan. The six key strategies of the CAP are provided below, with a discussion of the proposed project's consistency.

Strategy 1: Decarbonization of the Built Environment

Strategy 1 of the City's CAP recognizes the large emission reduction potential from reducing the use of energy generated from fossil fuels and the use of natural gas in buildings. The City's CAP has adopted a goal to achieve zero emissions municipal buildings and operations by 2035. Actions to achieve this goal include use of LED streetlights and auto-dimming technology where public safety would not be compromised. Consistent with this strategy, streetlights installed on the new bridge and roadway expansion would use LED lights and incorporate auto-dimming, where appropriate. The proposed project does not involve construction or operation of new or existing buildings and would not conflict with the City's additional strategies to reduce emissions from building energy.

Strategy 2: Access to Clean & Renewable Energy

Strategy 2 of the City's CAP includes a goal of 100% renewable or GHG-free power for the City by 2030. To achieve this goal, the City plans to partner with San Diego Community Power to increase adoption of 100% renewable energy supply and to incentivize local generation of renewable energy resources, increase municipal ZEVs, and expand EV charging to encourage citywide adoption of electric vehicles and bicycles. The proposed project would result in roadway expansion and a vehicular and bicycle/pedestrian bridge providing a new high-water crossing over the San Diego River. The project does not propose any development that would typically support installation of EV charging infrastructure or necessitate renewable energy technologies (e.g., battery storage, solar, microgrids). The proposed project would not conflict with the City's ability to implement and achieve their renewable energy goals and would support alternative transportation in its capacity as a new connection for bicycle and pedestrian travel.

Strategy 3: Mobility & Land Use

The City's CAP Strategy 3 addresses mobile source emissions and land use patterns throughout the City. The strategy promotes bike and pedestrian projects to encourage alternative modes of transit, and actions to reduce traffic and congestion across the City. This new bicycle and pedestrian route in an area with limited north–south connectivity is expected to substantially reduce trip lengths for these modes and greatly encourage their use. Additionally, the controlled intersection crossings and designated bicycle facilities through intersections will enhance multimodal safety, in addition to enhancing first-mile/last-mile access to the existing MTS Green Line trolley stop, which is at the north end of the proposed bridge. The proposed project is consistent with this strategy as it provides new alternative travel over the San Diego River, including separated bike lanes and sidewalks for pedestrians to encourage and facilitate non-vehicle modes of travel.

Strategy 4: Circular Economy & Clean Communities

Strategy 4 of the City's CAP addresses waste and clean communities. To achieve their waste-related goals, the City proposes actions to change the waste stream; reduce municipal waste; encourage food waste prevention and food recovery; update, adopt, and implement the Zero Waste Plan; and capture methane from wastewater treatment facilities. Consistent with this strategy, the proposed project will comply with the City's C&D Debris Diversion Ordinance, diverting 65% of C&D debris generated during proposed project construction. There would be no long-term increase in solid waste production associated with operation of the proposed project, which would therefore not impede achievement of the City's goals.

Strategy 5: Resilient Infrastructure and Healthy Ecosystems

The City's CAP also includes actions related to the natural and built environments to reflect the City's resiliency work to prepare for the impacts of climate change and minimize its negative effects. Per the City's guidance memo for analyzing consistency with the CAP, public infrastructure projects shall describe project features that further the City's resiliency goals through project features that increase tree planting (e.g., replace street trees that are removed, add street trees to the public right-of-way, or offering street trees to adjacent property owners), or features that support climate resiliency such as storm drain maintenance to prepare for greater prevalence of extreme rain events.

Consistent with this strategy, all vegetation removed during construction of the bridge would be replaced at a minimum ratio of 1:1 (see also Biological Resources Technical Report, Dudek 2023). The existing storm drain outlet located at the south terminus of the bridge will be relocated as part of this project to direct water further downstream away from bridge footings. A series of catchment basis and water quality/drainage features will also be located at the north terminus of the bridge. The City of San Diego will continue to provide maintenance of these newly constructed facilities. The provision of an additional high-water crossing over the San Diego River also addresses the storm and flood-related effects of more intense storms associated with climate change and provides climate resilient infrastructure. As such, the proposed project would support the City's goals related to resilient infrastructure and healthy ecosystems.

Strategy 6: Emerging Climate Action

Strategy 6 of the City's CAP addresses emerging actions to reach emission reduction goals. Emerging actions include new policies, technological innovation, partnerships, and research that advances the City's net zero goal. While the proposed project does not explicitly propose emerging climate action strategies, as the vehicle fleet is replaced overtime with more fuel-efficient vehicles and ZEVs, mobile GHG emissions associated with the project will decrease into the future. As such, implementation of the roadway expansion will not conflict with the City's achievement of this strategy.

Project Potential to Conflict with the SANDAG Regional Transportation Plan/Sustainable Communities Strategy

SANDAG's 2021 Regional Plan is a RTP/SCS, which is a regional plan that and therefore is not binding on CSU, which is a state agency. Nevertheless, because the proposed project is located within the study area for the RTP/SCS, an analysis of the proposed project's consistency with the RTP/SCS is provided for informational purposes. This analysis does not form the basis for concluding whether the project has a significant CEQA impact; it is informational only.

The primary objective of the RTP/SCS is to provide guidance for future regional growth (i.e., the location of new residential and non-residential land uses) and transportation patterns throughout the region, as stipulated under SB 375. As discussed previously, the proposed project includes a roadway expansion and infrastructure enhancement to connect residents and businesses south of the San Diego River to land uses north of the river. The proposed project would not promote population growth or increase VMT within the region, given that the expansion provides a more direct route to and from destinations.

Additionally, the proposed project supports the RTP/SCS key strategy related to complete corridors, which aims to provide roadways with dedicated, safe spaces for everyone, including people who walk, bike, drive, and ride transit. Consistent with this strategy, the proposed project includes protected bike lanes and sidewalks, as well as enhancing access to the existing MTS Green Line trolley stop, which is at the north end of the proposed bridge. As such, the project is presumed to have a less-than-significant VMT impact and would support the region and the goals of the RTP/SCS in achieving long-term climate goals through reduction of transportation-related GHG emissions.

Project Potential to Conflict with State Reduction Targets and CARB's 2022 Scoping Plan

The California State Legislature passed the Global Warming Solutions Act of 2006 (AB 32) to provide initial direction to limit California's GHG emissions to 1990 levels by 2020 and initiate the state's long-range climate objectives. Since the passage of AB 32, the state has adopted GHG emissions reduction targets for future years beyond the initial 2020 horizon year. For the proposed project, the relevant GHG emissions reduction targets include those established by SB 32 and AB 1279, which require GHG emissions be reduced to 40% below 1990 levels by 2030, and 85% below 1990 levels by 2045, respectively. In addition, AB 1279 calls upon the state to achieve net zero GHG emissions by no later than 2045 and achieve and maintain net negative GHG emissions thereafter.

As defined by AB 32, CARB is required to develop the Scoping Plan, which provides the framework for actions to achieve the state's GHG emission targets. The Scoping Plan is required to be updated every 5 years and requires CARB and other state agencies to adopt regulations and initiatives that will reduce GHG emissions statewide. The first Scoping Plan was adopted in 2008, with subsequent updates adopted in 2014, 2017, and (most recently) 2022. While the Scoping Plan is not directly applicable to specific projects, it does provide the official framework for the measures and regulations that will be pursued by the state's executive branch of government to reduce California's GHG emissions in alignment with the legislatively adopted targets. Therefore, a project would be found to not conflict with the statutes establishing statewide GHG reduction targets if it would meet the Scoping Plan policies and would not impede attainment of the goals therein.

CARB's 2017 Scoping Plan was the first to address the state's strategy for achieving the 2030 GHG reduction target set forth in SB 32 (CARB 2017a). The most recent 2022 Scoping Plan outlines the state's plan to reduce emissions and achieve carbon neutrality by 2045 in alignment with AB 1279, and assesses the state's progress towards meeting the 2030 SB 32 target (CARB 2022h). As such, given that SB 32 and AB 1279 are the relevant GHG emission targets, the 2017 and 2022 Scoping Plans that outline the strategy to achieve those targets are the most applicable to the proposed project.

To achieve the 2030 goal of 40% below 1990 GHG emission levels, the 2017 Scoping Plan included measures to promote renewable energy and energy efficiency (including the mandates of SB 350), measures to increase the stringency of the Low Carbon Fuel Standard, measures identified in the Mobile Source and Freight Strategies, measures identified in the proposed SLCP Plan, and measures to increase the stringency of SB 375 targets. To fill the gap in additional reductions needed to achieve the 2030 target, the 2017 Scoping Plan also recommended continuing the Cap-and-Trade Program and a measure to reduce GHGs from refineries by 20%. Many of these measures and programs would result in the reduction of project-related GHG emissions with no action required at the project-level. These programs would benefit GHG emission reductions through increased energy efficiency and renewable energy production (SB 350), reduction in carbon intensity of transportation fuels (Low Carbon Fuel Standard), and the accelerated efficiency and electrification of the statewide vehicle fleet (Mobile Source Strategy). Implementation of these statewide programs would result in a reduction of operational GHG emissions over the project lifetime.

CARB approved the 2022 Scoping Plan in December 2022 to outline the state's plan to reduce anthropogenic emissions to 85% below 1990 levels by 2045 and achieve carbon neutrality by 2045 or earlier. The 2022 Scoping Plan also assesses the progress the state is making towards reducing GHG emissions by at least 40% below 1990 levels by 2030, as is required by SB 32 and laid out in the 2017 Scoping Plan. The carbon reduction programs included in the 2022 Scoping Plan build on and accelerate those currently in place, including moving to zero-emission transportation; phasing out use of fossil gas use for heating homes and buildings; reducing chemical and refrigerants with high GWP; providing communities with sustainable options for walking, biking, and public transit; and displacement of fossil-fuel fired electrical generation through use of renewable energy alternatives (e.g., solar arrays and wind turbines) (CARB 2022c). Implementation of the measures and programs included in the 2022 Scoping Plan largely are the responsibility of policymakers and would result in the reduction of project-related GHG emissions with no action required at the project-level. Given that the proposed project includes bike lanes and pedestrian sidewalks that encourage alternative modes of travel, implementation would support the 2022 Scoping Plan's goals of displacing fossil-fuel fired electrical generation through enhancing connectivity and increasing accessibility with sustainable transit options.

The 2045 carbon neutrality goal required CARB to expand proposed actions in the 2022 Scoping Plan to include those that capture and store carbon in addition to those that reduce only anthropogenic sources of GHG emissions. The proposed project would not conflict with the state's carbon neutrality goals, including actions related to capturing and storing carbon. The 2022 Scoping Plan indicates that achieving carbon neutrality will require research, development, and deployment of additional methods to capture atmospheric GHG emissions (e.g., mechanical direct air capture). Given that the specific path to neutrality will require development of technologies and programs that are not currently known or available, the project's role in supporting the statewide goal would be speculative and cannot be wholly identified at this time.

Overall, the proposed project would comply will all regulations adopted in furtherance of the Scoping Plan to the extent applicable and required by law. As mentioned above, several Scoping Plan measures would result in reductions of project-related GHG emissions with no action required at the project-level, including those related to energy efficiency, reduced fossil fuel use, and renewable energy production. As demonstrated above, the proposed project would not conflict with CARB's 2017 or 2022 Scoping Plan updates and with the state's ability to achieve the 2030 and 2045 GHG reduction and carbon neutrality goals.

Level of Significance Before Mitigation

As discussed above, the project's significance is based on its potential to conflict with the applicable plans adopted for the purpose of reducing GHG emissions, including the CSU Sustainability Policy, the 2017 SDSU CAP, the City's CAP, SANDAG's RTP/SCS, and CARB's Scoping Plan. As shown, the proposed project would not conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of GHGs, and the impact would be **less than significant**.

Mitigation Measures

No mitigation is required.

Level of Significance After Mitigation

Impacts would be less than significant.

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Appendix A

Air Quality and Greenhouse Gas Emissions
CalEEMod Output Files

Fenton Construction Phase 1 Detailed Report

Bridge Construction

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Fenton Construction Phase 1
Construction Start Date	1/1/2024
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	2.50
Precipitation (days)	19.8
Location	Fenton Pkwy, San Diego, CA 92108, USA
County	San Diego
City	San Diego
Air District	San Diego County APCD
Air Basin	San Diego
TAZ	6340
EDFZ	12
Electric Utility	San Diego Gas & Electric
Gas Utility	San Diego Gas & Electric
App Version	2022.1.1.16

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
User Defined Industrial	0.20	User Defined Unit	1.50	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, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	4.04	3.24	33.2	30.6	0.09	1.05	2.30	3.34	0.97	0.60	1.57	—	12,282	12,282	0.52	0.90	18.9	12,582
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	8.75	6.89	77.1	64.7	0.26	2.33	10.2	12.1	2.16	4.36	6.09	—	33,878	33,878	1.46	2.62	1.22	34,697
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	2.30	1.85	18.4	16.5	0.05	0.62	1.43	2.05	0.57	0.48	1.05	—	6,210	6,210	0.27	0.40	3.34	6,339
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.42	0.34	3.36	3.02	0.01	0.11	0.26	0.37	0.10	0.09	0.19	—	1,028	1,028	0.04	0.07	0.55	1,049

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

2024	4.04	3.24	33.2	30.6	0.09	1.05	2.30	3.34	0.97	0.60	1.57	—	12,282	12,282	0.52	0.90	18.9	12,582
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	8.75	6.89	77.1	64.7	0.26	2.33	10.2	12.1	2.16	4.36	6.09	—	33,878	33,878	1.46	2.62	1.22	34,697
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	2.30	1.85	18.4	16.5	0.05	0.62	1.43	2.05	0.57	0.48	1.05	—	6,210	6,210	0.27	0.40	3.34	6,339
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	0.42	0.34	3.36	3.02	0.01	0.11	0.26	0.37	0.10	0.09	0.19	—	1,028	1,028	0.04	0.07	0.55	1,049

3. Construction Emissions Details

3.1. Site Preparation (2024) - 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	3.49	2.93	27.8	26.3	0.05	1.26	—	1.26	1.16	—	1.16	—	5,145	5,145	0.21	0.04	—	5,162
Dust From Material Movement	—	—	—	—	—	—	8.14	8.14	—	3.54	3.54	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.14	0.12	1.14	1.08	< 0.005	0.05	—	0.05	0.05	—	0.05	—	211	211	0.01	< 0.005	—	212
Dust From Material Movement	—	—	—	—	—	—	0.33	0.33	—	0.15	0.15	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.02	0.21	0.20	< 0.005	0.01	—	0.01	0.01	—	0.01	—	35.0	35.0	< 0.005	< 0.005	—	35.1
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	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.07	0.07	0.06	0.69	0.00	0.00	0.14	0.14	0.00	0.03	0.03	—	146	146	0.01	0.01	0.02	—
Vendor	0.01	< 0.005	0.15	0.07	< 0.005	< 0.005	0.03	0.03	< 0.005	0.01	0.01	—	102	102	< 0.005	0.01	0.01	—
Hauling	0.04	0.01	0.82	0.28	< 0.005	0.01	0.15	0.16	0.01	0.04	0.05	—	587	587	0.03	0.09	0.03	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.03	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	6.06	6.06	< 0.005	< 0.005	0.01	—
Vendor	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.19	4.19	< 0.005	< 0.005	< 0.005	—

Hauling	< 0.005	< 0.005	0.03	0.01	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	24.1	24.1	< 0.005	< 0.005	0.02	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.00	1.00	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.69	0.69	< 0.005	< 0.005	< 0.005	—
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.99	3.99	< 0.005	< 0.005	< 0.005	—

3.3. Grading (2024) - 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	2.87	2.41	22.5	20.2	0.07	0.86	—	0.86	0.79	—	0.79	—	7,877	7,877	0.32	0.06	—	7,904
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	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.12	0.10	0.93	0.83	< 0.005	0.04	—	0.04	0.03	—	0.03	—	324	324	0.01	< 0.005	—	325
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	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.17	0.15	< 0.005	0.01	—	0.01	0.01	—	0.01	—	53.6	53.6	< 0.005	< 0.005	—	53.8
Dust From Material Movement	—	—	—	—	—	—	< 0.005	< 0.005	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.05	0.04	0.04	0.43	0.00	0.00	0.08	0.08	0.00	0.02	0.02	—	91.3	91.3	< 0.005	< 0.005	0.01	—
Vendor	0.01	0.01	0.22	0.10	< 0.005	< 0.005	0.04	0.04	< 0.005	0.01	0.01	—	153	153	0.01	0.02	0.01	—
Hauling	0.14	0.04	2.66	0.92	0.01	0.03	0.48	0.52	0.03	0.13	0.17	—	1,908	1,908	0.10	0.31	0.11	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.79	3.79	< 0.005	< 0.005	0.01	—
Vendor	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.28	6.28	< 0.005	< 0.005	0.01	—
Hauling	0.01	< 0.005	0.11	0.04	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	78.4	78.4	< 0.005	0.01	0.07	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.63	0.63	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.04	1.04	< 0.005	< 0.005	< 0.005	—
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	13.0	13.0	< 0.005	< 0.005	0.01	—

3.5. Grading (2024) - 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	1.84	1.54	14.0	13.6	0.02	0.63	—	0.63	0.58	—	0.58	—	2,162	2,162	0.09	0.02	—	2,170
Dust From Material Movement	—	—	—	—	—	—	6.55	6.55	—	3.37	3.37	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.02	0.19	0.19	< 0.005	0.01	—	0.01	0.01	—	0.01	—	29.6	29.6	< 0.005	< 0.005	—	29.7
Dust From Material Movement	—	—	—	—	—	—	0.09	0.09	—	0.05	0.05	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.03	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.90	4.90	< 0.005	< 0.005	—	4.92

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	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.05	0.05	0.04	0.52	0.00	0.00	0.10	0.10	0.00	0.02	0.02	—	110	110	0.01	< 0.005	0.01	—
Vendor	0.01	< 0.005	0.15	0.07	< 0.005	< 0.005	0.03	0.03	< 0.005	0.01	0.01	—	102	102	< 0.005	0.01	0.01	—
Hauling	0.02	0.01	0.41	0.14	< 0.005	0.01	0.07	0.08	0.01	0.02	0.03	—	294	294	0.02	0.05	0.02	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.52	1.52	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.40	1.40	< 0.005	< 0.005	< 0.005	—
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.02	4.02	< 0.005	< 0.005	< 0.005	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.25	0.25	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.23	0.23	< 0.005	< 0.005	< 0.005	—
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.67	0.67	< 0.005	< 0.005	< 0.005	—

3.7. Grading (2024) - 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	2.87	2.41	22.5	20.2	0.07	0.86	—	0.86	0.79	—	0.79	—	7,877	7,877	0.32	0.06	—	7,904
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	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.12	0.10	0.93	0.83	< 0.005	0.04	—	0.04	0.03	—	0.03	—	324	324	0.01	< 0.005	—	325
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	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.17	0.15	< 0.005	0.01	—	0.01	0.01	—	0.01	—	53.6	53.6	< 0.005	< 0.005	—	53.8
Dust From Material Movement	—	—	—	—	—	—	< 0.005	< 0.005	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.05	0.04	0.04	0.43	0.00	0.00	0.08	0.08	0.00	0.02	0.02	—	91.3	91.3	< 0.005	< 0.005	0.01	—
Vendor	0.01	0.01	0.22	0.10	< 0.005	< 0.005	0.04	0.04	< 0.005	0.01	0.01	—	153	153	0.01	0.02	0.01	—
Hauling	0.14	0.04	2.66	0.92	0.01	0.03	0.48	0.52	0.03	0.13	0.17	—	1,908	1,908	0.10	0.31	0.11	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.79	3.79	< 0.005	< 0.005	0.01	—
Vendor	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.28	6.28	< 0.005	< 0.005	0.01	—
Hauling	0.01	< 0.005	0.11	0.04	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	78.4	78.4	< 0.005	0.01	0.07	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.63	0.63	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.04	1.04	< 0.005	< 0.005	< 0.005	—
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	13.0	13.0	< 0.005	< 0.005	0.01	—

3.9. Grading (2024) - 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	1.84	1.54	14.0	13.6	0.02	0.63	—	0.63	0.58	—	0.58	—	2,162	2,162	0.09	0.02	—	2,170

Dust From Material Movement	—	—	—	—	—	—	6.55	6.55	—	3.37	3.37	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.02	0.19	0.19	< 0.005	0.01	—	0.01	0.01	—	0.01	—	29.6	29.6	< 0.005	< 0.005	—	29.7
Dust From Material Movement	—	—	—	—	—	—	0.09	0.09	—	0.05	0.05	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.03	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.90	4.90	< 0.005	< 0.005	—	4.92
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	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.05	0.05	0.04	0.52	0.00	0.00	0.10	0.10	0.00	0.02	0.02	—	110	110	0.01	< 0.005	0.01	—
Vendor	0.01	< 0.005	0.15	0.07	< 0.005	< 0.005	0.03	0.03	< 0.005	0.01	0.01	—	102	102	< 0.005	0.01	0.01	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.52	1.52	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.40	1.40	< 0.005	< 0.005	< 0.005	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.25	0.25	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.23	0.23	< 0.005	< 0.005	< 0.005	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

3.11. Building Construction (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.56	1.29	11.3	10.3	0.02	0.43	—	0.43	0.40	—	0.40	—	2,091	2,091	0.08	0.02	—	2,098
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.56	1.29	11.3	10.3	0.02	0.43	—	0.43	0.40	—	0.40	—	2,091	2,091	0.08	0.02	—	2,098
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	1.02	0.85	7.40	6.73	0.01	0.28	—	0.28	0.26	—	0.26	—	1,369	1,369	0.06	0.01	—	1,374
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.19	0.15	1.35	1.23	< 0.005	0.05	—	0.05	0.05	—	0.05	—	227	227	0.01	< 0.005	—	227
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.10	0.08	1.19	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	232	232	0.01	0.01	0.93	—
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.10	0.09	1.04	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	219	219	0.01	0.01	0.02	—
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.07	0.06	0.06	0.69	0.00	0.00	0.13	0.13	0.00	0.03	0.03	—	145	145	0.01	0.01	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	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.01	0.01	0.01	0.13	0.00	0.00	0.02	0.02	0.00	0.01	0.01	—	24.0	24.0	< 0.005	< 0.005	0.04	—
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

3.13. Building Construction (2024) - 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	1.63	1.37	11.6	12.2	0.04	0.48	—	0.48	0.44	—	0.44	—	4,106	4,106	0.17	0.03	—	4,120
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.13	0.11	0.95	1.00	< 0.005	0.04	—	0.04	0.04	—	0.04	—	337	337	0.01	< 0.005	—	339
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.17	0.18	< 0.005	0.01	—	0.01	0.01	—	0.01	—	55.9	55.9	< 0.005	< 0.005	—	56.1
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Worker	0.09	0.08	0.07	0.87	0.00	0.00	0.17	0.17	0.00	0.04	0.04	—	183	183	0.01	0.01	0.02	—
Vendor	0.72	0.33	12.3	5.65	0.06	0.11	2.16	2.28	0.11	0.60	0.71	—	8,614	8,614	0.37	1.20	0.57	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.01	0.01	0.01	0.07	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	15.2	15.2	< 0.005	< 0.005	0.03	—
Vendor	0.06	0.03	1.01	0.46	< 0.005	0.01	0.18	0.19	0.01	0.05	0.06	—	708	708	0.03	0.10	0.78	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	2.51	2.51	< 0.005	< 0.005	< 0.005	—
Vendor	0.01	0.01	0.18	0.08	< 0.005	< 0.005	0.03	0.03	< 0.005	0.01	0.01	—	117	117	0.01	0.02	0.13	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

3.15. Building Construction (2024) - 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	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	0.04	0.03	0.33	0.26	< 0.005	0.01	—	0.01	0.01	—	0.01	—	81.4	81.4	< 0.005	< 0.005	—	81.7
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.06	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	13.5	13.5	< 0.005	< 0.005	—	13.5
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	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.10	0.09	1.04	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	219	219	0.01	0.01	0.02	—
Vendor	0.25	0.11	4.22	1.94	0.02	0.04	0.74	0.78	0.04	0.21	0.24	—	2,956	2,956	0.13	0.41	0.20	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.01	0.01	0.01	0.09	0.00	0.00	0.02	0.02	0.00	< 0.005	< 0.005	—	18.2	18.2	< 0.005	< 0.005	0.03	—
Vendor	0.02	0.01	0.35	0.16	< 0.005	< 0.005	0.06	0.06	< 0.005	0.02	0.02	—	243	243	0.01	0.03	0.27	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.01	3.01	< 0.005	< 0.005	0.01	—
Vendor	< 0.005	< 0.005	0.06	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	40.2	40.2	< 0.005	0.01	0.04	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

3.17. Building Construction (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.61	0.52	5.43	5.55	0.01	0.21	—	0.21	0.20	—	0.20	—	1,372	1,372	0.06	0.01	—	1,377
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.61	0.52	5.43	5.55	0.01	0.21	—	0.21	0.20	—	0.20	—	1,372	1,372	0.06	0.01	—	1,377
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.05	0.04	0.45	0.46	< 0.005	0.02	—	0.02	0.02	—	0.02	—	113	113	< 0.005	< 0.005	—	113
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.08	0.08	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	18.7	18.7	< 0.005	< 0.005	—	18.7
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.10	0.08	1.19	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	232	232	0.01	0.01	0.93	—

Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.10	0.09	1.04	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	219	219	0.01	0.01	0.02	—
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.01	0.01	0.01	0.09	0.00	0.00	0.02	0.02	0.00	< 0.005	< 0.005	—	18.2	18.2	< 0.005	< 0.005	0.03	—
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.01	3.01	< 0.005	< 0.005	0.01	—
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

3.19. Building Construction (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.05	0.04	0.38	0.30	< 0.005	0.02	—	0.02	0.01	—	0.01	—	95.0	95.0	< 0.005	< 0.005	—	95.3
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.07	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	15.7	15.7	< 0.005	< 0.005	—	15.8
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	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.10	0.08	1.19	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	232	232	0.01	0.01	0.93	—
Vendor	0.25	0.12	4.08	1.88	0.02	0.04	0.74	0.78	0.04	0.21	0.24	—	2,955	2,955	0.13	0.41	7.59	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.10	0.09	1.04	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	219	219	0.01	0.01	0.02	—
Vendor	0.25	0.11	4.22	1.94	0.02	0.04	0.74	0.78	0.04	0.21	0.24	—	2,956	2,956	0.13	0.41	0.20	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Worker	0.01	0.01	0.01	0.10	0.00	0.00	0.02	0.02	0.00	< 0.005	< 0.005	—	21.2	21.2	< 0.005	< 0.005	0.04	—
Vendor	0.02	0.01	0.40	0.18	< 0.005	< 0.005	0.07	0.07	< 0.005	0.02	0.02	—	283	283	0.01	0.04	0.31	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.51	3.51	< 0.005	< 0.005	0.01	—
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	46.9	46.9	< 0.005	0.01	0.05	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

3.21. Building Construction (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.14	0.12	1.21	0.95	< 0.005	0.05	—	0.05	0.04	—	0.04	—	298	298	0.01	< 0.005	—	299
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.02	0.22	0.17	< 0.005	0.01	—	0.01	0.01	—	0.01	—	49.4	49.4	< 0.005	< 0.005	—	49.6

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.10	0.08	1.19	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	232	232	0.01	0.01	0.93	—
Vendor	0.25	0.12	4.08	1.88	0.02	0.04	0.74	0.78	0.04	0.21	0.24	—	2,955	2,955	0.13	0.41	7.59	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.03	0.03	0.03	0.32	0.00	0.00	0.06	0.06	0.00	0.01	0.01	—	66.7	66.7	< 0.005	< 0.005	0.12	—
Vendor	0.07	0.03	1.27	0.58	0.01	0.01	0.22	0.23	0.01	0.06	0.07	—	891	891	0.04	0.12	0.98	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.01	0.01	< 0.005	0.06	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	11.0	11.0	< 0.005	< 0.005	0.02	—
Vendor	0.01	0.01	0.23	0.11	< 0.005	< 0.005	0.04	0.04	< 0.005	0.01	0.01	—	147	147	0.01	0.02	0.16	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

3.23. Building Construction (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	0.61	0.52	5.43	5.55	0.01	0.21	—	0.21	0.20	—	0.20	—	1,372	1,372	0.06	0.01	—	1,377
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.07	0.08	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	18.8	18.8	< 0.005	< 0.005	—	18.9
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	3.11	3.11	< 0.005	< 0.005	—	3.12
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.10	0.08	1.19	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	232	232	0.01	0.01	0.93	—
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.03	3.03	< 0.005	< 0.005	0.01	—
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.50	0.50	< 0.005	< 0.005	< 0.005	—
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

3.25. Building Construction (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.11	0.09	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	27.1	27.1	< 0.005	< 0.005	—	27.2
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.49	4.49	< 0.005	< 0.005	—	4.51
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.02	0.02	0.01	0.20	0.00	0.00	0.03	0.03	0.00	0.01	0.01	—	38.7	38.7	< 0.005	< 0.005	0.16	—
Vendor	0.12	0.06	1.97	0.91	0.01	0.02	0.36	0.38	0.02	0.10	0.12	—	1,427	1,427	0.06	0.20	3.66	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.01	1.01	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	0.06	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	39.1	39.1	< 0.005	0.01	0.04	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.17	0.17	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.47	6.47	< 0.005	< 0.005	0.01	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

3.27. Building Construction (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.40	0.34	2.66	4.15	0.01	0.13	—	0.13	0.12	—	0.12	—	643	643	0.03	0.01	—	645
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.15	0.23	< 0.005	0.01	—	0.01	0.01	—	0.01	—	35.2	35.2	< 0.005	< 0.005	—	35.4
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.03	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	5.83	5.83	< 0.005	< 0.005	—	5.85
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.04	0.03	0.03	0.40	0.00	0.00	0.07	0.07	0.00	0.02	0.02	—	77.4	77.4	< 0.005	< 0.005	0.31	—
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Hauling	0.02	0.01	0.40	0.14	< 0.005	0.01	0.07	0.08	0.01	0.02	0.03	—	293	293	0.02	0.05	0.63	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	4.04	4.04	< 0.005	< 0.005	0.01	—
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	16.1	16.1	< 0.005	< 0.005	0.01	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.67	0.67	< 0.005	< 0.005	< 0.005	—
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.66	2.66	< 0.005	< 0.005	< 0.005	—

3.29. Building Construction (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.16	0.13	< 0.005	0.01	—	0.01	0.01	—	0.01	—	40.7	40.7	< 0.005	< 0.005	—	40.8
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	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	6.74	6.74	< 0.005	< 0.005	—	6.76
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.02	0.02	0.01	0.20	0.00	0.00	0.03	0.03	0.00	0.01	0.01	—	38.7	38.7	< 0.005	< 0.005	0.16	—
Vendor	0.12	0.06	1.97	0.91	0.01	0.02	0.36	0.38	0.02	0.10	0.12	—	1,427	1,427	0.06	0.20	3.66	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.02	0.02	0.01	0.17	0.00	0.00	0.03	0.03	0.00	0.01	0.01	—	36.5	36.5	< 0.005	< 0.005	< 0.005	—
Vendor	0.12	0.05	2.04	0.94	0.01	0.02	0.36	0.38	0.02	0.10	0.12	—	1,427	1,427	0.06	0.20	0.09	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.52	1.52	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	0.08	0.04	< 0.005	< 0.005	0.01	0.02	< 0.005	< 0.005	< 0.005	—	58.6	58.6	< 0.005	0.01	0.06	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.25	0.25	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.71	9.71	< 0.005	< 0.005	0.01	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

3.31. Trenching (2024) - 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	0.40	0.34	2.66	4.15	0.01	0.13	—	0.13	0.12	—	0.12	—	643	643	0.03	0.01	—	645
Dust From Material Movement	—	—	—	—	—	—	0.03	0.03	—	< 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	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	< 0.005	0.04	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.81	8.81	< 0.005	< 0.005	—	8.84
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	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.46	1.46	< 0.005	< 0.005	—	1.46
Dust From Material Movement	—	—	—	—	—	—	< 0.005	< 0.005	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.04	0.03	0.03	0.35	0.00	0.00	0.07	0.07	0.00	0.02	0.02	—	73.1	73.1	< 0.005	< 0.005	0.01	—
Vendor	0.28	0.13	4.73	2.17	0.02	0.04	0.83	0.88	0.04	0.23	0.27	—	3,313	3,313	0.14	0.46	0.22	—
Hauling	0.03	0.01	0.61	0.21	< 0.005	0.01	0.11	0.12	0.01	0.03	0.04	—	440	440	0.02	0.07	0.02	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.01	1.01	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	0.06	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	45.4	45.4	< 0.005	0.01	0.05	—
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.03	6.03	< 0.005	< 0.005	0.01	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.17	0.17	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	7.51	7.51	< 0.005	< 0.005	0.01	—
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.00	1.00	< 0.005	< 0.005	< 0.005	—

3.33. Trenching (2024) - 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	0.40	0.34	2.66	4.15	0.01	0.13	—	0.13	0.12	—	0.12	—	643	643	0.03	0.01	—	645

Dust From Material Movement	—	—	—	—	—	—	0.03	0.03	—	< 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	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	< 0.005	0.04	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.81	8.81	< 0.005	< 0.005	—	8.84
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	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.46	1.46	< 0.005	< 0.005	—	1.46
Dust From Material Movement	—	—	—	—	—	—	< 0.005	< 0.005	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.04	0.03	0.03	0.35	0.00	0.00	0.07	0.07	0.00	0.02	0.02	—	73.1	73.1	< 0.005	< 0.005	0.01	—
Vendor	0.28	0.13	4.73	2.17	0.02	0.04	0.83	0.88	0.04	0.23	0.27	—	3,313	3,313	0.14	0.46	0.22	—
Hauling	0.03	0.01	0.61	0.21	< 0.005	0.01	0.11	0.12	0.01	0.03	0.04	—	440	440	0.02	0.07	0.02	—

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.01	1.01	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	0.06	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	45.4	45.4	< 0.005	0.01	0.05	—
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.03	6.03	< 0.005	< 0.005	0.01	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.17	0.17	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	7.51	7.51	< 0.005	< 0.005	0.01	—
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.00	1.00	< 0.005	< 0.005	< 0.005	—

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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
2. ESA Fencing; Clear & Grub; Mob	Site Preparation	1/1/2024	1/19/2024	5.00	15.0	—

4. Ground Impr Abut 1	Grading	1/22/2024	2/9/2024	5.00	15.0	—
6. Embankment Grading (Abut 1)	Grading	2/12/2024	2/16/2024	5.00	5.00	—
8. Ground Impr Abut 5	Grading	2/19/2024	3/8/2024	5.00	15.0	—
11. Embankment Grading (Abut 5)	Grading	3/11/2024	3/15/2024	5.00	5.00	—
1. General Construction	Building Construction	1/1/2024	11/28/2024	5.00	239	—
3. CIDH Piles (Pier 2, 3, 4)	Building Construction	1/22/2024	3/1/2024	5.00	30.0	—
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Building Construction	2/12/2024	3/22/2024	5.00	30.0	—
9. Cap Falsework (Pier 2, 3, 4)	Building Construction	2/26/2024	4/5/2024	5.00	30.0	—
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Building Construction	3/11/2024	4/26/2024	5.00	35.0	—
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Building Construction	4/1/2024	8/30/2024	5.00	110	—
14. Erect Precast Girders	Building Construction	6/10/2024	6/14/2024	5.00	5.00	—
15. Cure Deck, Strip Overhangs	Building Construction	9/2/2024	9/13/2024	5.00	10.0	—
16. Riprap (Abut 1 & 5)	Building Construction	9/2/2024	9/27/2024	5.00	20.0	—
17. Sidewalk Barrier Install, Deck Grind	Building Construction	9/16/2024	10/4/2024	5.00	15.0	—
7. Exc Abut 1	Trenching	2/19/2024	2/23/2024	5.00	5.00	—
12. Exc Abut 5	Trenching	3/18/2024	3/22/2024	5.00	5.00	—

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

2. ESA Fencing; Clear & Grub; Mob	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
2. ESA Fencing; Clear & Grub; Mob	Graders	Diesel	Average	1.00	8.00	148	0.41
2. ESA Fencing; Clear & Grub; Mob	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
2. ESA Fencing; Clear & Grub; Mob	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
2. ESA Fencing; Clear & Grub; Mob	Scrapers	Diesel	Average	1.00	8.00	423	0.48
2. ESA Fencing; Clear & Grub; Mob	Other Construction Equipment	Diesel	Average	1.00	8.00	170	0.42
4. Ground Impr Abut 1	Cranes	Diesel	Average	1.00	10.0	360	0.29
4. Ground Impr Abut 1	Bore/Drill Rigs	Diesel	Average	1.00	10.0	300	0.50
4. Ground Impr Abut 1	Other Construction Equipment	Diesel	Average	1.00	10.0	450	0.42
4. Ground Impr Abut 1	Other Construction Equipment	Diesel	Average	1.00	10.0	350	0.42
4. Ground Impr Abut 1	Forklifts	Diesel	Average	1.00	10.0	125	0.20
4. Ground Impr Abut 1	Rubber Tired Loaders	Diesel	Average	1.00	10.0	175	0.36
6. Embankment Grading (Abut 1)	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
6. Embankment Grading (Abut 1)	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
6. Embankment Grading (Abut 1)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
6. Embankment Grading (Abut 1)	Rollers	Diesel	Average	1.00	8.00	36.0	0.38
8. Ground Impr Abut 5	Cranes	Diesel	Average	1.00	10.0	360	0.29
8. Ground Impr Abut 5	Bore/Drill Rigs	Diesel	Average	1.00	10.0	300	0.50
8. Ground Impr Abut 5	Other Construction Equipment	Diesel	Average	1.00	10.0	450	0.42

8. Ground Impr Abut 5	Other Construction Equipment	Diesel	Average	1.00	10.0	350	0.42
8. Ground Impr Abut 5	Forklifts	Diesel	Average	1.00	10.0	125	0.20
8. Ground Impr Abut 5	Rubber Tired Loaders	Diesel	Average	1.00	10.0	175	0.36
11. Embankment Grading (Abut 5)	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
11. Embankment Grading (Abut 5)	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
11. Embankment Grading (Abut 5)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
11. Embankment Grading (Abut 5)	Rollers	Diesel	Average	1.00	8.00	36.0	0.38
1. General Construction	Aerial Lifts	Diesel	Average	1.00	8.00	46.0	0.31
1. General Construction	Air Compressors	Diesel	Average	1.00	8.00	37.0	0.48
1. General Construction	Cranes	Diesel	Average	1.00	8.00	367	0.29
1. General Construction	Forklifts	Diesel	Average	1.00	8.00	82.0	0.20
1. General Construction	Generator Sets	Diesel	Average	4.00	8.00	14.0	0.74
1. General Construction	Welders	Diesel	Average	1.00	8.00	46.0	0.45
3. CIDH Piles (Pier 2, 3, 4)	Bore/Drill Rigs	Diesel	Average	1.00	8.00	500	0.50
3. CIDH Piles (Pier 2, 3, 4)	Cranes	Diesel	Average	1.00	8.00	367	0.29
3. CIDH Piles (Pier 2, 3, 4)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
3. CIDH Piles (Pier 2, 3, 4)	Generator Sets	Diesel	Average	3.00	8.00	14.0	0.74
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Cranes	Diesel	Average	1.00	8.00	367	0.29
9. Cap Falsework (Pier 2, 3, 4)	Bore/Drill Rigs	Diesel	Average	1.00	8.00	83.0	0.50
9. Cap Falsework (Pier 2, 3, 4)	Cranes	Diesel	Average	1.00	8.00	367	0.29

10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Cranes	Diesel	Average	1.00	8.00	367	0.29
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Cranes	Diesel	Average	1.00	8.00	367	0.29
14. Erect Precast Girders	Bore/Drill Rigs	Diesel	Average	1.00	8.00	83.0	0.50
14. Erect Precast Girders	Cranes	Diesel	Average	1.00	8.00	367	0.29
15. Cure Deck, Strip Overhangs	Cranes	Diesel	Average	1.00	8.00	367	0.29
16. Riprap (Abut 1 & 5)	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
16. Riprap (Abut 1 & 5)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
17. Sidewalk Barrier Install, Deck Grind	Cranes	Diesel	Average	1.00	8.00	367	0.29
7. Exc Abut 1	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
7. Exc Abut 1	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
12. Exc Abut 5	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
12. Exc Abut 5	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
2. ESA Fencing; Clear & Grub; Mob	—	—	—	—
2. ESA Fencing; Clear & Grub; Mob	Worker	16.0	12.0	LDA,LDT1,LDT2
2. ESA Fencing; Clear & Grub; Mob	Vendor	4.00	7.63	HHDT,MHDT
2. ESA Fencing; Clear & Grub; Mob	Hauling	8.00	20.0	HHDT
2. ESA Fencing; Clear & Grub; Mob	Onsite truck	—	—	HHDT

4. Ground Impr Abut 1	—	—	—	—
4. Ground Impr Abut 1	Worker	10.0	12.0	LDA,LDT1,LDT2
4. Ground Impr Abut 1	Vendor	6.00	7.63	HHDT,MHDT
4. Ground Impr Abut 1	Hauling	26.0	20.0	HHDT
4. Ground Impr Abut 1	Onsite truck	—	—	HHDT
6. Embankment Grading (Abut 1)	—	—	—	—
6. Embankment Grading (Abut 1)	Worker	12.0	12.0	LDA,LDT1,LDT2
6. Embankment Grading (Abut 1)	Vendor	4.00	7.63	HHDT,MHDT
6. Embankment Grading (Abut 1)	Hauling	4.00	20.0	HHDT
6. Embankment Grading (Abut 1)	Onsite truck	—	—	HHDT
8. Ground Impr Abut 5	—	—	—	—
8. Ground Impr Abut 5	Worker	10.0	12.0	LDA,LDT1,LDT2
8. Ground Impr Abut 5	Vendor	6.00	7.63	HHDT,MHDT
8. Ground Impr Abut 5	Hauling	26.0	20.0	HHDT
8. Ground Impr Abut 5	Onsite truck	—	—	HHDT
11. Embankment Grading (Abut 5)	—	—	—	—
11. Embankment Grading (Abut 5)	Worker	12.0	12.0	LDA,LDT1,LDT2
11. Embankment Grading (Abut 5)	Vendor	4.00	7.63	HHDT,MHDT
11. Embankment Grading (Abut 5)	Hauling	0.00	20.0	HHDT
11. Embankment Grading (Abut 5)	Onsite truck	—	—	HHDT
1. General Construction	—	—	—	—
1. General Construction	Worker	24.0	12.0	LDA,LDT1,LDT2
1. General Construction	Vendor	0.00	7.63	HHDT,MHDT
1. General Construction	Hauling	0.00	20.0	HHDT
1. General Construction	Onsite truck	—	—	HHDT
3. CIDH Piles (Pier 2, 3, 4)	—	—	—	—
3. CIDH Piles (Pier 2, 3, 4)	Worker	20.0	12.0	LDA,LDT1,LDT2

3. CIDH Piles (Pier 2, 3, 4)	Vendor	338	7.63	HHDT,MHDT
3. CIDH Piles (Pier 2, 3, 4)	Hauling	0.00	20.0	HHDT
3. CIDH Piles (Pier 2, 3, 4)	Onsite truck	0.00	0.00	HHDT
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	—	—	—	—
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Worker	24.0	12.0	LDA,LDT1,LDT2
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Vendor	116	7.63	HHDT,MHDT
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Hauling	0.00	20.0	HHDT
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Onsite truck	0.00	0.00	HHDT
9. Cap Falsework (Pier 2, 3, 4)	—	—	—	—
9. Cap Falsework (Pier 2, 3, 4)	Worker	24.0	12.0	LDA,LDT1,LDT2
9. Cap Falsework (Pier 2, 3, 4)	Vendor	0.00	7.63	HHDT,MHDT
9. Cap Falsework (Pier 2, 3, 4)	Hauling	0.00	20.0	HHDT
9. Cap Falsework (Pier 2, 3, 4)	Onsite truck	—	—	HHDT
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	—	—	—	—
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Worker	24.0	12.0	LDA,LDT1,LDT2
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Vendor	116	7.63	HHDT,MHDT
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Hauling	0.00	20.0	HHDT
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Onsite truck	0.00	0.00	HHDT
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	—	—	—	—
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Worker	24.0	12.0	LDA,LDT1,LDT2

13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Vendor	116	7.63	HHDT,MHDT
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Hauling	0.00	20.0	HHDT
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Onsite truck	0.00	0.00	HHDT
14. Erect Precast Girders	—	—	—	—
14. Erect Precast Girders	Worker	24.0	12.0	LDA,LDT1,LDT2
14. Erect Precast Girders	Vendor	0.00	7.63	HHDT,MHDT
14. Erect Precast Girders	Hauling	0.00	20.0	HHDT
14. Erect Precast Girders	Onsite truck	—	—	HHDT
15. Cure Deck, Strip Overhangs	—	—	—	—
15. Cure Deck, Strip Overhangs	Worker	4.00	12.0	LDA,LDT1,LDT2
15. Cure Deck, Strip Overhangs	Vendor	56.0	7.63	HHDT,MHDT
15. Cure Deck, Strip Overhangs	Hauling	0.00	20.0	HHDT
15. Cure Deck, Strip Overhangs	Onsite truck	0.00	0.00	HHDT
16. Riprap (Abut 1 & 5)	—	—	—	—
16. Riprap (Abut 1 & 5)	Worker	8.00	12.0	LDA,LDT1,LDT2
16. Riprap (Abut 1 & 5)	Vendor	0.00	7.63	HHDT,MHDT
16. Riprap (Abut 1 & 5)	Hauling	4.00	20.0	HHDT
16. Riprap (Abut 1 & 5)	Onsite truck	—	—	HHDT
17. Sidewalk Barrier Install, Deck Grind	—	—	—	—
17. Sidewalk Barrier Install, Deck Grind	Worker	4.00	12.0	LDA,LDT1,LDT2
17. Sidewalk Barrier Install, Deck Grind	Vendor	56.0	7.63	HHDT,MHDT
17. Sidewalk Barrier Install, Deck Grind	Hauling	0.00	20.0	HHDT
17. Sidewalk Barrier Install, Deck Grind	Onsite truck	0.00	0.00	HHDT
7. Exc Abut 1	—	—	—	—
7. Exc Abut 1	Worker	8.00	12.0	LDA,LDT1,LDT2
7. Exc Abut 1	Vendor	130	7.63	HHDT,MHDT

7. Exc Abut 1	Hauling	6.00	20.0	HHDT
7. Exc Abut 1	Onsite truck	0.00	0.00	HHDT
12. Exc Abut 5	—	—	—	—
12. Exc Abut 5	Worker	8.00	12.0	LDA,LDT1,LDT2
12. Exc Abut 5	Vendor	130	7.63	HHDT,MHDT
12. Exc Abut 5	Hauling	6.00	20.0	HHDT
12. Exc Abut 5	Onsite truck	0.00	0.00	HHDT

5.4. Vehicles

5.4.1. Construction Vehicle Control Strategies

Non-applicable. No control strategies activated by user.

5.5. Architectural Coatings

Phase Name	Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)

5.6. Dust Mitigation

5.6.1. Construction Earthmoving Activities

Phase Name	Material Imported (cy)	Material Exported (cy)	Acres Graded (acres)	Material Demolished (sq. ft.)	Acres Paved (acres)
2. ESA Fencing; Clear & Grub; Mob	—	—	30.0	0.00	—
4. Ground Impr Abut 1	—	500	0.00	0.00	—
6. Embankment Grading (Abut 1)	—	—	2.50	0.00	—
8. Ground Impr Abut 5	—	500	0.00	0.00	—
11. Embankment Grading (Abut 5)	—	—	2.50	0.00	—

7. Exc Abut 1	1,500	1,500	0.00	0.00	—
12. Exc Abut 5	1,500	1,500	0.00	0.00	—

5.6.2. Construction Earthmoving Control Strategies

Non-applicable. No control strategies activated by user.

5.7. Construction Paving

Land Use	Area Paved (acres)	% Asphalt
User Defined Industrial	0.00	0%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2024	0.00	589	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	7.50	annual days of extreme heat
Extreme Precipitation	2.70	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	3.64	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	N/A	N/A	N/A	N/A

Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

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

6.3. Adjusted Climate Risk Scores

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

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores 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	37.6
AQ-PM	44.5
AQ-DPM	45.5
Drinking Water	29.0
Lead Risk Housing	21.4
Pesticides	0.00
Toxic Releases	35.8
Traffic	55.5
Effect Indicators	—
CleanUp Sites	33.9
Groundwater	64.5
Haz Waste Facilities/Generators	87.7
Impaired Water Bodies	72.2
Solid Waste	0.00
Sensitive Population	—
Asthma	27.1
Cardio-vascular	4.32
Low Birth Weights	20.9
Socioeconomic Factor Indicators	—
Education	16.8
Housing	30.2

Linguistic	22.2
Poverty	15.6
Unemployment	72.5

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	58.91184396
Employed	48.77454125
Median HI	71.4744001
Education	—
Bachelor's or higher	75.77312973
High school enrollment	100
Preschool enrollment	88.27152573
Transportation	—
Auto Access	26.42114718
Active commuting	41.99923008
Social	—
2-parent households	74.72090337
Voting	67.3681509
Neighborhood	—
Alcohol availability	81.09842166
Park access	81.35506224
Retail density	19.41485949
Supermarket access	2.399589375
Tree canopy	35.94251251

Housing	—
Homeownership	34.7747979
Housing habitability	66.35442063
Low-inc homeowner severe housing cost burden	65.0455537
Low-inc renter severe housing cost burden	68.13807263
Uncrowded housing	60.05389452
Health Outcomes	—
Insured adults	71.87219299
Arthritis	89.2
Asthma ER Admissions	73.3
High Blood Pressure	94.0
Cancer (excluding skin)	55.0
Asthma	72.9
Coronary Heart Disease	88.8
Chronic Obstructive Pulmonary Disease	86.1
Diagnosed Diabetes	92.6
Life Expectancy at Birth	51.7
Cognitively Disabled	36.6
Physically Disabled	77.4
Heart Attack ER Admissions	89.3
Mental Health Not Good	69.9
Chronic Kidney Disease	90.3
Obesity	79.9
Pedestrian Injuries	19.6
Physical Health Not Good	90.6
Stroke	88.3
Health Risk Behaviors	—

Binge Drinking	2.4
Current Smoker	68.2
No Leisure Time for Physical Activity	83.8
Climate Change Exposures	—
Wildfire Risk	57.5
SLR Inundation Area	0.0
Children	87.0
Elderly	73.1
English Speaking	54.0
Foreign-born	27.7
Outdoor Workers	56.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	31.6
Traffic Density	37.9
Traffic Access	48.8
Other Indices	—
Hardship	21.0
Other Decision Support	—
2016 Voting	74.1

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	19.0
Healthy Places Index Score for Project Location (b)	70.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
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	Project footprint estimated to be approx 1.5 acres.
Construction: Construction Phases	Construction assumptions provided by project engineers.
Construction: Off-Road Equipment	Construction assumptions provided by project engineers.
Construction: Dust From Material Movement	Construction assumptions provided by project engineers.
Construction: Trips and VMT	Construction assumptions provided by project engineers.

Fenton Construction Phase 2 Detailed Report

Off-Site Improvements

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Fenton Construction Phase 2
Construction Start Date	10/7/2024
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	2.50
Precipitation (days)	19.8
Location	Fenton Pkwy, San Diego, CA 92108, USA
County	San Diego
City	San Diego
Air District	San Diego County APCD
Air Basin	San Diego
TAZ	6340
EDFZ	12
Electric Utility	San Diego Gas & Electric
Gas Utility	San Diego Gas & Electric
App Version	2022.1.1.16

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
Road Construction	0.10	Mile	0.15	0.00	—	—	—	—

Other Non-Asphalt Surfaces	0.15	Acre	0.15	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.	5.08	3.78	47.3	37.3	0.13	1.63	6.40	8.03	1.51	1.21	2.72	—	18,241	18,241	0.90	1.90	0.67	18,831
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.30	0.24	2.55	2.25	0.01	0.10	0.31	0.40	0.09	0.05	0.14	—	823	823	0.04	0.07	0.40	844
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.05	0.04	0.47	0.41	< 0.005	0.02	0.06	0.07	0.02	0.01	0.03	—	136	136	0.01	0.01	0.07	140

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	5.08	3.78	47.3	37.3	0.13	1.63	6.40	8.03	1.51	1.21	2.72	—	18,241	18,241	0.90	1.90	0.67	18,831
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	0.30	0.24	2.55	2.25	0.01	0.10	0.31	0.40	0.09	0.05	0.14	—	823	823	0.04	0.07	0.40	844
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	0.05	0.04	0.47	0.41	< 0.005	0.02	0.06	0.07	0.02	0.01	0.03	—	136	136	0.01	0.01	0.07	140

3. Construction Emissions Details

3.1. Linear, Grubbing & Land Clearing (2024) - 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	0.51	0.43	3.69	3.52	< 0.005	0.24	—	0.24	0.23	—	0.23	—	491	491	0.02	< 0.005	—	492
Dust From Material Movement	—	—	—	—	—	—	0.53	0.53	—	0.06	0.06	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	0.01	0.01	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	6.72	6.72	< 0.005	< 0.005	—	6.74
Dust From Material Movement	—	—	—	—	—	—	0.01	0.01	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.11	1.11	< 0.005	< 0.005	—	1.12
Dust From Material Movement	—	—	—	—	—	—	< 0.005	< 0.005	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.03	0.02	0.02	0.26	0.00	0.00	0.05	0.05	0.00	0.01	0.01	—	54.8	54.8	< 0.005	< 0.005	0.01	—
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	51.0	51.0	< 0.005	0.01	< 0.005	—
Hauling	0.04	0.01	0.65	0.23	< 0.005	0.01	0.12	0.13	0.01	0.03	0.04	—	470	470	0.03	0.08	0.03	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.76	0.76	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.70	0.70	< 0.005	< 0.005	< 0.005	—
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.43	6.43	< 0.005	< 0.005	0.01	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.13	0.13	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.12	0.12	< 0.005	< 0.005	< 0.005	—
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.06	1.06	< 0.005	< 0.005	< 0.005	—

3.3. Linear, Grading & Excavation (2024) - 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	4.07	3.42	31.2	30.4	0.06	1.42	—	1.42	1.31	—	1.31	—	6,495	6,495	0.26	0.05	—	6,518
Dust From Material Movement	—	—	—	—	—	—	3.25	3.25	—	0.35	0.35	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.12	0.10	0.94	0.92	< 0.005	0.04	—	0.04	0.04	—	0.04	—	196	196	0.01	< 0.005	—	196
Dust From Material Movement	—	—	—	—	—	—	0.10	0.10	—	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	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	0.02	0.02	0.17	0.17	< 0.005	0.01	—	0.01	0.01	—	0.01	—	32.4	32.4	< 0.005	< 0.005	—	32.5
Dust From Material Movement	—	—	—	—	—	—	0.02	0.02	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.14	0.12	0.11	1.30	0.00	0.00	0.25	0.25	0.00	0.06	0.06	—	274	274	0.01	0.01	0.03	—
Vendor	< 0.005	< 0.005	0.04	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	25.5	25.5	< 0.005	< 0.005	< 0.005	—
Hauling	0.86	0.23	15.9	5.55	0.07	0.21	2.89	3.10	0.21	0.79	1.00	—	11,447	11,447	0.62	1.83	0.64	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.04	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	8.33	8.33	< 0.005	< 0.005	0.02	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.77	0.77	< 0.005	< 0.005	< 0.005	—
Hauling	0.03	0.01	0.48	0.17	< 0.005	0.01	0.09	0.09	0.01	0.02	0.03	—	345	345	0.02	0.06	0.32	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.38	1.38	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.13	0.13	< 0.005	< 0.005	< 0.005	—
Hauling	< 0.005	< 0.005	0.09	0.03	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	0.01	—	57.1	57.1	< 0.005	0.01	0.05	—

3.5. Linear, Drainage, Utilities, & Sub-Grade (2024) - 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	3.27	2.74	26.3	24.6	0.05	1.07	—	1.07	0.98	—	0.98	—	5,693	5,693	0.23	0.05	—	5,712
Dust From Material Movement	—	—	—	—	—	—	2.66	2.66	—	0.29	0.29	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.11	0.09	0.87	0.81	< 0.005	0.04	—	0.04	0.03	—	0.03	—	187	187	0.01	< 0.005	—	188
Dust From Material Movement	—	—	—	—	—	—	0.09	0.09	—	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	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.16	0.15	< 0.005	0.01	—	0.01	0.01	—	0.01	—	31.0	31.0	< 0.005	< 0.005	—	31.1
Dust From Material Movement	—	—	—	—	—	—	0.02	0.02	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.12	0.11	0.10	1.13	0.00	0.00	0.22	0.22	0.00	0.05	0.05	—	238	238	0.01	0.01	0.03	—
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	51.0	51.0	< 0.005	0.01	< 0.005	—
Hauling	0.07	0.02	1.23	0.43	0.01	0.02	0.22	0.24	0.02	0.06	0.08	—	881	881	0.05	0.14	0.05	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.04	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	7.88	7.88	< 0.005	< 0.005	0.01	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.68	1.68	< 0.005	< 0.005	< 0.005	—
Hauling	< 0.005	< 0.005	0.04	0.01	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	28.9	28.9	< 0.005	< 0.005	0.03	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.30	1.30	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.28	0.28	< 0.005	< 0.005	< 0.005	—
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.79	4.79	< 0.005	< 0.005	< 0.005	—

3.7. Linear, Paving (2024) - 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	1.14	0.96	8.15	10.9	0.01	0.39	—	0.39	0.36	—	0.36	—	1,620	1,620	0.07	0.01	—	1,626

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.13	0.18	< 0.005	0.01	—	0.01	0.01	—	0.01	—	26.6	26.6	< 0.005	< 0.005	—	26.7
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.02	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.41	4.41	< 0.005	< 0.005	—	4.42
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.08	0.07	0.07	0.76	0.00	0.00	0.15	0.15	0.00	0.03	0.03	—	160	160	0.01	0.01	0.02	—
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	51.0	51.0	< 0.005	0.01	< 0.005	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	2.65	2.65	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.84	0.84	< 0.005	< 0.005	< 0.005	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.44	0.44	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.14	0.14	< 0.005	< 0.005	< 0.005	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

3.9. Architectural Coating (2024) - 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	0.17	0.14	0.91	1.15	< 0.005	0.03	—	0.03	0.03	—	0.03	—	134	134	0.01	< 0.005	—	134
Architectural Coatings	—	0.36	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.83	1.83	< 0.005	< 0.005	—	1.84
Architectural Coatings	—	< 0.005	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.30	0.30	< 0.005	< 0.005	—	0.30
Architectural Coatings	—	< 0.005	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.03	0.02	0.02	0.26	0.00	0.00	0.05	0.05	0.00	0.01	0.01	—	54.8	54.8	< 0.005	< 0.005	0.01	—
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	51.0	51.0	< 0.005	0.01	< 0.005	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.76	0.76	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.70	0.70	< 0.005	< 0.005	< 0.005	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.13	0.13	< 0.005	< 0.005	< 0.005	—
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.12	0.12	< 0.005	< 0.005	< 0.005	—
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	—

4. Operations Emissions Details

4.10. 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 ered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Remove d	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequest ered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Remove d	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequest ered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
Linear, Grubbing & Land Clearing	Linear, Grubbing & Land Clearing	10/7/2024	10/11/2024	5.00	5.00	—
Linear, Grading & Excavation	Linear, Grading & Excavation	10/12/2024	10/28/2024	5.00	11.0	—
Linear, Drainage, Utilities, & Sub-Grade	Linear, Drainage, Utilities, & Sub-Grade	10/29/2024	11/13/2024	5.00	12.0	—
Linear, Paving	Linear, Paving	11/14/2024	11/21/2024	5.00	6.00	—
Architectural Coating	Architectural Coating	11/22/2024	11/28/2024	5.00	5.00	—

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
Linear, Grubbing & Land Clearing	Crawler Tractors	Diesel	Average	1.00	8.00	87.0	0.43
Linear, Grubbing & Land Clearing	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
Linear, Grubbing & Land Clearing	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Grading & Excavation	Crawler Tractors	Diesel	Average	1.00	8.00	87.0	0.43

Linear, Grading & Excavation	Excavators	Diesel	Average	3.00	8.00	36.0	0.38
Linear, Grading & Excavation	Graders	Diesel	Average	1.00	8.00	148	0.41
Linear, Grading & Excavation	Rollers	Diesel	Average	2.00	8.00	36.0	0.38
Linear, Grading & Excavation	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
Linear, Grading & Excavation	Scrapers	Diesel	Average	2.00	8.00	423	0.48
Linear, Grading & Excavation	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Grading & Excavation	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Linear, Drainage, Utilities, & Sub-Grade	Air Compressors	Diesel	Average	1.00	8.00	37.0	0.48
Linear, Drainage, Utilities, & Sub-Grade	Generator Sets	Diesel	Average	1.00	8.00	14.0	0.74
Linear, Drainage, Utilities, & Sub-Grade	Graders	Diesel	Average	1.00	8.00	148	0.41
Linear, Drainage, Utilities, & Sub-Grade	Plate Compactors	Diesel	Average	1.00	8.00	8.00	0.43
Linear, Drainage, Utilities, & Sub-Grade	Pumps	Diesel	Average	1.00	8.00	11.0	0.74
Linear, Drainage, Utilities, & Sub-Grade	Rough Terrain Forklifts	Diesel	Average	1.00	8.00	96.0	0.40
Linear, Drainage, Utilities, & Sub-Grade	Scrapers	Diesel	Average	2.00	8.00	423	0.48
Linear, Drainage, Utilities, & Sub-Grade	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Drainage, Utilities, & Sub-Grade	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Linear, Paving	Pavers	Diesel	Average	1.00	8.00	81.0	0.42

Linear, Paving	Paving Equipment	Diesel	Average	1.00	8.00	89.0	0.36
Linear, Paving	Rollers	Diesel	Average	3.00	8.00	36.0	0.38
Linear, Paving	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Paving	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Architectural Coating	Air Compressors	Diesel	Average	1.00	6.00	37.0	0.48

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Architectural Coating	—	—	—	—
Architectural Coating	Worker	6.00	12.0	LDA,LDT1,LDT2
Architectural Coating	Vendor	2.00	7.63	HHDT,MHDT
Architectural Coating	Hauling	0.00	20.0	HHDT
Architectural Coating	Onsite truck	—	—	HHDT
Linear, Grubbing & Land Clearing	—	—	—	—
Linear, Grubbing & Land Clearing	Worker	6.00	12.0	LDA,LDT1,LDT2
Linear, Grubbing & Land Clearing	Vendor	2.00	7.63	HHDT,MHDT
Linear, Grubbing & Land Clearing	Hauling	6.40	20.0	HHDT
Linear, Grubbing & Land Clearing	Onsite truck	—	—	HHDT
Linear, Grading & Excavation	—	—	—	—
Linear, Grading & Excavation	Worker	30.0	12.0	LDA,LDT1,LDT2
Linear, Grading & Excavation	Vendor	1.00	7.63	HHDT,MHDT
Linear, Grading & Excavation	Hauling	156	20.0	HHDT
Linear, Grading & Excavation	Onsite truck	—	—	HHDT
Linear, Drainage, Utilities, & Sub-Grade	—	—	—	—
Linear, Drainage, Utilities, & Sub-Grade	Worker	26.0	12.0	LDA,LDT1,LDT2

Linear, Drainage, Utilities, & Sub-Grade	Vendor	2.00	7.63	HHDT,MHDT
Linear, Drainage, Utilities, & Sub-Grade	Hauling	12.0	20.0	HHDT
Linear, Drainage, Utilities, & Sub-Grade	Onsite truck	—	—	HHDT
Linear, Paving	—	—	—	—
Linear, Paving	Worker	17.5	12.0	LDA,LDT1,LDT2
Linear, Paving	Vendor	2.00	7.63	HHDT,MHDT
Linear, Paving	Hauling	0.00	20.0	HHDT
Linear, Paving	Onsite truck	—	—	HHDT

5.4. Vehicles

5.4.1. Construction Vehicle Control Strategies

Non-applicable. No control strategies activated by user.

5.5. Architectural Coatings

Phase Name	Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
Architectural Coating	0.00	0.00	0.00	0.00	392

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)
Linear, Grubbing & Land Clearing	—	250	0.15	0.00	—
Linear, Grading & Excavation	13,400	200	0.15	0.00	—
Linear, Drainage, Utilities, & Sub-Grade	1,036	—	0.15	0.00	—

5.6.2. Construction Earthmoving Control Strategies

Non-applicable. No control strategies activated by user.

5.7. Construction Paving

Land Use	Area Paved (acres)	% Asphalt
Road Construction	0.15	100%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2024	0.00	589	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	7.50	annual days of extreme heat
Extreme Precipitation	2.70	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	3.64	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	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A

Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

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

6.3. Adjusted Climate Risk Scores

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

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores 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	37.6
AQ-PM	44.5
AQ-DPM	45.5
Drinking Water	29.0
Lead Risk Housing	21.4
Pesticides	0.00
Toxic Releases	35.8
Traffic	55.5
Effect Indicators	—
CleanUp Sites	33.9
Groundwater	64.5
Haz Waste Facilities/Generators	87.7
Impaired Water Bodies	72.2
Solid Waste	0.00
Sensitive Population	—
Asthma	27.1
Cardio-vascular	4.32
Low Birth Weights	20.9
Socioeconomic Factor Indicators	—
Education	16.8
Housing	30.2
Linguistic	22.2
Poverty	15.6
Unemployment	72.5

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	58.91184396
Employed	48.77454125
Median HI	71.4744001
Education	—
Bachelor's or higher	75.77312973
High school enrollment	100
Preschool enrollment	88.27152573
Transportation	—
Auto Access	26.42114718
Active commuting	41.99923008
Social	—
2-parent households	74.72090337
Voting	67.3681509
Neighborhood	—
Alcohol availability	81.09842166
Park access	81.35506224
Retail density	19.41485949
Supermarket access	2.399589375
Tree canopy	35.94251251
Housing	—
Homeownership	34.7747979
Housing habitability	66.35442063
Low-inc homeowner severe housing cost burden	65.0455537

Low-inc renter severe housing cost burden	68.13807263
Uncrowded housing	60.05389452
Health Outcomes	—
Insured adults	71.87219299
Arthritis	89.2
Asthma ER Admissions	73.3
High Blood Pressure	94.0
Cancer (excluding skin)	55.0
Asthma	72.9
Coronary Heart Disease	88.8
Chronic Obstructive Pulmonary Disease	86.1
Diagnosed Diabetes	92.6
Life Expectancy at Birth	51.7
Cognitively Disabled	36.6
Physically Disabled	77.4
Heart Attack ER Admissions	89.3
Mental Health Not Good	69.9
Chronic Kidney Disease	90.3
Obesity	79.9
Pedestrian Injuries	19.6
Physical Health Not Good	90.6
Stroke	88.3
Health Risk Behaviors	—
Binge Drinking	2.4
Current Smoker	68.2
No Leisure Time for Physical Activity	83.8
Climate Change Exposures	—

Wildfire Risk	57.5
SLR Inundation Area	0.0
Children	87.0
Elderly	73.1
English Speaking	54.0
Foreign-born	27.7
Outdoor Workers	56.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	31.6
Traffic Density	37.9
Traffic Access	48.8
Other Indices	—
Hardship	21.0
Other Decision Support	—
2016 Voting	74.1

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	19.0
Healthy Places Index Score for Project Location (b)	70.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
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	Construction assumptions provided by project engineers.
Construction: Trips and VMT	Workers included for architectural coating phase.
Construction: Paving	Paving only required once.

Fenton Construction Phase 1_HRA Detailed Report

Bridge Construction

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Fenton Construction Phase 1_HRA
Construction Start Date	1/1/2024
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	2.50
Precipitation (days)	19.8
Location	Fenton Pkwy, San Diego, CA 92108, USA
County	San Diego
City	San Diego
Air District	San Diego County APCD
Air Basin	San Diego
TAZ	6340
EDFZ	12
Electric Utility	San Diego Gas & Electric
Gas Utility	San Diego Gas & Electric
App Version	2022.1.1.21

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
User Defined Industrial	0.20	User Defined Unit	1.50	0.00	—	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

Sector	#	Measure Title
Construction	C-5	Use Advanced Engine Tiers

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, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	3.30	2.72	27.3	23.9	0.05	0.97	0.04	1.01	0.89	0.01	0.90	—	5,842	5,842	0.29	0.10	0.38	5,881
Mit.	1.18	1.03	10.5	31.0	0.05	0.23	0.04	0.27	0.22	0.01	0.23	—	5,842	5,842	0.29	0.10	0.38	5,881
% Reduced	64%	62%	61%	-30%	—	77%	—	74%	76%	—	75%	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	7.54	6.22	60.5	55.4	0.16	2.15	8.15	9.84	1.98	3.54	5.10	—	17,296	17,296	0.82	0.29	0.03	17,395
Mit.	2.82	2.46	23.1	89.3	0.16	0.53	8.15	8.40	0.51	3.54	3.79	—	17,296	17,296	0.82	0.29	0.03	17,395
% Reduced	63%	60%	62%	-61%	—	75%	—	15%	74%	—	26%	—	—	—	—	—	—	—
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	2.01	1.66	15.7	14.2	0.03	0.58	0.53	1.11	0.54	0.24	0.78	—	3,517	3,517	0.16	0.05	0.07	3,536
Mit.	0.74	0.65	6.48	18.8	0.03	0.15	0.53	0.68	0.14	0.24	0.39	—	3,517	3,517	0.16	0.05	0.07	3,536
% Reduced	63%	61%	59%	-33%	—	74%	—	39%	73%	—	50%	—	—	—	—	—	—	—

Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.37	0.30	2.87	2.59	0.01	0.11	0.10	0.20	0.10	0.04	0.14	—	582	582	0.03	0.01	0.01	585
Mit.	0.13	0.12	1.18	3.44	0.01	0.03	0.10	0.12	0.03	0.04	0.07	—	582	582	0.03	0.01	0.01	585
% Reduced	63%	61%	59%	-33%	—	74%	—	39%	73%	—	50%	—	—	—	—	—	—	—

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	3.30	2.72	27.3	23.9	0.05	0.97	0.04	1.01	0.89	0.01	0.90	—	5,842	5,842	0.29	0.10	0.38	5,881
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	7.54	6.22	60.5	55.4	0.16	2.15	8.15	9.84	1.98	3.54	5.10	—	17,296	17,296	0.82	0.29	0.03	17,395
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	2.01	1.66	15.7	14.2	0.03	0.58	0.53	1.11	0.54	0.24	0.78	—	3,517	3,517	0.16	0.05	0.07	3,536
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	0.37	0.30	2.87	2.59	0.01	0.11	0.10	0.20	0.10	0.04	0.14	—	582	582	0.03	0.01	0.01	585

2.3. Construction Emissions by Year, Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

2024	1.18	1.03	10.5	31.0	0.05	0.23	0.04	0.27	0.22	0.01	0.23	—	5,842	5,842	0.29	0.10	0.38	5,881
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	2.82	2.46	23.1	89.3	0.16	0.53	8.15	8.40	0.51	3.54	3.79	—	17,296	17,296	0.82	0.29	0.03	17,395
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	0.74	0.65	6.48	18.8	0.03	0.15	0.53	0.68	0.14	0.24	0.39	—	3,517	3,517	0.16	0.05	0.07	3,536
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	0.13	0.12	1.18	3.44	0.01	0.03	0.10	0.12	0.03	0.04	0.07	—	582	582	0.03	0.01	0.01	585

3. Construction Emissions Details

3.1. 2. ESA Fencing; Clear & Grub; Mob (2024) - 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	3.49	2.93	27.8	26.3	0.05	1.26	—	1.26	1.16	—	1.16	—	5,145	5,145	0.21	0.04	—	5,162
Dust From Material Movement	—	—	—	—	—	—	8.14	8.14	—	3.54	3.54	—	—	—	—	—	—	—
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	0.14	0.12	1.14	1.08	< 0.005	0.05	—	0.05	0.05	—	0.05	—	211	211	0.01	< 0.005	—	212
Dust From Material Movement	—	—	—	—	—	—	0.33	0.33	—	0.15	0.15	—	—	—	—	—	—	—
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	0.03	0.02	0.21	0.20	< 0.005	0.01	—	0.01	0.01	—	0.01	—	35.0	35.0	< 0.005	< 0.005	—	35.1
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.05	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.92	6.92	< 0.005	< 0.005	< 0.005	7.26
Hauling	0.01	0.01	0.13	0.09	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	19.7	19.7	< 0.005	< 0.005	< 0.005	20.7
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.28	0.28	< 0.005	< 0.005	< 0.005	0.30

Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.80	0.80	< 0.005	< 0.005	< 0.005	0.85
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.05	0.05	< 0.005	< 0.005	< 0.005	0.05
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.13	0.13	< 0.005	< 0.005	< 0.005	0.14

3.2. 2. ESA Fencing; Clear & Grub; Mob (2024) - Mitigated

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	0.49	0.49	3.12	29.2	0.05	0.10	—	0.10	0.10	—	0.10	—	5,145	5,145	0.21	0.04	—	5,162
Dust From Material Movement	—	—	—	—	—	—	8.14	8.14	—	3.54	3.54	—	—	—	—	—	—	—
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	0.13	1.20	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	211	211	0.01	< 0.005	—	212
Dust From Material Movement	—	—	—	—	—	—	0.33	0.33	—	0.15	0.15	—	—	—	—	—	—	—

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	0.22	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	35.0	35.0	< 0.005	< 0.005	—	35.1
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.05	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.92	6.92	< 0.005	< 0.005	< 0.005	7.26
Hauling	0.01	0.01	0.13	0.09	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	19.7	19.7	< 0.005	< 0.005	< 0.005	20.7
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.28	0.28	< 0.005	< 0.005	< 0.005	0.30
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.80	0.80	< 0.005	< 0.005	< 0.005	0.85
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.05	0.05	< 0.005	< 0.005	< 0.005	0.05
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.13	0.13	< 0.005	< 0.005	< 0.005	0.14

3.3. 4. Ground Impr Abut 1 (2024) - 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	2.87	2.41	22.5	20.2	0.07	0.86	—	0.86	0.79	—	0.79	—	7,877	7,877	0.32	0.06	—	7,904
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.12	0.10	0.93	0.83	< 0.005	0.04	—	0.04	0.03	—	0.03	—	324	324	0.01	< 0.005	—	325
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.17	0.15	< 0.005	0.01	—	0.01	0.01	—	0.01	—	53.6	53.6	< 0.005	< 0.005	—	53.8

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	10.4	10.4	< 0.005	< 0.005	< 0.005	10.9
Hauling	0.03	0.02	0.43	0.29	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	63.9	63.9	0.01	0.01	< 0.005	67.3
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.42	0.42	< 0.005	< 0.005	< 0.005	0.45
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.61	2.61	< 0.005	< 0.005	< 0.005	2.75
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.07	0.07	< 0.005	< 0.005	< 0.005	0.07
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.43	0.43	< 0.005	< 0.005	< 0.005	0.46

3.4. 4. Ground Impr Abut 1 (2024) - Mitigated

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	0.75	0.75	3.89	39.5	0.07	0.15	—	0.15	0.15	—	0.15	—	7,877	7,877	0.32	0.06	—	7,904
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.03	0.16	1.62	< 0.005	0.01	—	0.01	0.01	—	0.01	—	324	324	0.01	< 0.005	—	325
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.03	0.30	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	53.6	53.6	< 0.005	< 0.005	—	53.8
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	10.4	10.4	< 0.005	< 0.005	< 0.005	10.9
Hauling	0.03	0.02	0.43	0.29	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	63.9	63.9	0.01	0.01	< 0.005	67.3
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.42	0.42	< 0.005	< 0.005	< 0.005	0.45
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.61	2.61	< 0.005	< 0.005	< 0.005	2.75
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.07	0.07	< 0.005	< 0.005	< 0.005	0.07
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.43	0.43	< 0.005	< 0.005	< 0.005	0.46

3.5. 6. Embankment Grading (Abut 1) (2024) - 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	1.84	1.54	14.0	13.6	0.02	0.63	—	0.63	0.58	—	0.58	—	2,162	2,162	0.09	0.02	—	2,170

Dust From Material Movement	—	—	—	—	—	—	6.55	6.55	—	3.37	3.37	—	—	—	—	—	—	—
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	0.19	0.19	< 0.005	0.01	—	0.01	0.01	—	0.01	—	29.6	29.6	< 0.005	< 0.005	—	29.7
Dust From Material Movement	—	—	—	—	—	—	0.09	0.09	—	0.05	0.05	—	—	—	—	—	—	—
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.90	4.90	< 0.005	< 0.005	—	4.92
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.05	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.92	6.92	< 0.005	< 0.005	< 0.005	7.26
Hauling	< 0.005	< 0.005	0.07	0.04	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.83	9.83	< 0.005	< 0.005	< 0.005	10.3

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.09	0.09	< 0.005	< 0.005	< 0.005	0.10
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.13	0.13	< 0.005	< 0.005	< 0.005	0.14
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02

3.6. 6. Embankment Grading (Abut 1) (2024) - Mitigated

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	0.22	0.22	2.25	12.2	0.02	0.04	—	0.04	0.04	—	0.04	—	2,162	2,162	0.09	0.02	—	2,170
Dust From Material Movement	—	—	—	—	—	—	6.55	6.55	—	3.37	3.37	—	—	—	—	—	—	—
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	0.17	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	29.6	29.6	< 0.005	< 0.005	—	29.7

Dust From Material Movement	—	—	—	—	—	—	0.09	0.09	—	0.05	0.05	—	—	—	—	—	—	—
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.90	4.90	< 0.005	< 0.005	—	4.92
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.05	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.92	6.92	< 0.005	< 0.005	< 0.005	7.26
Hauling	< 0.005	< 0.005	0.07	0.04	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.83	9.83	< 0.005	< 0.005	< 0.005	10.3
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.09	0.09	< 0.005	< 0.005	< 0.005	0.10
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.13	0.13	< 0.005	< 0.005	< 0.005	0.14
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02

Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02

3.7. 8. Ground Impr Abut 5 (2024) - 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	2.87	2.41	22.5	20.2	0.07	0.86	—	0.86	0.79	—	0.79	—	7,877	7,877	0.32	0.06	—	7,904
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.12	0.10	0.93	0.83	< 0.005	0.04	—	0.04	0.03	—	0.03	—	324	324	0.01	< 0.005	—	325
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.17	0.15	< 0.005	0.01	—	0.01	0.01	—	0.01	—	53.6	53.6	< 0.005	< 0.005	—	53.8

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	10.4	10.4	< 0.005	< 0.005	< 0.005	10.9
Hauling	0.03	0.02	0.43	0.29	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	63.9	63.9	0.01	0.01	< 0.005	67.3
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.42	0.42	< 0.005	< 0.005	< 0.005	0.45
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.61	2.61	< 0.005	< 0.005	< 0.005	2.75
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.07	0.07	< 0.005	< 0.005	< 0.005	0.07
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.43	0.43	< 0.005	< 0.005	< 0.005	0.46

3.8. 8. Ground Impr Abut 5 (2024) - Mitigated

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	0.75	0.75	3.89	39.5	0.07	0.15	—	0.15	0.15	—	0.15	—	7,877	7,877	0.32	0.06	—	7,904
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.03	0.16	1.62	< 0.005	0.01	—	0.01	0.01	—	0.01	—	324	324	0.01	< 0.005	—	325
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.03	0.30	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	53.6	53.6	< 0.005	< 0.005	—	53.8
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	10.4	10.4	< 0.005	< 0.005	< 0.005	10.9
Hauling	0.03	0.02	0.43	0.29	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	63.9	63.9	0.01	0.01	< 0.005	67.3
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.42	0.42	< 0.005	< 0.005	< 0.005	0.45
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.61	2.61	< 0.005	< 0.005	< 0.005	2.75
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.07	0.07	< 0.005	< 0.005	< 0.005	0.07
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.43	0.43	< 0.005	< 0.005	< 0.005	0.46

3.9. 11. Embankment Grading (Abut 5) (2024) - 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	1.84	1.54	14.0	13.6	0.02	0.63	—	0.63	0.58	—	0.58	—	2,162	2,162	0.09	0.02	—	2,170

Dust From Material Movement	—	—	—	—	—	—	6.55	6.55	—	3.37	3.37	—	—	—	—	—	—	—
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	0.19	0.19	< 0.005	0.01	—	0.01	0.01	—	0.01	—	29.6	29.6	< 0.005	< 0.005	—	29.7
Dust From Material Movement	—	—	—	—	—	—	0.09	0.09	—	0.05	0.05	—	—	—	—	—	—	—
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.90	4.90	< 0.005	< 0.005	—	4.92
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.05	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.92	6.92	< 0.005	< 0.005	< 0.005	7.26
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.09	0.09	< 0.005	< 0.005	< 0.005	0.10
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.10. 11. Embankment Grading (Abut 5) (2024) - Mitigated

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	0.22	0.22	2.25	12.2	0.02	0.04	—	0.04	0.04	—	0.04	—	2,162	2,162	0.09	0.02	—	2,170
Dust From Material Movement	—	—	—	—	—	—	6.55	6.55	—	3.37	3.37	—	—	—	—	—	—	—
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	0.17	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	29.6	29.6	< 0.005	< 0.005	—	29.7

Dust From Material Movement	—	—	—	—	—	—	0.09	0.09	—	0.05	0.05	—	—	—	—	—	—	—
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.90	4.90	< 0.005	< 0.005	—	4.92
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.05	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.92	6.92	< 0.005	< 0.005	< 0.005	7.26
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.09	0.09	< 0.005	< 0.005	< 0.005	0.10
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02

Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.11. 1. General Construction (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.56	1.29	11.3	10.3	0.02	0.43	—	0.43	0.40	—	0.40	—	2,091	2,091	0.08	0.02	—	2,098
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.56	1.29	11.3	10.3	0.02	0.43	—	0.43	0.40	—	0.40	—	2,091	2,091	0.08	0.02	—	2,098
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	1.02	0.85	7.40	6.73	0.01	0.28	—	0.28	0.26	—	0.26	—	1,369	1,369	0.06	0.01	—	1,374
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	0.19	0.15	1.35	1.23	< 0.005	0.05	—	0.05	0.05	—	0.05	—	227	227	0.01	< 0.005	—	227
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.12. 1. General Construction (2024) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	0.67	0.59	6.32	11.9	0.02	0.16	—	0.16	0.15	—	0.15	—	2,091	2,091	0.08	0.02	—	2,098
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.67	0.59	6.32	11.9	0.02	0.16	—	0.16	0.15	—	0.15	—	2,091	2,091	0.08	0.02	—	2,098
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	0.44	0.39	4.14	7.77	0.01	0.11	—	0.11	0.10	—	0.10	—	1,369	1,369	0.06	0.01	—	1,374
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	0.08	0.07	0.75	1.42	< 0.005	0.02	—	0.02	0.02	—	0.02	—	227	227	0.01	< 0.005	—	227
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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

3.13. 3. CIDH Piles (Pier 2, 3, 4) (2024) - 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	1.63	1.37	11.6	12.2	0.04	0.48	—	0.48	0.44	—	0.44	—	4,106	4,106	0.17	0.03	—	4,120
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	0.13	0.11	0.95	1.00	< 0.005	0.04	—	0.04	0.04	—	0.04	—	337	337	0.01	< 0.005	—	339

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	0.02	0.02	0.17	0.18	< 0.005	0.01	—	0.01	0.01	—	0.01	—	55.9	55.9	< 0.005	< 0.005	—	56.1
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.27	0.16	3.86	2.76	< 0.005	< 0.005	0.05	0.06	< 0.005	0.01	0.02	—	585	585	0.10	0.09	0.01	614
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.02	0.01	0.31	0.22	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	47.9	47.9	0.01	0.01	0.02	50.3
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.06	0.04	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	7.93	7.93	< 0.005	< 0.005	< 0.005	8.32
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

3.14. 3. CIDH Piles (Pier 2, 3, 4) (2024) - Mitigated

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	0.72	0.66	4.28	21.4	0.04	0.17	—	0.17	0.16	—	0.16	—	4,106	4,106	0.17	0.03	—	4,120
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	0.06	0.05	0.35	1.76	< 0.005	0.01	—	0.01	0.01	—	0.01	—	337	337	0.01	< 0.005	—	339
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	0.32	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	55.9	55.9	< 0.005	< 0.005	—	56.1
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.27	0.16	3.86	2.76	< 0.005	< 0.005	0.05	0.06	< 0.005	0.01	0.02	—	585	585	0.10	0.09	0.01	614
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.02	0.01	0.31	0.22	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	47.9	47.9	0.01	0.01	0.02	50.3
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.06	0.04	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	7.93	7.93	< 0.005	< 0.005	< 0.005	8.32
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

3.15. 5. Column Form, Rebar, Pour (Pier 2, 3, 4) (2024) - 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	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
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	0.33	0.26	< 0.005	0.01	—	0.01	0.01	—	0.01	—	81.4	81.4	< 0.005	< 0.005	—	81.7
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	—	13.5	13.5	< 0.005	< 0.005	—	13.5
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.09	0.06	1.32	0.95	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	201	201	0.03	0.03	< 0.005	211
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	< 0.005	0.11	0.08	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	16.4	16.4	< 0.005	< 0.005	0.01	17.2
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.72	2.72	< 0.005	< 0.005	< 0.005	2.86
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

3.16. 5. Column Form, Rebar, Pour (Pier 2, 3, 4) (2024) - Mitigated

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	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994
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	0.04	0.40	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	81.4	81.4	< 0.005	< 0.005	—	81.7
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	0.07	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	13.5	13.5	< 0.005	< 0.005	—	13.5
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.09	0.06	1.32	0.95	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	201	201	0.03	0.03	< 0.005	211
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	< 0.005	0.11	0.08	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	16.4	16.4	< 0.005	< 0.005	0.01	17.2
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.72	2.72	< 0.005	< 0.005	< 0.005	2.86
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

3.17. 9. Cap Falsework (Pier 2, 3, 4) (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.61	0.52	5.43	5.55	0.01	0.21	—	0.21	0.20	—	0.20	—	1,372	1,372	0.06	0.01	—	1,377
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.61	0.52	5.43	5.55	0.01	0.21	—	0.21	0.20	—	0.20	—	1,372	1,372	0.06	0.01	—	1,377
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	0.05	0.04	0.45	0.46	< 0.005	0.02	—	0.02	0.02	—	0.02	—	113	113	< 0.005	< 0.005	—	113

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	0.08	0.08	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	18.7	18.7	< 0.005	< 0.005	—	18.7
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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

3.18. 9. Cap Falsework (Pier 2, 3, 4) (2024) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.13	0.13	0.68	7.59	0.01	0.03	—	0.03	0.03	—	0.03	—	1,372	1,372	0.06	0.01	—	1,377
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.13	0.13	0.68	7.59	0.01	0.03	—	0.03	0.03	—	0.03	—	1,372	1,372	0.06	0.01	—	1,377
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	0.06	0.62	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	113	113	< 0.005	< 0.005	—	113
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	0.11	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	18.7	18.7	< 0.005	< 0.005	—	18.7
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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

3.19. 10. Cap Form, Rebar, Pour (Pier 2, 3, 4) (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
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	0.05	0.04	0.38	0.30	< 0.005	0.02	—	0.02	0.01	—	0.01	—	95.0	95.0	< 0.005	< 0.005	—	95.3
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	—	15.7	15.7	< 0.005	< 0.005	—	15.8
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.28	0.89	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	199	199	0.03	0.03	0.19	209
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Vendor	0.09	0.06	1.32	0.95	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	201	201	0.03	0.03	< 0.005	211
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	0.01	0.12	0.09	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	19.2	19.2	< 0.005	< 0.005	0.01	20.1
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.17	3.17	< 0.005	< 0.005	< 0.005	3.33
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

3.20. 10. Cap Form, Rebar, Pour (Pier 2, 3, 4) (2024) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994
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	0.05	0.47	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	95.0	95.0	< 0.005	< 0.005	—	95.3
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	0.09	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	15.7	15.7	< 0.005	< 0.005	—	15.8
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.28	0.89	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	199	199	0.03	0.03	0.19	209
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.09	0.06	1.32	0.95	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	201	201	0.03	0.03	< 0.005	211
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	0.01	0.12	0.09	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	19.2	19.2	< 0.005	< 0.005	0.01	20.1
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.17	3.17	< 0.005	< 0.005	< 0.005	3.33
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

3.21. 13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck) (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.14	0.12	1.21	0.95	< 0.005	0.05	—	0.05	0.04	—	0.04	—	298	298	0.01	< 0.005	—	299
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	0.03	0.02	0.22	0.17	< 0.005	0.01	—	0.01	0.01	—	0.01	—	49.4	49.4	< 0.005	< 0.005	—	49.6
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.28	0.89	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	199	199	0.03	0.03	0.19	209
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.03	0.02	0.39	0.28	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	60.3	60.3	0.01	0.01	0.02	63.2
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.98	9.98	< 0.005	< 0.005	< 0.005	10.5
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.22. 13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck) (2024) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.03	0.15	1.47	< 0.005	0.01	—	0.01	0.01	—	0.01	—	298	298	0.01	< 0.005	—	299
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	0.03	0.27	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	49.4	49.4	< 0.005	< 0.005	—	49.6
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.28	0.89	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	199	199	0.03	0.03	0.19	209
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.03	0.02	0.39	0.28	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	60.3	60.3	0.01	0.01	0.02	63.2
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.98	9.98	< 0.005	< 0.005	< 0.005	10.5
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.23. 14. Erect Precast Girders (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.61	0.52	5.43	5.55	0.01	0.21	—	0.21	0.20	—	0.20	—	1,372	1,372	0.06	0.01	—	1,377
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.07	0.08	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	18.8	18.8	< 0.005	< 0.005	—	18.9
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	3.11	3.11	< 0.005	< 0.005	—	3.12
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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

3.24. 14. Erect Precast Girders (2024) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.13	0.13	0.68	7.59	0.01	0.03	—	0.03	0.03	—	0.03	—	1,372	1,372	0.06	0.01	—	1,377
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.10	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	18.8	18.8	< 0.005	< 0.005	—	18.9

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	3.11	3.11	< 0.005	< 0.005	—	3.12
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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

3.25. 15. Cure Deck, Strip Overhangs (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.11	0.09	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	27.1	27.1	< 0.005	< 0.005	—	27.2
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	—	4.49	4.49	< 0.005	< 0.005	—	4.51
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.05	0.03	0.62	0.43	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	96.2	96.2	0.02	0.01	0.09	101
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.64	2.64	< 0.005	< 0.005	< 0.005	2.78
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.44	0.44	< 0.005	< 0.005	< 0.005	0.46
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

3.26. 15. Cure Deck, Strip Overhangs (2024) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.13	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	27.1	27.1	< 0.005	< 0.005	—	27.2
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	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.49	4.49	< 0.005	< 0.005	—	4.51
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.05	0.03	0.62	0.43	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	96.2	96.2	0.02	0.01	0.09	101
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.64	2.64	< 0.005	< 0.005	< 0.005	2.78
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.44	0.44	< 0.005	< 0.005	< 0.005	0.46
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

3.27. 16. Riprap (Abut 1 & 5) (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.40	0.34	2.66	4.15	0.01	0.13	—	0.13	0.12	—	0.12	—	643	643	0.03	0.01	—	645
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.15	0.23	< 0.005	0.01	—	0.01	0.01	—	0.01	—	35.2	35.2	< 0.005	< 0.005	—	35.4
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	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	5.83	5.83	< 0.005	< 0.005	—	5.85
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.01	< 0.005	0.06	0.04	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.73	9.73	< 0.005	< 0.005	0.01	10.3
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	—	0.54	0.54	< 0.005	< 0.005	< 0.005	0.56
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	—	0.09	0.09	< 0.005	< 0.005	< 0.005	0.09

3.28. 16. Riprap (Abut 1 & 5) (2024) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.07	0.07	0.91	4.51	0.01	0.01	—	0.01	0.01	—	0.01	—	643	643	0.03	0.01	—	645
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.05	0.25	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	35.2	35.2	< 0.005	< 0.005	—	35.4
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	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	5.83	5.83	< 0.005	< 0.005	—	5.85

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.01	< 0.005	0.06	0.04	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.73	9.73	< 0.005	< 0.005	0.01	10.3
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	—	0.54	0.54	< 0.005	< 0.005	< 0.005	0.56
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	—	0.09	0.09	< 0.005	< 0.005	< 0.005	0.09

3.29. 17. Sidewalk Barrier Install, Deck Grind (2024) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.47	0.39	4.00	3.15	0.01	0.16	—	0.16	0.15	—	0.15	—	990	990	0.04	0.01	—	994
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	0.16	0.13	< 0.005	0.01	—	0.01	0.01	—	0.01	—	40.7	40.7	< 0.005	< 0.005	—	40.8
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	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	6.74	6.74	< 0.005	< 0.005	—	6.76
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.05	0.03	0.62	0.43	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	96.2	96.2	0.02	0.01	0.09	101
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Vendor	0.05	0.03	0.64	0.46	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	96.9	96.9	0.02	0.01	< 0.005	102
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.97	3.97	< 0.005	< 0.005	< 0.005	4.16
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.66	0.66	< 0.005	< 0.005	< 0.005	0.69
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

3.30. 17. Sidewalk Barrier Install, Deck Grind (2024) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994
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	0.02	0.20	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	40.7	40.7	< 0.005	< 0.005	—	40.8
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	< 0.005	< 0.005	< 0.005	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	6.74	6.74	< 0.005	< 0.005	—	6.76
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.05	0.03	0.62	0.43	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	96.2	96.2	0.02	0.01	0.09	101
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.05	0.03	0.64	0.46	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	96.9	96.9	0.02	0.01	< 0.005	102
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.97	3.97	< 0.005	< 0.005	< 0.005	4.16
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.66	0.66	< 0.005	< 0.005	< 0.005	0.69
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

3.31. 7. Exc Abut 1 (2024) - 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	0.40	0.34	2.66	4.15	0.01	0.13	—	0.13	0.12	—	0.12	—	643	643	0.03	0.01	—	645
Dust From Material Movement	—	—	—	—	—	—	0.03	0.03	—	< 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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	< 0.005	0.04	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.81	8.81	< 0.005	< 0.005	—	8.84
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.46	1.46	< 0.005	< 0.005	—	1.46
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.48	1.06	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	225	225	0.04	0.03	0.01	236
Hauling	0.01	< 0.005	0.10	0.07	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	14.7	14.7	< 0.005	< 0.005	< 0.005	15.5
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.07	3.07	< 0.005	< 0.005	< 0.005	3.22
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.20	0.20	< 0.005	< 0.005	< 0.005	0.21
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.51	0.51	< 0.005	< 0.005	< 0.005	0.53
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.03	0.03	< 0.005	< 0.005	< 0.005	0.04

3.32. 7. Exc Abut 1 (2024) - Mitigated

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	0.07	0.07	0.91	4.51	0.01	0.01	—	0.01	0.01	—	0.01	—	643	643	0.03	0.01	—	645
Dust From Material Movement	—	—	—	—	—	—	0.03	0.03	—	< 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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.81	8.81	< 0.005	< 0.005	—	8.84
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.46	1.46	< 0.005	< 0.005	—	1.46
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.48	1.06	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	225	225	0.04	0.03	0.01	236
Hauling	0.01	< 0.005	0.10	0.07	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	14.7	14.7	< 0.005	< 0.005	< 0.005	15.5
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.07	3.07	< 0.005	< 0.005	< 0.005	3.22
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.20	0.20	< 0.005	< 0.005	< 0.005	0.21
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.51	0.51	< 0.005	< 0.005	< 0.005	0.53
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.03	0.03	< 0.005	< 0.005	< 0.005	0.04

3.33. 12. Exc Abut 5 (2024) - 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	0.40	0.34	2.66	4.15	0.01	0.13	—	0.13	0.12	—	0.12	—	643	643	0.03	0.01	—	645

Dust From Material Movement	—	—	—	—	—	—	0.03	0.03	—	< 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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	< 0.005	0.04	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.81	8.81	< 0.005	< 0.005	—	8.84
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.46	1.46	< 0.005	< 0.005	—	1.46
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.48	1.06	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	225	225	0.04	0.03	0.01	236
Hauling	0.01	< 0.005	0.10	0.07	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	14.7	14.7	< 0.005	< 0.005	< 0.005	15.5

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.07	3.07	< 0.005	< 0.005	< 0.005	3.22
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.20	0.20	< 0.005	< 0.005	< 0.005	0.21
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.51	0.51	< 0.005	< 0.005	< 0.005	0.53
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.03	0.03	< 0.005	< 0.005	< 0.005	0.04

3.34. 12. Exc Abut 5 (2024) - Mitigated

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	0.07	0.07	0.91	4.51	0.01	0.01	—	0.01	0.01	—	0.01	—	643	643	0.03	0.01	—	645
Dust From Material Movement	—	—	—	—	—	—	0.03	0.03	—	< 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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.81	8.81	< 0.005	< 0.005	—	8.84

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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.46	1.46	< 0.005	< 0.005	—	1.46
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.48	1.06	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	225	225	0.04	0.03	0.01	236
Hauling	0.01	< 0.005	0.10	0.07	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	14.7	14.7	< 0.005	< 0.005	< 0.005	15.5
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.07	3.07	< 0.005	< 0.005	< 0.005	3.22
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.20	0.20	< 0.005	< 0.005	< 0.005	0.21
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.51	0.51	< 0.005	< 0.005	< 0.005	0.53

Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.03	0.03	< 0.005	< 0.005	< 0.005	0.04

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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

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

4.10.4. Soil Carbon Accumulation By Vegetation Type - Mitigated

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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

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

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

Land Use	TOG	ROG	NOx	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.6. Avoided and Sequestered Emissions by Species - Mitigated

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

5.1. Construction Schedule

Phase Name	Phase Type	Start Date	End Date	Days Per Week	Work Days per Phase	Phase Description
2. ESA Fencing; Clear & Grub; Mob	Site Preparation	1/1/2024	1/19/2024	5.00	15.0	—

4. Ground Impr Abut 1	Grading	1/22/2024	2/9/2024	5.00	15.0	—
6. Embankment Grading (Abut 1)	Grading	2/12/2024	2/16/2024	5.00	5.00	—
8. Ground Impr Abut 5	Grading	2/19/2024	3/8/2024	5.00	15.0	—
11. Embankment Grading (Abut 5)	Grading	3/11/2024	3/15/2024	5.00	5.00	—
1. General Construction	Building Construction	1/1/2024	11/28/2024	5.00	239	—
3. CIDH Piles (Pier 2, 3, 4)	Building Construction	1/22/2024	3/1/2024	5.00	30.0	—
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Building Construction	2/12/2024	3/22/2024	5.00	30.0	—
9. Cap Falsework (Pier 2, 3, 4)	Building Construction	2/26/2024	4/5/2024	5.00	30.0	—
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Building Construction	3/11/2024	4/26/2024	5.00	35.0	—
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Building Construction	4/1/2024	8/30/2024	5.00	110	—
14. Erect Precast Girders	Building Construction	6/10/2024	6/14/2024	5.00	5.00	—
15. Cure Deck, Strip Overhangs	Building Construction	9/2/2024	9/13/2024	5.00	10.0	—
16. Riprap (Abut 1 & 5)	Building Construction	9/2/2024	9/27/2024	5.00	20.0	—
17. Sidewalk Barrier Install, Deck Grind	Building Construction	9/16/2024	10/4/2024	5.00	15.0	—
7. Exc Abut 1	Trenching	2/19/2024	2/23/2024	5.00	5.00	—
12. Exc Abut 5	Trenching	3/18/2024	3/22/2024	5.00	5.00	—

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

2. ESA Fencing; Clear & Grub; Mob	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
2. ESA Fencing; Clear & Grub; Mob	Graders	Diesel	Average	1.00	8.00	148	0.41
2. ESA Fencing; Clear & Grub; Mob	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
2. ESA Fencing; Clear & Grub; Mob	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
2. ESA Fencing; Clear & Grub; Mob	Scrapers	Diesel	Average	1.00	8.00	423	0.48
2. ESA Fencing; Clear & Grub; Mob	Other Construction Equipment	Diesel	Average	1.00	8.00	170	0.42
4. Ground Impr Abut 1	Cranes	Diesel	Average	1.00	10.0	360	0.29
4. Ground Impr Abut 1	Bore/Drill Rigs	Diesel	Average	1.00	10.0	300	0.50
4. Ground Impr Abut 1	Other Construction Equipment	Diesel	Average	1.00	10.0	450	0.42
4. Ground Impr Abut 1	Other Construction Equipment	Diesel	Average	1.00	10.0	350	0.42
4. Ground Impr Abut 1	Forklifts	Diesel	Average	1.00	10.0	125	0.20
4. Ground Impr Abut 1	Rubber Tired Loaders	Diesel	Average	1.00	10.0	175	0.36
6. Embankment Grading (Abut 1)	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
6. Embankment Grading (Abut 1)	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
6. Embankment Grading (Abut 1)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
6. Embankment Grading (Abut 1)	Rollers	Diesel	Average	1.00	8.00	36.0	0.38
8. Ground Impr Abut 5	Cranes	Diesel	Average	1.00	10.0	360	0.29
8. Ground Impr Abut 5	Bore/Drill Rigs	Diesel	Average	1.00	10.0	300	0.50
8. Ground Impr Abut 5	Other Construction Equipment	Diesel	Average	1.00	10.0	450	0.42

8. Ground Impr Abut 5	Other Construction Equipment	Diesel	Average	1.00	10.0	350	0.42
8. Ground Impr Abut 5	Forklifts	Diesel	Average	1.00	10.0	125	0.20
8. Ground Impr Abut 5	Rubber Tired Loaders	Diesel	Average	1.00	10.0	175	0.36
11. Embankment Grading (Abut 5)	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
11. Embankment Grading (Abut 5)	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
11. Embankment Grading (Abut 5)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
11. Embankment Grading (Abut 5)	Rollers	Diesel	Average	1.00	8.00	36.0	0.38
1. General Construction	Aerial Lifts	Diesel	Average	1.00	8.00	46.0	0.31
1. General Construction	Air Compressors	Diesel	Average	1.00	8.00	37.0	0.48
1. General Construction	Cranes	Diesel	Average	1.00	8.00	367	0.29
1. General Construction	Forklifts	Diesel	Average	1.00	8.00	82.0	0.20
1. General Construction	Generator Sets	Diesel	Average	4.00	8.00	14.0	0.74
1. General Construction	Welders	Diesel	Average	1.00	8.00	46.0	0.45
3. CIDH Piles (Pier 2, 3, 4)	Bore/Drill Rigs	Diesel	Average	1.00	8.00	500	0.50
3. CIDH Piles (Pier 2, 3, 4)	Cranes	Diesel	Average	1.00	8.00	367	0.29
3. CIDH Piles (Pier 2, 3, 4)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
3. CIDH Piles (Pier 2, 3, 4)	Generator Sets	Diesel	Average	3.00	8.00	14.0	0.74
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Cranes	Diesel	Average	1.00	8.00	367	0.29
9. Cap Falsework (Pier 2, 3, 4)	Bore/Drill Rigs	Diesel	Average	1.00	8.00	83.0	0.50
9. Cap Falsework (Pier 2, 3, 4)	Cranes	Diesel	Average	1.00	8.00	367	0.29

10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Cranes	Diesel	Average	1.00	8.00	367	0.29
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Cranes	Diesel	Average	1.00	8.00	367	0.29
14. Erect Precast Girders	Bore/Drill Rigs	Diesel	Average	1.00	8.00	83.0	0.50
14. Erect Precast Girders	Cranes	Diesel	Average	1.00	8.00	367	0.29
15. Cure Deck, Strip Overhangs	Cranes	Diesel	Average	1.00	8.00	367	0.29
16. Riprap (Abut 1 & 5)	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
16. Riprap (Abut 1 & 5)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
17. Sidewalk Barrier Install, Deck Grind	Cranes	Diesel	Average	1.00	8.00	367	0.29
7. Exc Abut 1	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
7. Exc Abut 1	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
12. Exc Abut 5	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
12. Exc Abut 5	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36

5.2.2. Mitigated

Phase Name	Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
2. ESA Fencing; Clear & Grub; Mob	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
2. ESA Fencing; Clear & Grub; Mob	Graders	Diesel	Tier 4 Final	1.00	8.00	148	0.41
2. ESA Fencing; Clear & Grub; Mob	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
2. ESA Fencing; Clear & Grub; Mob	Rubber Tired Dozers	Diesel	Tier 4 Final	1.00	8.00	367	0.40

2. ESA Fencing; Clear & Grub; Mob	Scrapers	Diesel	Tier 4 Final	1.00	8.00	423	0.48
2. ESA Fencing; Clear & Grub; Mob	Other Construction Equipment	Diesel	Tier 4 Final	1.00	8.00	170	0.42
4. Ground Impr Abut 1	Cranes	Diesel	Tier 4 Final	1.00	10.0	360	0.29
4. Ground Impr Abut 1	Bore/Drill Rigs	Diesel	Tier 4 Final	1.00	10.0	300	0.50
4. Ground Impr Abut 1	Other Construction Equipment	Diesel	Tier 4 Final	1.00	10.0	450	0.42
4. Ground Impr Abut 1	Other Construction Equipment	Diesel	Tier 4 Final	1.00	10.0	350	0.42
4. Ground Impr Abut 1	Forklifts	Diesel	Tier 4 Final	1.00	10.0	125	0.20
4. Ground Impr Abut 1	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	10.0	175	0.36
6. Embankment Grading (Abut 1)	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
6. Embankment Grading (Abut 1)	Rubber Tired Dozers	Diesel	Tier 4 Final	1.00	8.00	367	0.40
6. Embankment Grading (Abut 1)	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
6. Embankment Grading (Abut 1)	Rollers	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
8. Ground Impr Abut 5	Cranes	Diesel	Tier 4 Final	1.00	10.0	360	0.29
8. Ground Impr Abut 5	Bore/Drill Rigs	Diesel	Tier 4 Final	1.00	10.0	300	0.50
8. Ground Impr Abut 5	Other Construction Equipment	Diesel	Tier 4 Final	1.00	10.0	450	0.42
8. Ground Impr Abut 5	Other Construction Equipment	Diesel	Tier 4 Final	1.00	10.0	350	0.42
8. Ground Impr Abut 5	Forklifts	Diesel	Tier 4 Final	1.00	10.0	125	0.20
8. Ground Impr Abut 5	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	10.0	175	0.36
11. Embankment Grading (Abut 5)	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
11. Embankment Grading (Abut 5)	Rubber Tired Dozers	Diesel	Tier 4 Final	1.00	8.00	367	0.40

11. Embankment Grading (Abut 5)	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
11. Embankment Grading (Abut 5)	Rollers	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
1. General Construction	Aerial Lifts	Diesel	Tier 4 Final	1.00	8.00	46.0	0.31
1. General Construction	Air Compressors	Diesel	Tier 4 Final	1.00	8.00	37.0	0.48
1. General Construction	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
1. General Construction	Forklifts	Diesel	Tier 4 Final	1.00	8.00	82.0	0.20
1. General Construction	Generator Sets	Diesel	Average	4.00	8.00	14.0	0.74
1. General Construction	Welders	Diesel	Tier 4 Final	1.00	8.00	46.0	0.45
3. CIDH Piles (Pier 2, 3, 4)	Bore/Drill Rigs	Diesel	Tier 4 Final	1.00	8.00	500	0.50
3. CIDH Piles (Pier 2, 3, 4)	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
3. CIDH Piles (Pier 2, 3, 4)	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
3. CIDH Piles (Pier 2, 3, 4)	Generator Sets	Diesel	Average	3.00	8.00	14.0	0.74
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
9. Cap Falsework (Pier 2, 3, 4)	Bore/Drill Rigs	Diesel	Tier 4 Final	1.00	8.00	83.0	0.50
9. Cap Falsework (Pier 2, 3, 4)	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
14. Erect Precast Girders	Bore/Drill Rigs	Diesel	Tier 4 Final	1.00	8.00	83.0	0.50

14. Erect Precast Girders	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
15. Cure Deck, Strip Overhangs	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
16. Riprap (Abut 1 & 5)	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
16. Riprap (Abut 1 & 5)	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
17. Sidewalk Barrier Install, Deck Grind	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
7. Exc Abut 1	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
7. Exc Abut 1	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
12. Exc Abut 5	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
12. Exc Abut 5	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
2. ESA Fencing; Clear & Grub; Mob	—	—	—	—
2. ESA Fencing; Clear & Grub; Mob	Worker	0.00	0.00	LDA,LDT1,LDT2
2. ESA Fencing; Clear & Grub; Mob	Vendor	4.00	0.19	HHDT,MHDT
2. ESA Fencing; Clear & Grub; Mob	Hauling	8.00	0.19	HHDT
2. ESA Fencing; Clear & Grub; Mob	Onsite truck	—	—	HHDT
4. Ground Impr Abut 1	—	—	—	—
4. Ground Impr Abut 1	Worker	0.00	0.00	LDA,LDT1,LDT2
4. Ground Impr Abut 1	Vendor	6.00	0.19	HHDT,MHDT
4. Ground Impr Abut 1	Hauling	26.0	0.19	HHDT
4. Ground Impr Abut 1	Onsite truck	—	—	HHDT
6. Embankment Grading (Abut 1)	—	—	—	—

6. Embankment Grading (Abut 1)	Worker	0.00	0.00	LDA,LDT1,LDT2
6. Embankment Grading (Abut 1)	Vendor	4.00	0.19	HHDT,MHDT
6. Embankment Grading (Abut 1)	Hauling	4.00	0.19	HHDT
6. Embankment Grading (Abut 1)	Onsite truck	—	—	HHDT
8. Ground Impr Abut 5	—	—	—	—
8. Ground Impr Abut 5	Worker	0.00	0.00	LDA,LDT1,LDT2
8. Ground Impr Abut 5	Vendor	6.00	0.19	HHDT,MHDT
8. Ground Impr Abut 5	Hauling	26.0	0.19	HHDT
8. Ground Impr Abut 5	Onsite truck	—	—	HHDT
11. Embankment Grading (Abut 5)	—	—	—	—
11. Embankment Grading (Abut 5)	Worker	0.00	0.00	LDA,LDT1,LDT2
11. Embankment Grading (Abut 5)	Vendor	4.00	0.19	HHDT,MHDT
11. Embankment Grading (Abut 5)	Hauling	0.00	0.19	HHDT
11. Embankment Grading (Abut 5)	Onsite truck	—	—	HHDT
1. General Construction	—	—	—	—
1. General Construction	Worker	0.00	0.00	LDA,LDT1,LDT2
1. General Construction	Vendor	0.00	0.19	HHDT,MHDT
1. General Construction	Hauling	0.00	0.19	HHDT
1. General Construction	Onsite truck	—	—	HHDT
3. CIDH Piles (Pier 2, 3, 4)	—	—	—	—
3. CIDH Piles (Pier 2, 3, 4)	Worker	0.00	0.00	LDA,LDT1,LDT2
3. CIDH Piles (Pier 2, 3, 4)	Vendor	338	0.19	HHDT,MHDT
3. CIDH Piles (Pier 2, 3, 4)	Hauling	0.00	0.19	HHDT
3. CIDH Piles (Pier 2, 3, 4)	Onsite truck	0.00	0.00	HHDT
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	—	—	—	—
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Worker	0.00	0.00	LDA,LDT1,LDT2

5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Vendor	116	0.19	HHDT,MHDT
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Hauling	0.00	0.19	HHDT
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Onsite truck	0.00	0.00	HHDT
9. Cap Falsework (Pier 2, 3, 4)	—	—	—	—
9. Cap Falsework (Pier 2, 3, 4)	Worker	0.00	0.00	LDA,LDT1,LDT2
9. Cap Falsework (Pier 2, 3, 4)	Vendor	0.00	0.19	HHDT,MHDT
9. Cap Falsework (Pier 2, 3, 4)	Hauling	0.00	0.19	HHDT
9. Cap Falsework (Pier 2, 3, 4)	Onsite truck	—	—	HHDT
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	—	—	—	—
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Worker	0.00	0.00	LDA,LDT1,LDT2
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Vendor	116	0.19	HHDT,MHDT
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Hauling	0.00	0.19	HHDT
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Onsite truck	0.00	0.00	HHDT
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	—	—	—	—
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Worker	0.00	0.00	LDA,LDT1,LDT2
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Vendor	116	0.19	HHDT,MHDT
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Hauling	0.00	0.19	HHDT
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Onsite truck	0.00	0.00	HHDT
14. Erect Precast Girders	—	—	—	—

14. Erect Precast Girders	Worker	0.00	0.00	LDA,LDT1,LDT2
14. Erect Precast Girders	Vendor	0.00	0.19	HHDT,MHDT
14. Erect Precast Girders	Hauling	0.00	0.19	HHDT
14. Erect Precast Girders	Onsite truck	—	—	HHDT
15. Cure Deck, Strip Overhangs	—	—	—	—
15. Cure Deck, Strip Overhangs	Worker	0.00	0.00	LDA,LDT1,LDT2
15. Cure Deck, Strip Overhangs	Vendor	56.0	0.19	HHDT,MHDT
15. Cure Deck, Strip Overhangs	Hauling	0.00	0.19	HHDT
15. Cure Deck, Strip Overhangs	Onsite truck	0.00	0.00	HHDT
16. Riprap (Abut 1 & 5)	—	—	—	—
16. Riprap (Abut 1 & 5)	Worker	0.00	0.00	LDA,LDT1,LDT2
16. Riprap (Abut 1 & 5)	Vendor	0.00	0.19	HHDT,MHDT
16. Riprap (Abut 1 & 5)	Hauling	4.00	0.19	HHDT
16. Riprap (Abut 1 & 5)	Onsite truck	—	—	HHDT
17. Sidewalk Barrier Install, Deck Grind	—	—	—	—
17. Sidewalk Barrier Install, Deck Grind	Worker	0.00	0.00	LDA,LDT1,LDT2
17. Sidewalk Barrier Install, Deck Grind	Vendor	56.0	0.19	HHDT,MHDT
17. Sidewalk Barrier Install, Deck Grind	Hauling	0.00	0.19	HHDT
17. Sidewalk Barrier Install, Deck Grind	Onsite truck	0.00	0.00	HHDT
7. Exc Abut 1	—	—	—	—
7. Exc Abut 1	Worker	0.00	0.00	LDA,LDT1,LDT2
7. Exc Abut 1	Vendor	130	0.19	HHDT,MHDT
7. Exc Abut 1	Hauling	6.00	0.19	HHDT
7. Exc Abut 1	Onsite truck	0.00	0.00	HHDT
12. Exc Abut 5	—	—	—	—
12. Exc Abut 5	Worker	0.00	0.00	LDA,LDT1,LDT2
12. Exc Abut 5	Vendor	130	0.19	HHDT,MHDT

12. Exc Abut 5	Hauling	6.00	0.19	HHDT
12. Exc Abut 5	Onsite truck	0.00	0.00	HHDT

5.3.2. Mitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
2. ESA Fencing; Clear & Grub; Mob	—	—	—	—
2. ESA Fencing; Clear & Grub; Mob	Worker	0.00	0.00	LDA,LDT1,LDT2
2. ESA Fencing; Clear & Grub; Mob	Vendor	4.00	0.19	HHDT,MHDT
2. ESA Fencing; Clear & Grub; Mob	Hauling	8.00	0.19	HHDT
2. ESA Fencing; Clear & Grub; Mob	Onsite truck	—	—	HHDT
4. Ground Impr Abut 1	—	—	—	—
4. Ground Impr Abut 1	Worker	0.00	0.00	LDA,LDT1,LDT2
4. Ground Impr Abut 1	Vendor	6.00	0.19	HHDT,MHDT
4. Ground Impr Abut 1	Hauling	26.0	0.19	HHDT
4. Ground Impr Abut 1	Onsite truck	—	—	HHDT
6. Embankment Grading (Abut 1)	—	—	—	—
6. Embankment Grading (Abut 1)	Worker	0.00	0.00	LDA,LDT1,LDT2
6. Embankment Grading (Abut 1)	Vendor	4.00	0.19	HHDT,MHDT
6. Embankment Grading (Abut 1)	Hauling	4.00	0.19	HHDT
6. Embankment Grading (Abut 1)	Onsite truck	—	—	HHDT
8. Ground Impr Abut 5	—	—	—	—
8. Ground Impr Abut 5	Worker	0.00	0.00	LDA,LDT1,LDT2
8. Ground Impr Abut 5	Vendor	6.00	0.19	HHDT,MHDT
8. Ground Impr Abut 5	Hauling	26.0	0.19	HHDT
8. Ground Impr Abut 5	Onsite truck	—	—	HHDT
11. Embankment Grading (Abut 5)	—	—	—	—
11. Embankment Grading (Abut 5)	Worker	0.00	0.00	LDA,LDT1,LDT2

11. Embankment Grading (Abut 5)	Vendor	4.00	0.19	HHDT,MHDT
11. Embankment Grading (Abut 5)	Hauling	0.00	0.19	HHDT
11. Embankment Grading (Abut 5)	Onsite truck	—	—	HHDT
1. General Construction	—	—	—	—
1. General Construction	Worker	0.00	0.00	LDA,LDT1,LDT2
1. General Construction	Vendor	0.00	0.19	HHDT,MHDT
1. General Construction	Hauling	0.00	0.19	HHDT
1. General Construction	Onsite truck	—	—	HHDT
3. CIDH Piles (Pier 2, 3, 4)	—	—	—	—
3. CIDH Piles (Pier 2, 3, 4)	Worker	0.00	0.00	LDA,LDT1,LDT2
3. CIDH Piles (Pier 2, 3, 4)	Vendor	338	0.19	HHDT,MHDT
3. CIDH Piles (Pier 2, 3, 4)	Hauling	0.00	0.19	HHDT
3. CIDH Piles (Pier 2, 3, 4)	Onsite truck	0.00	0.00	HHDT
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	—	—	—	—
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Worker	0.00	0.00	LDA,LDT1,LDT2
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Vendor	116	0.19	HHDT,MHDT
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Hauling	0.00	0.19	HHDT
5. Column Form, Rebar, Pour (Pier 2, 3, 4)	Onsite truck	0.00	0.00	HHDT
9. Cap Falsework (Pier 2, 3, 4)	—	—	—	—
9. Cap Falsework (Pier 2, 3, 4)	Worker	0.00	0.00	LDA,LDT1,LDT2
9. Cap Falsework (Pier 2, 3, 4)	Vendor	0.00	0.19	HHDT,MHDT
9. Cap Falsework (Pier 2, 3, 4)	Hauling	0.00	0.19	HHDT
9. Cap Falsework (Pier 2, 3, 4)	Onsite truck	—	—	HHDT
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	—	—	—	—

10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Worker	0.00	0.00	LDA,LDT1,LDT2
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Vendor	116	0.19	HHDT,MHDT
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Hauling	0.00	0.19	HHDT
10. Cap Form, Rebar, Pour (Pier 2, 3, 4)	Onsite truck	0.00	0.00	HHDT
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	—	—	—	—
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Worker	0.00	0.00	LDA,LDT1,LDT2
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Vendor	116	0.19	HHDT,MHDT
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Hauling	0.00	0.19	HHDT
13. Form, Rebar, Pour (Abut 1 & 5 Ftg, Stem, Walls, and diaphragms & deck)	Onsite truck	0.00	0.00	HHDT
14. Erect Precast Girders	—	—	—	—
14. Erect Precast Girders	Worker	0.00	0.00	LDA,LDT1,LDT2
14. Erect Precast Girders	Vendor	0.00	0.19	HHDT,MHDT
14. Erect Precast Girders	Hauling	0.00	0.19	HHDT
14. Erect Precast Girders	Onsite truck	—	—	HHDT
15. Cure Deck, Strip Overhangs	—	—	—	—
15. Cure Deck, Strip Overhangs	Worker	0.00	0.00	LDA,LDT1,LDT2
15. Cure Deck, Strip Overhangs	Vendor	56.0	0.19	HHDT,MHDT
15. Cure Deck, Strip Overhangs	Hauling	0.00	0.19	HHDT
15. Cure Deck, Strip Overhangs	Onsite truck	0.00	0.00	HHDT
16. Riprap (Abut 1 & 5)	—	—	—	—
16. Riprap (Abut 1 & 5)	Worker	0.00	0.00	LDA,LDT1,LDT2
16. Riprap (Abut 1 & 5)	Vendor	0.00	0.19	HHDT,MHDT

16. Riprap (Abut 1 & 5)	Hauling	4.00	0.19	HHDT
16. Riprap (Abut 1 & 5)	Onsite truck	—	—	HHDT
17. Sidewalk Barrier Install, Deck Grind	—	—	—	—
17. Sidewalk Barrier Install, Deck Grind	Worker	0.00	0.00	LDA,LDT1,LDT2
17. Sidewalk Barrier Install, Deck Grind	Vendor	56.0	0.19	HHDT,MHDT
17. Sidewalk Barrier Install, Deck Grind	Hauling	0.00	0.19	HHDT
17. Sidewalk Barrier Install, Deck Grind	Onsite truck	0.00	0.00	HHDT
7. Exc Abut 1	—	—	—	—
7. Exc Abut 1	Worker	0.00	0.00	LDA,LDT1,LDT2
7. Exc Abut 1	Vendor	130	0.19	HHDT,MHDT
7. Exc Abut 1	Hauling	6.00	0.19	HHDT
7. Exc Abut 1	Onsite truck	0.00	0.00	HHDT
12. Exc Abut 5	—	—	—	—
12. Exc Abut 5	Worker	0.00	0.00	LDA,LDT1,LDT2
12. Exc Abut 5	Vendor	130	0.19	HHDT,MHDT
12. Exc Abut 5	Hauling	6.00	0.19	HHDT
12. Exc Abut 5	Onsite truck	0.00	0.00	HHDT

5.4. Vehicles

5.4.1. Construction Vehicle Control Strategies

Non-applicable. No control strategies activated by user.

5.5. Architectural Coatings

Phase Name	Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)

5.6. Dust Mitigation

5.6.1. Construction Earthmoving Activities

Phase Name	Material Imported (cy)	Material Exported (cy)	Acres Graded (acres)	Material Demolished (sq. ft.)	Acres Paved (acres)
2. ESA Fencing; Clear & Grub; Mob	—	—	30.0	0.00	—
4. Ground Impr Abut 1	—	500	0.00	0.00	—
6. Embankment Grading (Abut 1)	—	—	2.50	0.00	—
8. Ground Impr Abut 5	—	500	0.00	0.00	—
11. Embankment Grading (Abut 5)	—	—	2.50	0.00	—
7. Exc Abut 1	1,500	1,500	0.00	0.00	—
12. Exc Abut 5	1,500	1,500	0.00	0.00	—

5.6.2. Construction Earthmoving Control Strategies

Non-applicable. No control strategies activated by user.

5.7. Construction Paving

Land Use	Area Paved (acres)	% Asphalt
User Defined Industrial	0.00	0%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2024	0.00	589	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

5.18.1.2. Mitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.1.2. Mitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

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

5.18.2.2. Mitigated

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

6. Climate Risk Detailed Report

6.1. Climate Risk Summary

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

Climate Hazard	Result for Project Location	Unit
Temperature and Extreme Heat	7.50	annual days of extreme heat
Extreme Precipitation	2.70	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	3.64	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (Radke et al., 2017, CEC-500-2017-008), and consider inundation location and depth for the San Francisco Bay, the Sacramento-San Joaquin River Delta and California coast resulting different increments of sea level rise coupled with extreme storm events. Users may select from four scenarios to view the range in potential inundation depth for the grid cell. The four scenarios are: No rise, 0.5 meter, 1.0 meter, 1.41 meters
Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

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

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

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

6.3. Adjusted Climate Risk Scores

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

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores 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	37.6
AQ-PM	44.5
AQ-DPM	45.5

Drinking Water	29.0
Lead Risk Housing	21.4
Pesticides	0.00
Toxic Releases	35.8
Traffic	55.5
Effect Indicators	—
CleanUp Sites	33.9
Groundwater	64.5
Haz Waste Facilities/Generators	87.7
Impaired Water Bodies	72.2
Solid Waste	0.00
Sensitive Population	—
Asthma	27.1
Cardio-vascular	4.32
Low Birth Weights	20.9
Socioeconomic Factor Indicators	—
Education	16.8
Housing	30.2
Linguistic	22.2
Poverty	15.6
Unemployment	72.5

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	58.91184396

Employed	48.77454125
Median HI	71.4744001
Education	—
Bachelor's or higher	75.77312973
High school enrollment	100
Preschool enrollment	88.27152573
Transportation	—
Auto Access	26.42114718
Active commuting	41.99923008
Social	—
2-parent households	74.72090337
Voting	67.3681509
Neighborhood	—
Alcohol availability	81.09842166
Park access	81.35506224
Retail density	19.41485949
Supermarket access	2.399589375
Tree canopy	35.94251251
Housing	—
Homeownership	34.7747979
Housing habitability	66.35442063
Low-inc homeowner severe housing cost burden	65.0455537
Low-inc renter severe housing cost burden	68.13807263
Uncrowded housing	60.05389452
Health Outcomes	—
Insured adults	71.87219299
Arthritis	89.2

Asthma ER Admissions	73.3
High Blood Pressure	94.0
Cancer (excluding skin)	55.0
Asthma	72.9
Coronary Heart Disease	88.8
Chronic Obstructive Pulmonary Disease	86.1
Diagnosed Diabetes	92.6
Life Expectancy at Birth	51.7
Cognitively Disabled	36.6
Physically Disabled	77.4
Heart Attack ER Admissions	89.3
Mental Health Not Good	69.9
Chronic Kidney Disease	90.3
Obesity	79.9
Pedestrian Injuries	19.6
Physical Health Not Good	90.6
Stroke	88.3
Health Risk Behaviors	—
Binge Drinking	2.4
Current Smoker	68.2
No Leisure Time for Physical Activity	83.8
Climate Change Exposures	—
Wildfire Risk	57.5
SLR Inundation Area	0.0
Children	87.0
Elderly	73.1
English Speaking	54.0

Foreign-born	27.7
Outdoor Workers	56.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	31.6
Traffic Density	37.9
Traffic Access	48.8
Other Indices	—
Hardship	21.0
Other Decision Support	—
2016 Voting	74.1

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	19.0
Healthy Places Index Score for Project Location (b)	70.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
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	Project footprint estimated to be approx 1.5 acres.
Construction: Construction Phases	Construction assumptions provided by project engineers.
Construction: Off-Road Equipment	Construction assumptions provided by project engineers.
Construction: Dust From Material Movement	Construction assumptions provided by project engineers.
Construction: Trips and VMT	Construction assumptions provided by project engineers. Length of trips adjusted for HRA run (1,000 feet of project boundary).

Fenton Construction Phase 2_HRA Detailed Report

Off-Site Improvements

Table of Contents

8. User Changes to Default Data

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Fenton Construction Phase 2_HRA
Construction Start Date	10/7/2024
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	2.50
Precipitation (days)	19.8
Location	Fenton Pkwy, San Diego, CA 92108, USA
County	San Diego
City	San Diego
Air District	San Diego County APCD
Air Basin	San Diego
TAZ	6340
EDFZ	12
Electric Utility	San Diego Gas & Electric
Gas Utility	San Diego Gas & Electric
App Version	2022.1.1.21

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
Road Construction	0.10	Mile	0.15	0.00	—	—	—	—

Other Non-Asphalt Surfaces	0.15	Acre	0.15	0.00	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

Sector	#	Measure Title
Construction	C-5	Use Advanced Engine Tiers

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.	4.94	3.66	47.2	36.0	0.13	1.63	6.15	7.77	1.51	1.15	2.66	—	17,967	17,967	0.88	1.89	0.64	18,553
Mit.	1.52	0.89	22.1	43.1	0.13	0.33	6.15	6.47	0.33	1.15	1.48	—	17,967	17,967	0.88	1.89	0.64	18,553
% Reduced	69%	76%	53%	-20%	—	80%	—	17%	78%	—	45%	—	—	—	—	—	—	—
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.29	0.23	2.54	2.16	0.01	0.10	0.29	0.38	0.09	0.05	0.14	—	803	803	0.04	0.06	0.36	824
Mit.	0.08	0.06	0.95	2.60	0.01	0.02	0.29	0.31	0.02	0.05	0.06	—	803	803	0.04	0.06	0.36	824
% Reduced	73%	73%	62%	-21%	—	82%	—	20%	81%	—	53%	—	—	—	—	—	—	—
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.05	0.04	0.46	0.39	< 0.005	0.02	0.05	0.07	0.02	0.01	0.02	—	133	133	0.01	0.01	0.06	136

Mit.	0.01	0.01	0.17	0.48	< 0.005	< 0.005	0.05	0.06	< 0.005	0.01	0.01	—	133	133	0.01	0.01	0.06	136
% Reduced	73%	73%	62%	-21%	—	82%	—	20%	81%	—	53%	—	—	—	—	—	—	—

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	4.94	3.66	47.2	36.0	0.13	1.63	6.15	7.77	1.51	1.15	2.66	—	17,967	17,967	0.88	1.89	0.64	18,553
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	0.29	0.23	2.54	2.16	0.01	0.10	0.29	0.38	0.09	0.05	0.14	—	803	803	0.04	0.06	0.36	824
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	0.05	0.04	0.46	0.39	< 0.005	0.02	0.05	0.07	0.02	0.01	0.02	—	133	133	0.01	0.01	0.06	136

2.3. Construction Emissions by Year, Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	1.52	0.89	22.1	43.1	0.13	0.33	6.15	6.47	0.33	1.15	1.48	—	17,967	17,967	0.88	1.89	0.64	18,553

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	0.08	0.06	0.95	2.60	0.01	0.02	0.29	0.31	0.02	0.05	0.06	—	803	803	0.04	0.06	0.36	824
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	0.01	0.01	0.17	0.48	< 0.005	< 0.005	0.05	0.06	< 0.005	0.01	0.01	—	133	133	0.01	0.01	0.06	136

3. Construction Emissions Details

3.1. Linear, Grubbing & Land Clearing (2024) - 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	0.51	0.43	3.69	3.52	< 0.005	0.24	—	0.24	0.23	—	0.23	—	491	491	0.02	< 0.005	—	492
Dust From Material Movement	—	—	—	—	—	—	0.53	0.53	—	0.06	0.06	—	—	—	—	—	—	—
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	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	6.72	6.72	< 0.005	< 0.005	—	6.74

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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.11	1.11	< 0.005	< 0.005	—	1.12
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	51.0	51.0	< 0.005	0.01	< 0.005	53.1
Hauling	0.04	0.01	0.65	0.23	< 0.005	0.01	0.12	0.13	0.01	0.03	0.04	—	470	470	0.03	0.08	0.03	493
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.70	0.70	< 0.005	< 0.005	< 0.005	0.73
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.43	6.43	< 0.005	< 0.005	0.01	6.75
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.12	0.12	< 0.005	< 0.005	< 0.005	0.12

Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.06	1.06	< 0.005	< 0.005	< 0.005	1.12

3.2. Linear, Grubbing & Land Clearing (2024) - Mitigated

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	0.05	0.05	0.84	3.43	< 0.005	0.01	—	0.01	0.01	—	0.01	—	491	491	0.02	< 0.005	—	492
Dust From Material Movement	—	—	—	—	—	—	0.53	0.53	—	0.06	0.06	—	—	—	—	—	—	—
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	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	6.72	6.72	< 0.005	< 0.005	—	6.74
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.11	1.11	< 0.005	< 0.005	—	1.12

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	51.0	51.0	< 0.005	0.01	< 0.005	53.1
Hauling	0.04	0.01	0.65	0.23	< 0.005	0.01	0.12	0.13	0.01	0.03	0.04	—	470	470	0.03	0.08	0.03	493
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.70	0.70	< 0.005	< 0.005	< 0.005	0.73
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.43	6.43	< 0.005	< 0.005	0.01	6.75
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.12	0.12	< 0.005	< 0.005	< 0.005	0.12
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.06	1.06	< 0.005	< 0.005	< 0.005	1.12

3.3. Linear, Grading & Excavation (2024) - 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	4.07	3.42	31.2	30.4	0.06	1.42	—	1.42	1.31	—	1.31	—	6,495	6,495	0.26	0.05	—	6,518
Dust From Material Movement	—	—	—	—	—	—	3.25	3.25	—	0.35	0.35	—	—	—	—	—	—	—
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	0.12	0.10	0.94	0.92	< 0.005	0.04	—	0.04	0.04	—	0.04	—	196	196	0.01	< 0.005	—	196
Dust From Material Movement	—	—	—	—	—	—	0.10	0.10	—	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	0.02	0.02	0.17	0.17	< 0.005	0.01	—	0.01	0.01	—	0.01	—	32.4	32.4	< 0.005	< 0.005	—	32.5
Dust From Material Movement	—	—	—	—	—	—	0.02	0.02	—	< 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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.04	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	25.5	25.5	< 0.005	< 0.005	< 0.005	26.6
Hauling	0.86	0.23	15.9	5.55	0.07	0.21	2.89	3.10	0.21	0.79	1.00	—	11,447	11,447	0.62	1.83	0.64	12,009
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.77	0.77	< 0.005	< 0.005	< 0.005	0.80
Hauling	0.03	0.01	0.48	0.17	< 0.005	0.01	0.09	0.09	0.01	0.02	0.03	—	345	345	0.02	0.06	0.32	362
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.13	0.13	< 0.005	< 0.005	< 0.005	0.13
Hauling	< 0.005	< 0.005	0.09	0.03	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	0.01	—	57.1	57.1	< 0.005	0.01	0.05	60.0

3.4. Linear, Grading & Excavation (2024) - Mitigated

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	0.66	0.66	6.16	37.5	0.06	0.12	—	0.12	0.12	—	0.12	—	6,495	6,495	0.26	0.05	—	6,518

Dust From Material Movement	—	—	—	—	—	—	3.25	3.25	—	0.35	0.35	—	—	—	—	—	—	—
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	0.19	1.13	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	196	196	0.01	< 0.005	—	196
Dust From Material Movement	—	—	—	—	—	—	0.10	0.10	—	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	0.21	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	32.4	32.4	< 0.005	< 0.005	—	32.5
Dust From Material Movement	—	—	—	—	—	—	0.02	0.02	—	< 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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.04	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	25.5	25.5	< 0.005	< 0.005	< 0.005	26.6
Hauling	0.86	0.23	15.9	5.55	0.07	0.21	2.89	3.10	0.21	0.79	1.00	—	11,447	11,447	0.62	1.83	0.64	12,009

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.77	0.77	< 0.005	< 0.005	< 0.005	0.80
Hauling	0.03	0.01	0.48	0.17	< 0.005	0.01	0.09	0.09	0.01	0.02	0.03	—	345	345	0.02	0.06	0.32	362
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.13	0.13	< 0.005	< 0.005	< 0.005	0.13
Hauling	< 0.005	< 0.005	0.09	0.03	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	0.01	—	57.1	57.1	< 0.005	0.01	0.05	60.0

3.5. Linear, Drainage, Utilities, & Sub-Grade (2024) - 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	3.27	2.74	26.3	24.6	0.05	1.07	—	1.07	0.98	—	0.98	—	5,693	5,693	0.23	0.05	—	5,712
Dust From Material Movement	—	—	—	—	—	—	2.66	2.66	—	0.29	0.29	—	—	—	—	—	—	—
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	0.11	0.09	0.87	0.81	< 0.005	0.04	—	0.04	0.03	—	0.03	—	187	187	0.01	< 0.005	—	188

Dust From Material Movement	—	—	—	—	—	—	0.09	0.09	—	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	0.02	0.02	0.16	0.15	< 0.005	0.01	—	0.01	0.01	—	0.01	—	31.0	31.0	< 0.005	< 0.005	—	31.1
Dust From Material Movement	—	—	—	—	—	—	0.02	0.02	—	< 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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	51.0	51.0	< 0.005	0.01	< 0.005	53.1
Hauling	0.07	0.02	1.23	0.43	0.01	0.02	0.22	0.24	0.02	0.06	0.08	—	881	881	0.05	0.14	0.05	924
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.68	1.68	< 0.005	< 0.005	< 0.005	1.75
Hauling	< 0.005	< 0.005	0.04	0.01	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	28.9	28.9	< 0.005	< 0.005	0.03	30.4
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.28	0.28	< 0.005	< 0.005	< 0.005	0.29

Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.79	4.79	< 0.005	< 0.005	< 0.005	5.03

3.6. Linear, Drainage, Utilities, & Sub-Grade (2024) - Mitigated

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	0.79	0.74	5.14	31.6	0.05	0.17	—	0.17	0.17	—	0.17	—	5,693	5,693	0.23	0.05	—	5,712
Dust From Material Movement	—	—	—	—	—	—	2.66	2.66	—	0.29	0.29	—	—	—	—	—	—	—
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	0.17	1.04	< 0.005	0.01	—	0.01	0.01	—	0.01	—	187	187	0.01	< 0.005	—	188
Dust From Material Movement	—	—	—	—	—	—	0.09	0.09	—	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	0.19	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	31.0	31.0	< 0.005	< 0.005	—	31.1

Dust From Material Movement	—	—	—	—	—	—	0.02	0.02	—	< 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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	51.0	51.0	< 0.005	0.01	< 0.005	53.1
Hauling	0.07	0.02	1.23	0.43	0.01	0.02	0.22	0.24	0.02	0.06	0.08	—	881	881	0.05	0.14	0.05	924
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.68	1.68	< 0.005	< 0.005	< 0.005	1.75
Hauling	< 0.005	< 0.005	0.04	0.01	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	28.9	28.9	< 0.005	< 0.005	0.03	30.4
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.28	0.28	< 0.005	< 0.005	< 0.005	0.29
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.79	4.79	< 0.005	< 0.005	< 0.005	5.03

3.7. Linear, Paving (2024) - 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	1.14	0.96	8.15	10.9	0.01	0.39	—	0.39	0.36	—	0.36	—	1,620	1,620	0.07	0.01	—	1,626
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	0.13	0.18	< 0.005	0.01	—	0.01	0.01	—	0.01	—	26.6	26.6	< 0.005	< 0.005	—	26.7
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.41	4.41	< 0.005	< 0.005	—	4.42
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	51.0	51.0	< 0.005	0.01	< 0.005	53.1
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.84	0.84	< 0.005	< 0.005	< 0.005	0.87
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.14	0.14	< 0.005	< 0.005	< 0.005	0.14
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.8. Linear, Paving (2024) - Mitigated

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	0.18	0.18	2.58	11.3	0.01	0.03	—	0.03	0.03	—	0.03	—	1,620	1,620	0.07	0.01	—	1,626
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	0.04	0.19	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	26.6	26.6	< 0.005	< 0.005	—	26.7
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.41	4.41	< 0.005	< 0.005	—	4.42

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	51.0	51.0	< 0.005	0.01	< 0.005	53.1
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.84	0.84	< 0.005	< 0.005	< 0.005	0.87
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.14	0.14	< 0.005	< 0.005	< 0.005	0.14
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 (2024) - 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	0.17	0.14	0.91	1.15	< 0.005	0.03	—	0.03	0.03	—	0.03	—	134	134	0.01	< 0.005	—	134
Architectural Coatings	—	0.36	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.83	1.83	< 0.005	< 0.005	—	1.84
Architectural Coatings	—	< 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	—	0.30	0.30	< 0.005	< 0.005	—	0.30
Architectural Coatings	—	< 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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	51.0	51.0	< 0.005	0.01	< 0.005	53.1
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.70	0.70	< 0.005	< 0.005	< 0.005	0.73
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.12	0.12	< 0.005	< 0.005	< 0.005	0.12
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.10. Architectural Coating (2024) - Mitigated

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	0.02	0.02	0.65	0.96	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	134	134	0.01	< 0.005	—	134
Architectural Coatings	—	0.36	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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	—	1.83	1.83	< 0.005	< 0.005	—	1.84
Architectural Coatings	—	< 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	—	0.30	0.30	< 0.005	< 0.005	—	0.30
Architectural Coatings	—	< 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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	51.0	51.0	< 0.005	0.01	< 0.005	53.1
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.70	0.70	< 0.005	< 0.005	< 0.005	0.73
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.12	0.12	< 0.005	< 0.005	< 0.005	0.12
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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

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

4.10.4. Soil Carbon Accumulation By Vegetation Type - Mitigated

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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

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

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

Land Use	TOG	ROG	NOx	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.6. Avoided and Sequestered Emissions by Species - Mitigated

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

5.1. Construction Schedule

Phase Name	Phase Type	Start Date	End Date	Days Per Week	Work Days per Phase	Phase Description
Linear, Grubbing & Land Clearing	Linear, Grubbing & Land Clearing	10/7/2024	10/11/2024	5.00	5.00	—

Linear, Grading & Excavation	Linear, Grading & Excavation	10/12/2024	10/28/2024	5.00	11.0	—
Linear, Drainage, Utilities, & Sub-Grade	Linear, Drainage, Utilities, & Sub-Grade	10/29/2024	11/13/2024	5.00	12.0	—
Linear, Paving	Linear, Paving	11/14/2024	11/21/2024	5.00	6.00	—
Architectural Coating	Architectural Coating	11/22/2024	11/28/2024	5.00	5.00	—

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
Linear, Grubbing & Land Clearing	Crawler Tractors	Diesel	Average	1.00	8.00	87.0	0.43
Linear, Grubbing & Land Clearing	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
Linear, Grubbing & Land Clearing	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Grading & Excavation	Crawler Tractors	Diesel	Average	1.00	8.00	87.0	0.43
Linear, Grading & Excavation	Excavators	Diesel	Average	3.00	8.00	36.0	0.38
Linear, Grading & Excavation	Graders	Diesel	Average	1.00	8.00	148	0.41
Linear, Grading & Excavation	Rollers	Diesel	Average	2.00	8.00	36.0	0.38
Linear, Grading & Excavation	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
Linear, Grading & Excavation	Scrapers	Diesel	Average	2.00	8.00	423	0.48
Linear, Grading & Excavation	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82

Linear, Grading & Excavation	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Linear, Drainage, Utilities, & Sub-Grade	Air Compressors	Diesel	Average	1.00	8.00	37.0	0.48
Linear, Drainage, Utilities, & Sub-Grade	Generator Sets	Diesel	Average	1.00	8.00	14.0	0.74
Linear, Drainage, Utilities, & Sub-Grade	Graders	Diesel	Average	1.00	8.00	148	0.41
Linear, Drainage, Utilities, & Sub-Grade	Plate Compactors	Diesel	Average	1.00	8.00	8.00	0.43
Linear, Drainage, Utilities, & Sub-Grade	Pumps	Diesel	Average	1.00	8.00	11.0	0.74
Linear, Drainage, Utilities, & Sub-Grade	Rough Terrain Forklifts	Diesel	Average	1.00	8.00	96.0	0.40
Linear, Drainage, Utilities, & Sub-Grade	Scrapers	Diesel	Average	2.00	8.00	423	0.48
Linear, Drainage, Utilities, & Sub-Grade	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Drainage, Utilities, & Sub-Grade	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Linear, Paving	Pavers	Diesel	Average	1.00	8.00	81.0	0.42
Linear, Paving	Paving Equipment	Diesel	Average	1.00	8.00	89.0	0.36
Linear, Paving	Rollers	Diesel	Average	3.00	8.00	36.0	0.38
Linear, Paving	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Paving	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Architectural Coating	Air Compressors	Diesel	Average	1.00	6.00	37.0	0.48

5.2.2. Mitigated

Phase Name	Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
Linear, Grubbing & Land Clearing	Crawler Tractors	Diesel	Tier 4 Final	1.00	8.00	87.0	0.43

Linear, Grubbing & Land Clearing	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
Linear, Grubbing & Land Clearing	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Grading & Excavation	Crawler Tractors	Diesel	Tier 4 Final	1.00	8.00	87.0	0.43
Linear, Grading & Excavation	Excavators	Diesel	Tier 4 Final	3.00	8.00	36.0	0.38
Linear, Grading & Excavation	Graders	Diesel	Tier 4 Final	1.00	8.00	148	0.41
Linear, Grading & Excavation	Rollers	Diesel	Tier 4 Final	2.00	8.00	36.0	0.38
Linear, Grading & Excavation	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
Linear, Grading & Excavation	Scrapers	Diesel	Tier 4 Final	2.00	8.00	423	0.48
Linear, Grading & Excavation	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Grading & Excavation	Tractors/Loaders/Backhoes	Diesel	Tier 4 Final	2.00	8.00	84.0	0.37
Linear, Drainage, Utilities, & Sub-Grade	Air Compressors	Diesel	Tier 4 Final	1.00	8.00	37.0	0.48
Linear, Drainage, Utilities, & Sub-Grade	Generator Sets	Diesel	Average	1.00	8.00	14.0	0.74
Linear, Drainage, Utilities, & Sub-Grade	Graders	Diesel	Tier 4 Final	1.00	8.00	148	0.41
Linear, Drainage, Utilities, & Sub-Grade	Plate Compactors	Diesel	Average	1.00	8.00	8.00	0.43
Linear, Drainage, Utilities, & Sub-Grade	Pumps	Diesel	Average	1.00	8.00	11.0	0.74
Linear, Drainage, Utilities, & Sub-Grade	Rough Terrain Forklifts	Diesel	Tier 4 Final	1.00	8.00	96.0	0.40
Linear, Drainage, Utilities, & Sub-Grade	Scrapers	Diesel	Tier 4 Final	2.00	8.00	423	0.48

Linear, Drainage, Utilities, & Sub-Grade	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Drainage, Utilities, & Sub-Grade	Tractors/Loaders/Backhoes	Diesel	Tier 4 Final	2.00	8.00	84.0	0.37
Linear, Paving	Pavers	Diesel	Tier 4 Final	1.00	8.00	81.0	0.42
Linear, Paving	Paving Equipment	Diesel	Tier 4 Final	1.00	8.00	89.0	0.36
Linear, Paving	Rollers	Diesel	Tier 4 Final	3.00	8.00	36.0	0.38
Linear, Paving	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Paving	Tractors/Loaders/Backhoes	Diesel	Tier 4 Final	2.00	8.00	84.0	0.37
Architectural Coating	Air Compressors	Diesel	Tier 4 Final	1.00	6.00	37.0	0.48

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Architectural Coating	—	—	—	—
Architectural Coating	Worker	0.00	12.0	LDA,LDT1,LDT2
Architectural Coating	Vendor	2.00	7.63	HHDT,MHDT
Architectural Coating	Hauling	0.00	20.0	HHDT
Architectural Coating	Onsite truck	—	—	HHDT
Linear, Grubbing & Land Clearing	—	—	—	—
Linear, Grubbing & Land Clearing	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Grubbing & Land Clearing	Vendor	2.00	7.63	HHDT,MHDT
Linear, Grubbing & Land Clearing	Hauling	6.40	20.0	HHDT
Linear, Grubbing & Land Clearing	Onsite truck	—	—	HHDT
Linear, Grading & Excavation	—	—	—	—
Linear, Grading & Excavation	Worker	0.00	12.0	LDA,LDT1,LDT2

Linear, Grading & Excavation	Vendor	1.00	7.63	HHDT,MHDT
Linear, Grading & Excavation	Hauling	156	20.0	HHDT
Linear, Grading & Excavation	Onsite truck	—	—	HHDT
Linear, Drainage, Utilities, & Sub-Grade	—	—	—	—
Linear, Drainage, Utilities, & Sub-Grade	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Drainage, Utilities, & Sub-Grade	Vendor	2.00	7.63	HHDT,MHDT
Linear, Drainage, Utilities, & Sub-Grade	Hauling	12.0	20.0	HHDT
Linear, Drainage, Utilities, & Sub-Grade	Onsite truck	—	—	HHDT
Linear, Paving	—	—	—	—
Linear, Paving	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Paving	Vendor	2.00	7.63	HHDT,MHDT
Linear, Paving	Hauling	0.00	20.0	HHDT
Linear, Paving	Onsite truck	—	—	HHDT

5.3.2. Mitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Architectural Coating	—	—	—	—
Architectural Coating	Worker	0.00	12.0	LDA,LDT1,LDT2
Architectural Coating	Vendor	2.00	7.63	HHDT,MHDT
Architectural Coating	Hauling	0.00	20.0	HHDT
Architectural Coating	Onsite truck	—	—	HHDT
Linear, Grubbing & Land Clearing	—	—	—	—
Linear, Grubbing & Land Clearing	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Grubbing & Land Clearing	Vendor	2.00	7.63	HHDT,MHDT
Linear, Grubbing & Land Clearing	Hauling	6.40	20.0	HHDT
Linear, Grubbing & Land Clearing	Onsite truck	—	—	HHDT
Linear, Grading & Excavation	—	—	—	—

Linear, Grading & Excavation	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Grading & Excavation	Vendor	1.00	7.63	HHDT,MHDT
Linear, Grading & Excavation	Hauling	156	20.0	HHDT
Linear, Grading & Excavation	Onsite truck	—	—	HHDT
Linear, Drainage, Utilities, & Sub-Grade	—	—	—	—
Linear, Drainage, Utilities, & Sub-Grade	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Drainage, Utilities, & Sub-Grade	Vendor	2.00	7.63	HHDT,MHDT
Linear, Drainage, Utilities, & Sub-Grade	Hauling	12.0	20.0	HHDT
Linear, Drainage, Utilities, & Sub-Grade	Onsite truck	—	—	HHDT
Linear, Paving	—	—	—	—
Linear, Paving	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Paving	Vendor	2.00	7.63	HHDT,MHDT
Linear, Paving	Hauling	0.00	20.0	HHDT
Linear, Paving	Onsite truck	—	—	HHDT

5.4. Vehicles

5.4.1. Construction Vehicle Control Strategies

Non-applicable. No control strategies activated by user.

5.5. Architectural Coatings

Phase Name	Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
Architectural Coating	0.00	0.00	0.00	0.00	392

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)
Linear, Grubbing & Land Clearing	—	250	0.15	0.00	—
Linear, Grading & Excavation	13,400	200	0.15	0.00	—
Linear, Drainage, Utilities, & Sub-Grade	1,036	—	0.15	0.00	—

5.6.2. Construction Earthmoving Control Strategies

Non-applicable. No control strategies activated by user.

5.7. Construction Paving

Land Use	Area Paved (acres)	% Asphalt
Road Construction	0.15	100%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2024	0.00	589	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

5.18.1.2. Mitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.1.2. Mitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

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

5.18.2.2. Mitigated

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

6. Climate Risk Detailed Report

6.1. Climate Risk Summary

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

Climate Hazard	Result for Project Location	Unit
Temperature and Extreme Heat	7.50	annual days of extreme heat
Extreme Precipitation	2.70	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	3.64	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (Radke et al., 2017, CEC-500-2017-008), and consider inundation location and depth for the San Francisco Bay, the Sacramento-San Joaquin River Delta and California coast resulting different increments of sea level rise coupled with extreme storm events. Users may select from four scenarios to view the range in potential inundation depth for the grid cell. The four scenarios are: No rise, 0.5 meter, 1.0 meter, 1.41 meters
Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

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

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

6.3. Adjusted Climate Risk Scores

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

Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores 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	37.6
AQ-PM	44.5
AQ-DPM	45.5
Drinking Water	29.0
Lead Risk Housing	21.4
Pesticides	0.00
Toxic Releases	35.8
Traffic	55.5
Effect Indicators	—
CleanUp Sites	33.9

Groundwater	64.5
Haz Waste Facilities/Generators	87.7
Impaired Water Bodies	72.2
Solid Waste	0.00
Sensitive Population	—
Asthma	27.1
Cardio-vascular	4.32
Low Birth Weights	20.9
Socioeconomic Factor Indicators	—
Education	16.8
Housing	30.2
Linguistic	22.2
Poverty	15.6
Unemployment	72.5

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	58.91184396
Employed	48.77454125
Median HI	71.4744001
Education	—
Bachelor's or higher	75.77312973
High school enrollment	100
Preschool enrollment	88.27152573
Transportation	—

Auto Access	26.42114718
Active commuting	41.99923008
Social	—
2-parent households	74.72090337
Voting	67.3681509
Neighborhood	—
Alcohol availability	81.09842166
Park access	81.35506224
Retail density	19.41485949
Supermarket access	2.399589375
Tree canopy	35.94251251
Housing	—
Homeownership	34.7747979
Housing habitability	66.35442063
Low-inc homeowner severe housing cost burden	65.0455537
Low-inc renter severe housing cost burden	68.13807263
Uncrowded housing	60.05389452
Health Outcomes	—
Insured adults	71.87219299
Arthritis	89.2
Asthma ER Admissions	73.3
High Blood Pressure	94.0
Cancer (excluding skin)	55.0
Asthma	72.9
Coronary Heart Disease	88.8
Chronic Obstructive Pulmonary Disease	86.1
Diagnosed Diabetes	92.6

Life Expectancy at Birth	51.7
Cognitively Disabled	36.6
Physically Disabled	77.4
Heart Attack ER Admissions	89.3
Mental Health Not Good	69.9
Chronic Kidney Disease	90.3
Obesity	79.9
Pedestrian Injuries	19.6
Physical Health Not Good	90.6
Stroke	88.3
Health Risk Behaviors	—
Binge Drinking	2.4
Current Smoker	68.2
No Leisure Time for Physical Activity	83.8
Climate Change Exposures	—
Wildfire Risk	57.5
SLR Inundation Area	0.0
Children	87.0
Elderly	73.1
English Speaking	54.0
Foreign-born	27.7
Outdoor Workers	56.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	31.6
Traffic Density	37.9
Traffic Access	48.8
Other Indices	—

Hardship	21.0
Other Decision Support	—
2016 Voting	74.1

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	19.0
Healthy Places Index Score for Project Location (b)	70.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
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	Construction assumptions provided by project engineers.
Construction: Trips and VMT	Workers included for architectural coating phase. Trips adjusted for HRA (1,000 feet from project boundary).
Construction: Paving	Paving only required once.

Fenton CIP Construction Phase 1 Detailed Report

Bridge Construction

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Fenton CIP Construction Phase 1
Construction Start Date	1/1/2025
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	2.50
Precipitation (days)	19.8
Location	Fenton Pkwy, San Diego, CA 92108, USA
County	San Diego
City	San Diego
Air District	San Diego County APCD
Air Basin	San Diego
TAZ	6340
EDFZ	12
Electric Utility	San Diego Gas & Electric
Gas Utility	San Diego Gas & Electric
App Version	2022.1.1.21

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
User Defined Industrial	0.20	User Defined Unit	1.50	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, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	4.90	3.67	43.3	36.8	0.16	1.06	5.41	6.47	0.99	1.44	2.43	—	22,416	22,416	0.98	2.33	46.8	23,182
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	8.63	6.87	74.0	69.6	0.23	2.48	11.9	14.1	2.29	4.80	6.88	—	29,402	29,402	1.30	2.63	1.24	30,221
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	2.50	1.99	19.7	18.8	0.06	0.62	1.97	2.59	0.57	0.63	1.20	—	7,344	7,344	0.32	0.57	4.95	7,526
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.46	0.36	3.60	3.43	0.01	0.11	0.36	0.47	0.10	0.12	0.22	—	1,216	1,216	0.05	0.09	0.82	1,246

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

2025	4.90	3.67	43.3	36.8	0.16	1.06	5.41	6.47	0.99	1.44	2.43	—	22,416	22,416	0.98	2.33	46.8	23,182
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	8.63	6.87	74.0	69.6	0.23	2.48	11.9	14.1	2.29	4.80	6.88	—	29,402	29,402	1.30	2.63	1.24	30,221
2026	3.22	2.61	23.8	25.2	0.07	0.79	1.43	2.22	0.73	0.37	1.10	—	8,416	8,416	0.35	0.51	0.25	8,576
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	2.50	1.99	19.7	18.8	0.06	0.62	1.97	2.59	0.57	0.63	1.20	—	7,344	7,344	0.32	0.57	4.95	7,526
2026	0.24	0.19	1.67	1.79	< 0.005	0.06	0.07	0.12	0.05	0.02	0.07	—	487	487	0.02	0.02	0.18	494
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	0.46	0.36	3.60	3.43	0.01	0.11	0.36	0.47	0.10	0.12	0.22	—	1,216	1,216	0.05	0.09	0.82	1,246
2026	0.04	0.04	0.31	0.33	< 0.005	0.01	0.01	0.02	0.01	< 0.005	0.01	—	80.6	80.6	< 0.005	< 0.005	0.03	81.7

3. Construction Emissions Details

3.1. 2. ESA Fencing; Clear & Grub; Mob (2025) - 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	3.17	2.67	24.1	24.9	0.05	1.08	—	1.08	1.00	—	1.00	—	5,146	5,146	0.21	0.04	—	5,164

Dust From Material Movement	—	—	—	—	—	—	8.14	8.14	—	3.54	3.54	—	—	—	—	—	—	—
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	0.14	0.12	1.06	1.09	< 0.005	0.05	—	0.05	0.04	—	0.04	—	226	226	0.01	< 0.005	—	226
Dust From Material Movement	—	—	—	—	—	—	0.36	0.36	—	0.16	0.16	—	—	—	—	—	—	—
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	0.03	0.02	0.19	0.20	< 0.005	0.01	—	0.01	0.01	—	0.01	—	37.3	37.3	< 0.005	< 0.005	—	37.5
Dust From Material Movement	—	—	—	—	—	—	0.07	0.07	—	0.03	0.03	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.07	0.06	0.05	0.65	0.00	0.00	0.14	0.14	0.00	0.03	0.03	—	143	143	0.01	0.01	0.01	145
Vendor	0.01	< 0.005	0.14	0.06	< 0.005	< 0.005	0.03	0.03	< 0.005	0.01	0.01	—	100	100	< 0.005	0.01	0.01	104
Hauling	0.04	0.01	0.78	0.28	< 0.005	0.01	0.15	0.16	0.01	0.04	0.05	—	575	575	0.03	0.09	0.03	603

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.03	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	6.34	6.34	< 0.005	< 0.005	0.01	6.43
Vendor	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.39	4.39	< 0.005	< 0.005	< 0.005	4.58
Hauling	< 0.005	< 0.005	0.03	0.01	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	25.2	25.2	< 0.005	< 0.005	0.02	26.4
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.05	1.05	< 0.005	< 0.005	< 0.005	1.06
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.73	0.73	< 0.005	< 0.005	< 0.005	0.76
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.17	4.17	< 0.005	< 0.005	< 0.005	4.38

3.3. 4. Ground Impr Abut 1 (2025) - 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	1.56	1.30	11.5	14.6	0.03	0.47	—	0.47	0.43	—	0.43	—	2,885	2,885	0.12	0.02	—	2,895
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.07	0.06	0.50	0.64	< 0.005	0.02	—	0.02	0.02	—	0.02	—	126	126	0.01	< 0.005	—	127

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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.09	0.12	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	20.9	20.9	< 0.005	< 0.005	—	21.0
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	0.04	0.04	0.03	0.41	0.00	0.00	0.08	0.08	0.00	0.02	0.02	—	89.6	89.6	< 0.005	< 0.005	0.01	90.8
Vendor	0.01	0.01	0.21	0.10	< 0.005	< 0.005	0.04	0.04	< 0.005	0.01	0.01	—	150	150	0.01	0.02	0.01	157
Hauling	0.14	0.04	2.54	0.93	0.01	0.03	0.48	0.52	0.03	0.13	0.17	—	1,869	1,869	0.10	0.29	0.11	1,959
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.96	3.96	< 0.005	< 0.005	0.01	4.02
Vendor	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.58	6.58	< 0.005	< 0.005	0.01	6.88
Hauling	0.01	< 0.005	0.11	0.04	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	81.9	81.9	< 0.005	0.01	0.08	85.9
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.66	0.66	< 0.005	< 0.005	< 0.005	0.67
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.09	1.09	< 0.005	< 0.005	< 0.005	1.14

Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	13.6	13.6	< 0.005	< 0.005	0.01	14.2

3.5. 6. Embankment Grading (Abut 1) (2025) - 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	1.68	1.41	12.3	12.6	0.02	0.55	—	0.55	0.50	—	0.50	—	2,162	2,162	0.09	0.02	—	2,170
Dust From Material Movement	—	—	—	—	—	—	6.55	6.55	—	3.37	3.37	—	—	—	—	—	—	—
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	0.20	0.21	< 0.005	0.01	—	0.01	0.01	—	0.01	—	35.5	35.5	< 0.005	< 0.005	—	35.7
Dust From Material Movement	—	—	—	—	—	—	0.11	0.11	—	0.06	0.06	—	—	—	—	—	—	—
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	—	5.88	5.88	< 0.005	< 0.005	—	5.90

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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.05	0.05	0.04	0.49	0.00	0.00	0.10	0.10	0.00	0.02	0.02	—	108	108	0.01	< 0.005	0.01	109
Vendor	0.01	< 0.005	0.14	0.06	< 0.005	< 0.005	0.03	0.03	< 0.005	0.01	0.01	—	100	100	< 0.005	0.01	0.01	104
Hauling	0.02	0.01	0.39	0.14	< 0.005	0.01	0.07	0.08	0.01	0.02	0.03	—	288	288	0.02	0.05	0.02	301
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.78	1.78	< 0.005	< 0.005	< 0.005	1.81
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.65	1.65	< 0.005	< 0.005	< 0.005	1.72
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.73	4.73	< 0.005	< 0.005	< 0.005	4.96
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.30	0.30	< 0.005	< 0.005	< 0.005	0.30
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.27	0.27	< 0.005	< 0.005	< 0.005	0.28
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.78	0.78	< 0.005	< 0.005	< 0.005	0.82

3.7. 8. Ground Impr Abut 4 (2025) - 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	1.54	1.28	11.6	12.3	0.03	0.44	—	0.44	0.40	—	0.40	—	2,990	2,990	0.12	0.02	—	3,001
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.07	0.06	0.51	0.54	< 0.005	0.02	—	0.02	0.02	—	0.02	—	131	131	0.01	< 0.005	—	132
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.09	0.10	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	21.7	21.7	< 0.005	< 0.005	—	21.8
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	0.04	0.04	0.03	0.41	0.00	0.00	0.08	0.08	0.00	0.02	0.02	—	89.6	89.6	< 0.005	< 0.005	0.01	90.8
Vendor	0.01	0.01	0.21	0.10	< 0.005	< 0.005	0.04	0.04	< 0.005	0.01	0.01	—	150	150	0.01	0.02	0.01	157
Hauling	0.14	0.04	2.54	0.93	0.01	0.03	0.48	0.52	0.03	0.13	0.17	—	1,869	1,869	0.10	0.29	0.11	1,959
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.96	3.96	< 0.005	< 0.005	0.01	4.02
Vendor	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.58	6.58	< 0.005	< 0.005	0.01	6.88
Hauling	0.01	< 0.005	0.11	0.04	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	81.9	81.9	< 0.005	0.01	0.08	85.9
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.66	0.66	< 0.005	< 0.005	< 0.005	0.67
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.09	1.09	< 0.005	< 0.005	< 0.005	1.14
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	13.6	13.6	< 0.005	< 0.005	0.01	14.2

3.9. 9. Embankment Grading (Abut 4) (2025) - 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	1.68	1.41	12.3	12.6	0.02	0.55	—	0.55	0.50	—	0.50	—	2,162	2,162	0.09	0.02	—	2,170

Dust From Material Movement	—	—	—	—	—	—	6.55	6.55	—	3.37	3.37	—	—	—	—	—	—	—
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	0.20	0.21	< 0.005	0.01	—	0.01	0.01	—	0.01	—	35.5	35.5	< 0.005	< 0.005	—	35.7
Dust From Material Movement	—	—	—	—	—	—	0.11	0.11	—	0.06	0.06	—	—	—	—	—	—	—
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	—	5.88	5.88	< 0.005	< 0.005	—	5.90
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.05	0.05	0.04	0.49	0.00	0.00	0.10	0.10	0.00	0.02	0.02	—	108	108	0.01	< 0.005	0.01	109
Vendor	0.01	< 0.005	0.14	0.06	< 0.005	< 0.005	0.03	0.03	< 0.005	0.01	0.01	—	100	100	< 0.005	0.01	0.01	104
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	< 0.005	< 0.005	—	1.78	1.78	< 0.005	< 0.005	< 0.005	1.81
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.65	1.65	< 0.005	< 0.005	< 0.005	1.72
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	< 0.005	< 0.005	—	0.30	0.30	< 0.005	< 0.005	< 0.005	0.30
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.27	0.27	< 0.005	< 0.005	< 0.005	0.28
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.11. 1. General Construction (2025) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.49	1.24	10.8	10.2	0.02	0.40	—	0.40	0.37	—	0.37	—	2,091	2,091	0.08	0.02	—	2,098
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.49	1.24	10.8	10.2	0.02	0.40	—	0.40	0.37	—	0.37	—	2,091	2,091	0.08	0.02	—	2,098
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	1.07	0.89	7.73	7.29	0.02	0.29	—	0.29	0.26	—	0.26	—	1,494	1,494	0.06	0.01	—	1,499
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	0.19	0.16	1.41	1.33	< 0.005	0.05	—	0.05	0.05	—	0.05	—	247	247	0.01	< 0.005	—	248
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.11	0.10	0.07	1.11	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	228	228	0.01	0.01	0.85	231
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.10	0.10	0.08	0.97	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	215	215	0.01	0.01	0.02	218
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	0.07	0.07	0.06	0.71	0.00	0.00	0.14	0.14	0.00	0.03	0.03	—	155	155	0.01	0.01	0.26	157
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	0.01	0.01	0.01	0.13	0.00	0.00	0.03	0.03	0.00	0.01	0.01	—	25.7	25.7	< 0.005	< 0.005	0.04	26.0
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

3.13. 1. General Construction (2026) - 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	1.45	1.20	10.5	10.1	0.02	0.37	—	0.37	0.34	—	0.34	—	2,091	2,091	0.08	0.02	—	2,098
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	0.16	0.13	1.15	1.11	< 0.005	0.04	—	0.04	0.04	—	0.04	—	229	229	0.01	< 0.005	—	230
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	0.03	0.02	0.21	0.20	< 0.005	0.01	—	0.01	0.01	—	0.01	—	37.9	37.9	< 0.005	< 0.005	—	38.1
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	0.09	0.09	0.07	0.92	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	211	211	0.01	0.01	0.02	213
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	0.01	0.01	0.01	0.10	0.00	0.00	0.02	0.02	0.00	0.01	0.01	—	23.3	23.3	< 0.005	< 0.005	0.04	23.6
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	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.86	3.86	< 0.005	< 0.005	0.01	3.91
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

3.15. 3. CIDH Piles (Pier 2, 3) (2025) - 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	1.19	0.99	8.85	10.2	0.02	0.36	—	0.36	0.33	—	0.33	—	2,185	2,185	0.09	0.02	—	2,193
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	0.07	0.06	0.51	0.59	< 0.005	0.02	—	0.02	0.02	—	0.02	—	126	126	0.01	< 0.005	—	126
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	0.09	0.11	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	20.8	20.8	< 0.005	< 0.005	—	20.9
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.09	0.08	0.07	0.81	0.00	0.00	0.17	0.17	0.00	0.04	0.04	—	179	179	0.01	0.01	0.02	182
Vendor	0.71	0.33	11.7	5.38	0.06	0.11	2.16	2.28	0.11	0.60	0.71	—	8,464	8,464	0.37	1.20	0.57	8,830
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	0.05	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	10.4	10.4	< 0.005	< 0.005	0.02	10.6
Vendor	0.04	0.02	0.67	0.30	< 0.005	0.01	0.12	0.13	0.01	0.03	0.04	—	487	487	0.02	0.07	0.55	508
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	< 0.005	< 0.005	—	1.72	1.72	< 0.005	< 0.005	< 0.005	1.75
Vendor	0.01	< 0.005	0.12	0.06	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	80.6	80.6	< 0.005	0.01	0.09	84.2
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

3.17. 5. Column Form, Rebar, Pour (Pier 2, 3) (2025) - 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	0.45	0.38	3.66	3.12	0.01	0.15	—	0.15	0.14	—	0.14	—	990	990	0.04	0.01	—	994
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	0.21	0.18	< 0.005	0.01	—	0.01	0.01	—	0.01	—	57.0	57.0	< 0.005	< 0.005	—	57.2
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	9.43	9.43	< 0.005	< 0.005	—	9.47
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	0.10	0.10	0.08	0.97	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	215	215	0.01	0.01	0.02	218
Vendor	0.24	0.11	4.01	1.85	0.02	0.04	0.74	0.78	0.04	0.21	0.24	—	2,905	2,905	0.13	0.41	0.20	3,030

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	0.01	0.01	< 0.005	0.06	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	12.5	12.5	< 0.005	< 0.005	0.02	12.7
Vendor	0.01	0.01	0.23	0.10	< 0.005	< 0.005	0.04	0.04	< 0.005	0.01	0.01	—	167	167	0.01	0.02	0.19	174
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	< 0.005	< 0.005	—	2.07	2.07	< 0.005	< 0.005	< 0.005	2.10
Vendor	< 0.005	< 0.005	0.04	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	27.7	27.7	< 0.005	< 0.005	0.03	28.9
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

3.19. 12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls) (2025) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.45	0.38	3.66	3.12	0.01	0.15	—	0.15	0.14	—	0.14	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.08	0.07	0.66	0.56	< 0.005	0.03	—	0.03	0.02	—	0.02	—	179	179	0.01	< 0.005	—	180
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	0.12	0.10	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	29.6	29.6	< 0.005	< 0.005	—	29.7
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.19	0.18	0.13	2.04	0.00	0.00	0.37	0.37	0.00	0.09	0.09	—	417	417	0.02	0.01	1.57	424
Vendor	0.25	0.12	3.86	1.79	0.02	0.04	0.74	0.78	0.04	0.21	0.24	—	2,903	2,903	0.13	0.41	7.53	3,036
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.03	0.03	0.03	0.33	0.00	0.00	0.07	0.07	0.00	0.02	0.02	—	71.9	71.9	< 0.005	< 0.005	0.12	73.0
Vendor	0.04	0.02	0.72	0.33	< 0.005	0.01	0.13	0.14	0.01	0.04	0.04	—	525	525	0.02	0.07	0.59	548
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	0.01	0.01	< 0.005	0.06	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	11.9	11.9	< 0.005	< 0.005	0.02	12.1
Vendor	0.01	< 0.005	0.13	0.06	< 0.005	< 0.005	0.02	0.03	< 0.005	0.01	0.01	—	86.9	86.9	< 0.005	0.01	0.10	90.8
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

3.21. 13. Erect Falsework (2025) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.45	0.38	3.66	3.12	0.01	0.15	—	0.15	0.14	—	0.14	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.05	0.04	0.41	0.35	< 0.005	0.02	—	0.02	0.02	—	0.02	—	111	111	< 0.005	< 0.005	—	112
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.08	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	18.4	18.4	< 0.005	< 0.005	—	18.5
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.18	0.16	0.12	1.85	0.00	0.00	0.34	0.34	0.00	0.08	0.08	—	380	380	0.02	0.01	1.42	385
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Worker	0.02	0.02	0.02	0.18	0.00	0.00	0.04	0.04	0.00	0.01	0.01	—	40.6	40.6	< 0.005	< 0.005	0.07	41.2
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	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	0.03	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	6.72	6.72	< 0.005	< 0.005	0.01	6.82
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

3.23. 15. Cure Deck, Stress Bridge, Strip Falsework (2025) - 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	0.45	0.38	3.66	3.12	0.01	0.15	—	0.15	0.14	—	0.14	—	990	990	0.04	0.01	—	994
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	0.26	0.22	< 0.005	0.01	—	0.01	0.01	—	0.01	—	69.8	69.8	< 0.005	< 0.005	—	70.0
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	< 0.005	0.05	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	11.6	11.6	< 0.005	< 0.005	—	11.6

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	0.17	0.16	0.14	1.62	0.00	0.00	0.34	0.34	0.00	0.08	0.08	—	358	358	0.02	0.01	0.04	363
Vendor	0.12	0.05	1.94	0.89	0.01	0.02	0.36	0.38	0.02	0.10	0.12	—	1,402	1,402	0.06	0.20	0.09	1,463
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	0.01	0.01	0.01	0.12	0.00	0.00	0.02	0.02	0.00	0.01	0.01	—	25.5	25.5	< 0.005	< 0.005	0.04	25.8
Vendor	0.01	< 0.005	0.14	0.06	< 0.005	< 0.005	0.02	0.03	< 0.005	0.01	0.01	—	98.8	98.8	< 0.005	0.01	0.11	103
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	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	4.22	4.22	< 0.005	< 0.005	0.01	4.28
Vendor	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	16.4	16.4	< 0.005	< 0.005	0.02	17.1
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.25. 15. Cure Deck, Stress Bridge, Strip Falsework (2026) - 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	0.44	0.37	3.45	3.07	0.01	0.14	—	0.14	0.13	—	0.13	—	990	990	0.04	0.01	—	993
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	0.09	0.08	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	27.1	27.1	< 0.005	< 0.005	—	27.2
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	—	4.49	4.49	< 0.005	< 0.005	—	4.51
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	0.16	0.14	0.12	1.53	0.00	0.00	0.34	0.34	0.00	0.08	0.08	—	351	351	0.02	0.01	0.03	356
Vendor	0.11	0.04	1.84	0.85	0.01	0.02	0.36	0.38	0.02	0.10	0.12	—	1,376	1,376	0.05	0.20	0.09	1,437
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	0.04	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	9.71	9.71	< 0.005	< 0.005	0.02	9.85
Vendor	< 0.005	< 0.005	0.05	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	37.7	37.7	< 0.005	0.01	0.04	39.4
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	< 0.005	< 0.005	—	1.61	1.61	< 0.005	< 0.005	< 0.005	1.63
Vendor	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.24	6.24	< 0.005	< 0.005	0.01	6.52
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

3.27. 16. Riprap (Abut 1 & 4) (2025) - 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	0.37	0.31	2.36	4.14	0.01	0.11	—	0.11	0.10	—	0.10	—	643	643	0.03	0.01	—	645
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	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.26	1.26	< 0.005	< 0.005	—	1.26
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	—	0.21	0.21	< 0.005	< 0.005	—	0.21
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	0.03	0.03	0.03	0.32	0.00	0.00	0.07	0.07	0.00	0.02	0.02	—	71.7	71.7	< 0.005	< 0.005	0.01	72.6
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	0.02	0.01	0.39	0.14	< 0.005	0.01	0.07	0.08	0.01	0.02	0.03	—	288	288	0.02	0.05	0.02	301
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.14	0.14	< 0.005	< 0.005	< 0.005	0.14
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	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	—	0.56	0.56	< 0.005	< 0.005	< 0.005	0.59
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	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	—	0.09	0.09	< 0.005	< 0.005	< 0.005	0.10

3.29. 16. Riprap (Abut 1 & 4) (2026) - 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	0.35	0.30	2.15	4.15	0.01	0.09	—	0.09	0.09	—	0.09	—	643	643	0.03	0.01	—	645

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	0.12	0.23	< 0.005	0.01	—	0.01	< 0.005	—	< 0.005	—	35.2	35.2	< 0.005	< 0.005	—	35.4
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	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	5.83	5.83	< 0.005	< 0.005	—	5.85
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	0.03	0.03	0.02	0.31	0.00	0.00	0.07	0.07	0.00	0.02	0.02	—	70.2	70.2	< 0.005	< 0.005	0.01	71.2
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.02	0.01	0.38	0.14	< 0.005	0.01	0.07	0.08	< 0.005	0.02	0.02	—	281	281	0.01	0.05	0.02	295
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.88	3.88	< 0.005	< 0.005	0.01	3.94
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	15.4	15.4	< 0.005	< 0.005	0.01	16.2
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.64	0.64	< 0.005	< 0.005	< 0.005	0.65
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	—	2.55	2.55	< 0.005	< 0.005	< 0.005	2.68

3.31. 17. Sidewalk Barrier Install, Deck Grind (2026) - 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	0.44	0.37	3.45	3.07	0.01	0.14	—	0.14	0.13	—	0.13	—	990	990	0.04	0.01	—	993
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	—	43.4	43.4	< 0.005	< 0.005	—	43.6
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	—	7.19	7.19	< 0.005	< 0.005	—	7.21
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	0.02	0.01	0.01	0.15	0.00	0.00	0.03	0.03	0.00	0.01	0.01	—	35.1	35.1	< 0.005	< 0.005	< 0.005	35.6
Vendor	0.11	0.04	1.84	0.85	0.01	0.02	0.36	0.38	0.02	0.10	0.12	—	1,376	1,376	0.05	0.20	0.09	1,437
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	< 0.005	< 0.005	—	1.55	1.55	< 0.005	< 0.005	< 0.005	1.58
Vendor	< 0.005	< 0.005	0.08	0.04	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	0.01	—	60.3	60.3	< 0.005	0.01	0.06	63.0
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.26	0.26	< 0.005	< 0.005	< 0.005	0.26
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.99	9.99	< 0.005	< 0.005	0.01	10.4
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

3.33. 11. CIDH Piles (Abuts 1, 4) (2025) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.08	0.90	7.93	9.42	0.02	0.33	—	0.33	0.30	—	0.30	—	1,938	1,938	0.08	0.02	—	1,945
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.08	0.90	7.93	9.42	0.02	0.33	—	0.33	0.30	—	0.30	—	1,938	1,938	0.08	0.02	—	1,945

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	0.14	0.11	1.00	1.19	< 0.005	0.04	—	0.04	0.04	—	0.04	—	244	244	0.01	< 0.005	—	245
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	0.02	0.02	0.18	0.22	< 0.005	0.01	—	0.01	0.01	—	0.01	—	40.4	40.4	< 0.005	< 0.005	—	40.6
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.09	0.08	0.06	0.93	0.00	0.00	0.17	0.17	0.00	0.04	0.04	—	190	190	0.01	0.01	0.71	193
Vendor	0.72	0.34	11.3	5.23	0.06	0.11	2.16	2.28	0.11	0.60	0.71	—	8,459	8,459	0.37	1.20	22.0	8,847
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.09	0.08	0.07	0.81	0.00	0.00	0.17	0.17	0.00	0.04	0.04	—	179	179	0.01	0.01	0.02	182
Vendor	0.71	0.33	11.7	5.38	0.06	0.11	2.16	2.28	0.11	0.60	0.71	—	8,464	8,464	0.37	1.20	0.57	8,830
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	0.01	0.01	0.01	0.10	0.00	0.00	0.02	0.02	0.00	< 0.005	< 0.005	—	22.8	22.8	< 0.005	< 0.005	0.04	23.1
Vendor	0.09	0.04	1.46	0.67	0.01	0.01	0.27	0.28	0.01	0.07	0.09	—	1,066	1,066	0.05	0.15	1.20	1,114
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	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.77	3.77	< 0.005	< 0.005	0.01	3.83
Vendor	0.02	0.01	0.27	0.12	< 0.005	< 0.005	0.05	0.05	< 0.005	0.01	0.02	—	177	177	0.01	0.02	0.20	184
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

3.35. 14a. Form, Rebar, Pour (soffit, Stems & decks) (2025) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.45	0.38	3.66	3.12	0.01	0.15	—	0.15	0.14	—	0.14	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.45	0.38	3.66	3.12	0.01	0.15	—	0.15	0.14	—	0.14	—	990	990	0.04	0.01	—	994
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	0.14	0.12	1.16	0.99	< 0.005	0.05	—	0.05	0.04	—	0.04	—	315	315	0.01	< 0.005	—	316
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	0.03	0.02	0.21	0.18	< 0.005	0.01	—	0.01	0.01	—	0.01	—	52.1	52.1	< 0.005	< 0.005	—	52.3

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.24	0.22	0.17	2.50	0.00	0.00	0.46	0.46	0.00	0.11	0.11	—	512	512	0.02	0.02	1.92	520
Vendor	0.25	0.12	3.86	1.79	0.02	0.04	0.74	0.78	0.04	0.21	0.24	—	2,903	2,903	0.13	0.41	7.53	3,036
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.23	0.21	0.18	2.19	0.00	0.00	0.46	0.46	0.00	0.11	0.11	—	484	484	0.03	0.02	0.05	490
Vendor	0.24	0.11	4.01	1.85	0.02	0.04	0.74	0.78	0.04	0.21	0.24	—	2,905	2,905	0.13	0.41	0.20	3,030
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	0.07	0.07	0.06	0.71	0.00	0.00	0.14	0.14	0.00	0.03	0.03	—	155	155	0.01	0.01	0.26	157
Vendor	0.08	0.04	1.27	0.58	0.01	0.01	0.23	0.25	0.01	0.06	0.08	—	923	923	0.04	0.13	1.04	964
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	0.01	0.01	0.01	0.13	0.00	0.00	0.03	0.03	0.00	0.01	0.01	—	25.7	25.7	< 0.005	< 0.005	0.04	26.1
Vendor	0.01	0.01	0.23	0.11	< 0.005	< 0.005	0.04	0.04	< 0.005	0.01	0.01	—	153	153	0.01	0.02	0.17	160
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

3.37. 12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls) (2025) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.86	0.40	13.3	6.18	0.07	0.13	2.56	2.69	0.13	0.71	0.84	—	10,011	10,011	0.44	1.42	26.0	10,470
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.04	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	27.4	27.4	< 0.005	< 0.005	0.03	28.7
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.54	4.54	< 0.005	< 0.005	0.01	4.74
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

3.39. 14b. Form, Rebar, Pour (soffit, Stems & decks) (2025) - 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	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.84	0.39	13.8	6.37	0.07	0.13	2.56	2.69	0.13	0.71	0.84	—	10,016	10,016	0.44	1.42	0.67	10,450
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.04	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	27.4	27.4	< 0.005	< 0.005	0.03	28.7
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.54	4.54	< 0.005	< 0.005	0.01	4.74
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

3.41. 7. Exc Abut 1 (2025) - 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	0.37	0.31	2.36	4.14	0.01	0.11	—	0.11	0.10	—	0.10	—	643	643	0.03	0.01	—	645
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.04	0.07	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	10.6	10.6	< 0.005	< 0.005	—	10.6
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.75	1.75	< 0.005	< 0.005	—	1.76
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	0.03	0.03	0.03	0.32	0.00	0.00	0.07	0.07	0.00	0.02	0.02	—	71.7	71.7	< 0.005	< 0.005	0.01	72.6
Vendor	0.27	0.13	4.49	2.07	0.02	0.04	0.83	0.88	0.04	0.23	0.27	—	3,255	3,255	0.14	0.46	0.22	3,396
Hauling	0.03	0.01	0.59	0.21	< 0.005	0.01	0.11	0.12	0.01	0.03	0.04	—	431	431	0.02	0.07	0.02	452
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.19	1.19	< 0.005	< 0.005	< 0.005	1.21
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	53.5	53.5	< 0.005	0.01	0.06	55.9
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	7.09	7.09	< 0.005	< 0.005	0.01	7.44
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.20	0.20	< 0.005	< 0.005	< 0.005	0.20
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	8.86	8.86	< 0.005	< 0.005	0.01	9.25
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.17	1.17	< 0.005	< 0.005	< 0.005	1.23

3.43. 10. Exc Abut 4 (2025) - 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	0.37	0.31	2.36	4.14	0.01	0.11	—	0.11	0.10	—	0.10	—	643	643	0.03	0.01	—	645

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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.04	0.07	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	10.6	10.6	< 0.005	< 0.005	—	10.6
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.75	1.75	< 0.005	< 0.005	—	1.76
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	0.03	0.03	0.03	0.32	0.00	0.00	0.07	0.07	0.00	0.02	0.02	—	71.7	71.7	< 0.005	< 0.005	0.01	72.6
Vendor	0.27	0.13	4.49	2.07	0.02	0.04	0.83	0.88	0.04	0.23	0.27	—	3,255	3,255	0.14	0.46	0.22	3,396
Hauling	0.03	0.01	0.59	0.21	< 0.005	0.01	0.11	0.12	0.01	0.03	0.04	—	431	431	0.02	0.07	0.02	452

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.19	1.19	< 0.005	< 0.005	< 0.005	1.21
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	53.5	53.5	< 0.005	0.01	0.06	55.9
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	7.09	7.09	< 0.005	< 0.005	0.01	7.44
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.20	0.20	< 0.005	< 0.005	< 0.005	0.20
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	8.86	8.86	< 0.005	< 0.005	0.01	9.25
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.17	1.17	< 0.005	< 0.005	< 0.005	1.23

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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
2. ESA Fencing; Clear & Grub; Mob	Site Preparation	1/1/2025	1/22/2025	5.00	16.0	—

4. Ground Impr Abut 1	Grading	1/22/2025	2/12/2025	5.00	16.0	—
6. Embankment Grading (Abut 1)	Grading	2/12/2025	2/19/2025	5.00	6.00	—
8. Ground Impr Abut 4	Grading	2/19/2025	3/12/2025	5.00	16.0	—
9. Embankment Grading (Abut 4)	Grading	3/12/2025	3/19/2025	5.00	6.00	—
1. General Construction	Building Construction	1/1/2025	2/25/2026	5.00	301	—
3. CIDH Piles (Pier 2, 3)	Building Construction	1/22/2025	2/19/2025	5.00	21.0	—
5. Column Form, Rebar, Pour (Pier 2, 3)	Building Construction	2/12/2025	3/12/2025	5.00	21.0	—
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Building Construction	4/2/2025	7/2/2025	5.00	66.0	—
13. Erect Falsework	Building Construction	5/28/2025	7/23/2025	5.00	41.0	—
15. Cure Deck, Stress Bridge, Strip Falsework	Building Construction	11/26/2025	1/14/2026	5.00	36.0	—
16. Riprap (Abut 1 & 4)	Building Construction	12/31/2025	1/28/2026	5.00	21.0	—
17. Sidewalk Barrier Install, Deck Grind	Building Construction	1/14/2026	2/4/2026	5.00	16.0	—
11. CIDH Piles (Abuts 1, 4)	Building Construction	2/26/2025	4/30/2025	5.00	46.0	—
14a. Form, Rebar, Pour (soffit, Stems & decks)	Building Construction	6/18/2025	11/26/2025	5.00	116	—
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Building Construction	7/1/2025	7/1/2025	5.00	1.00	Concrete trucks for pour
14b. Form, Rebar, Pour (soffit, Stems & decks)	Building Construction	11/25/2025	11/25/2025	5.00	1.00	Concrete trucks for pour
7. Exc Abut 1	Trenching	2/19/2025	2/26/2025	5.00	6.00	—
10. Exc Abut 4	Trenching	3/19/2025	3/26/2025	5.00	6.00	—

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
2. ESA Fencing; Clear & Grub; Mob	Other Construction Equipment	Diesel	Average	1.00	8.00	170	0.42
2. ESA Fencing; Clear & Grub; Mob	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
2. ESA Fencing; Clear & Grub; Mob	Graders	Diesel	Average	1.00	8.00	148	0.41
2. ESA Fencing; Clear & Grub; Mob	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
2. ESA Fencing; Clear & Grub; Mob	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
2. ESA Fencing; Clear & Grub; Mob	Scrapers	Diesel	Average	1.00	8.00	423	0.48
4. Ground Impr Abut 1	Cranes	Diesel	Average	1.00	10.0	367	0.29
4. Ground Impr Abut 1	Bore/Drill Rigs	Diesel	Average	1.00	10.0	83.0	0.50
4. Ground Impr Abut 1	Generator Sets	Diesel	Average	1.00	10.0	14.0	0.74
4. Ground Impr Abut 1	Air Compressors	Diesel	Average	1.00	10.0	37.0	0.48
4. Ground Impr Abut 1	Forklifts	Diesel	Average	1.00	10.0	82.0	0.20
4. Ground Impr Abut 1	Rubber Tired Loaders	Diesel	Average	1.00	10.0	150	0.36
6. Embankment Grading (Abut 1)	Rollers	Diesel	Average	1.00	8.00	36.0	0.38
6. Embankment Grading (Abut 1)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
6. Embankment Grading (Abut 1)	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
6. Embankment Grading (Abut 1)	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
8. Ground Impr Abut 4	Rubber Tired Loaders	Diesel	Average	1.00	10.0	175	0.36
8. Ground Impr Abut 4	Cranes	Diesel	Average	1.00	10.0	367	0.29
8. Ground Impr Abut 4	Bore/Drill Rigs	Diesel	Average	1.00	10.0	83.0	0.50

8. Ground Impr Abut 4	Generator Sets	Diesel	Average	1.00	10.0	14.0	0.74
8. Ground Impr Abut 4	Air Compressors	Diesel	Average	1.00	10.0	37.0	0.48
8. Ground Impr Abut 4	Forklifts	Diesel	Average	1.00	10.0	82.0	0.20
9. Embankment Grading (Abut 4)	Rollers	Diesel	Average	1.00	8.00	36.0	0.38
9. Embankment Grading (Abut 4)	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
9. Embankment Grading (Abut 4)	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
9. Embankment Grading (Abut 4)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
1. General Construction	Air Compressors	Diesel	Average	1.00	8.00	37.0	0.48
1. General Construction	Aerial Lifts	Diesel	Average	1.00	8.00	46.0	0.31
1. General Construction	Cranes	Diesel	Average	1.00	8.00	367	0.29
1. General Construction	Forklifts	Diesel	Average	1.00	8.00	82.0	0.20
1. General Construction	Generator Sets	Diesel	Average	4.00	8.00	14.0	0.74
1. General Construction	Welders	Diesel	Average	1.00	8.00	46.0	0.45
3. CIDH Piles (Pier 2, 3)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
3. CIDH Piles (Pier 2, 3)	Bore/Drill Rigs	Diesel	Average	1.00	8.00	83.0	0.50
3. CIDH Piles (Pier 2, 3)	Cranes	Diesel	Average	1.00	8.00	367	0.29
3. CIDH Piles (Pier 2, 3)	Generator Sets	Diesel	Average	3.00	8.00	14.0	0.74
5. Column Form, Rebar, Pour (Pier 2, 3)	Cranes	Diesel	Average	1.00	8.00	367	0.29
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Cranes	Diesel	Average	1.00	8.00	367	0.29
13. Erect Falsework	Cranes	Diesel	Average	1.00	8.00	367	0.29
15. Cure Deck, Stress Bridge, Strip Falsework	Cranes	Diesel	Average	1.00	8.00	367	0.29
16. Riprap (Abut 1 & 4)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36

16. Riprap (Abut 1 & 4)	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
17. Sidewalk Barrier Install, Deck Grind	Cranes	Diesel	Average	1.00	8.00	367	0.29
11. CIDH Piles (Abuts 1, 4)	Cranes	Diesel	Average	1.00	6.00	367	0.29
11. CIDH Piles (Abuts 1, 4)	Generator Sets	Diesel	Average	3.00	8.00	14.0	0.74
11. CIDH Piles (Abuts 1, 4)	Bore/Drill Rigs	Diesel	Average	1.00	8.00	83.0	0.50
11. CIDH Piles (Abuts 1, 4)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
14a. Form, Rebar, Pour (soffit, Stems & decks)	Cranes	Diesel	Average	1.00	8.00	367	0.29
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Cranes	Diesel	Average	0.00	6.00	367	0.29
14b. Form, Rebar, Pour (soffit, Stems & decks)	Cranes	Diesel	Average	0.00	6.00	367	0.29
7. Exc Abut 1	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
7. Exc Abut 1	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
10. Exc Abut 4	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
10. Exc Abut 4	Excavators	Diesel	Average	1.00	8.00	36.0	0.38

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
2. ESA Fencing; Clear & Grub; Mob	—	—	—	—
2. ESA Fencing; Clear & Grub; Mob	Worker	16.0	12.0	LDA,LDT1,LDT2
2. ESA Fencing; Clear & Grub; Mob	Vendor	4.00	7.63	HHDT,MHDT
2. ESA Fencing; Clear & Grub; Mob	Hauling	8.00	20.0	HHDT

2. ESA Fencing; Clear & Grub; Mob	Onsite truck	—	—	HHDT
4. Ground Impr Abut 1	—	—	—	—
4. Ground Impr Abut 1	Worker	10.0	12.0	LDA,LDT1,LDT2
4. Ground Impr Abut 1	Vendor	6.00	7.63	HHDT,MHDT
4. Ground Impr Abut 1	Hauling	26.0	20.0	HHDT
4. Ground Impr Abut 1	Onsite truck	—	—	HHDT
6. Embankment Grading (Abut 1)	—	—	—	—
6. Embankment Grading (Abut 1)	Worker	12.0	12.0	LDA,LDT1,LDT2
6. Embankment Grading (Abut 1)	Vendor	4.00	7.63	HHDT,MHDT
6. Embankment Grading (Abut 1)	Hauling	4.00	20.0	HHDT
6. Embankment Grading (Abut 1)	Onsite truck	—	—	HHDT
8. Ground Impr Abut 4	—	—	—	—
8. Ground Impr Abut 4	Worker	10.0	12.0	LDA,LDT1,LDT2
8. Ground Impr Abut 4	Vendor	6.00	7.63	HHDT,MHDT
8. Ground Impr Abut 4	Hauling	26.0	20.0	HHDT
8. Ground Impr Abut 4	Onsite truck	—	—	HHDT
9. Embankment Grading (Abut 4)	—	—	—	—
9. Embankment Grading (Abut 4)	Worker	12.0	12.0	LDA,LDT1,LDT2
9. Embankment Grading (Abut 4)	Vendor	4.00	7.63	HHDT,MHDT
9. Embankment Grading (Abut 4)	Hauling	0.00	20.0	HHDT
9. Embankment Grading (Abut 4)	Onsite truck	—	—	HHDT
1. General Construction	—	—	—	—
1. General Construction	Worker	24.0	12.0	LDA,LDT1,LDT2
1. General Construction	Vendor	0.00	7.63	HHDT,MHDT
1. General Construction	Hauling	0.00	20.0	HHDT
1. General Construction	Onsite truck	—	—	HHDT
3. CIDH Piles (Pier 2, 3)	—	—	—	—

3. CIDH Piles (Pier 2, 3)	Worker	20.0	12.0	LDA,LDT1,LDT2
3. CIDH Piles (Pier 2, 3)	Vendor	338	7.63	HHDT,MHDT
3. CIDH Piles (Pier 2, 3)	Hauling	0.00	20.0	HHDT
3. CIDH Piles (Pier 2, 3)	Onsite truck	0.00	0.00	HHDT
5. Column Form, Rebar, Pour (Pier 2, 3)	—	—	—	—
5. Column Form, Rebar, Pour (Pier 2, 3)	Worker	24.0	12.0	LDA,LDT1,LDT2
5. Column Form, Rebar, Pour (Pier 2, 3)	Vendor	116	7.63	HHDT,MHDT
5. Column Form, Rebar, Pour (Pier 2, 3)	Hauling	0.00	20.0	HHDT
5. Column Form, Rebar, Pour (Pier 2, 3)	Onsite truck	0.00	0.00	HHDT
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	—	—	—	—
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Worker	44.0	12.0	LDA,LDT1,LDT2
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Vendor	116	7.63	HHDT,MHDT
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Hauling	0.00	20.0	HHDT
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Onsite truck	0.00	0.00	HHDT
13. Erect Falsework	—	—	—	—
13. Erect Falsework	Worker	40.0	12.0	LDA,LDT1,LDT2
13. Erect Falsework	Vendor	0.00	7.63	HHDT,MHDT
13. Erect Falsework	Hauling	0.00	20.0	HHDT
13. Erect Falsework	Onsite truck	—	—	HHDT
15. Cure Deck, Stress Bridge, Strip Falsework	—	—	—	—

15. Cure Deck, Stress Bridge, Strip Falsework	Worker	40.0	12.0	LDA,LDT1,LDT2
15. Cure Deck, Stress Bridge, Strip Falsework	Vendor	56.0	7.63	HHDT,MHDT
15. Cure Deck, Stress Bridge, Strip Falsework	Hauling	0.00	20.0	HHDT
15. Cure Deck, Stress Bridge, Strip Falsework	Onsite truck	0.00	0.00	HHDT
16. Riprap (Abut 1 & 4)	—	—	—	—
16. Riprap (Abut 1 & 4)	Worker	8.00	12.0	LDA,LDT1,LDT2
16. Riprap (Abut 1 & 4)	Vendor	0.00	7.63	HHDT,MHDT
16. Riprap (Abut 1 & 4)	Hauling	4.00	20.0	HHDT
16. Riprap (Abut 1 & 4)	Onsite truck	—	—	HHDT
17. Sidewalk Barrier Install, Deck Grind	—	—	—	—
17. Sidewalk Barrier Install, Deck Grind	Worker	4.00	12.0	LDA,LDT1,LDT2
17. Sidewalk Barrier Install, Deck Grind	Vendor	56.0	7.63	HHDT,MHDT
17. Sidewalk Barrier Install, Deck Grind	Hauling	0.00	20.0	HHDT
17. Sidewalk Barrier Install, Deck Grind	Onsite truck	0.00	0.00	HHDT
7. Exc Abut 1	—	—	—	—
7. Exc Abut 1	Worker	8.00	12.0	LDA,LDT1,LDT2
7. Exc Abut 1	Vendor	130	7.63	HHDT,MHDT
7. Exc Abut 1	Hauling	6.00	20.0	HHDT
7. Exc Abut 1	Onsite truck	0.00	0.00	HHDT
10. Exc Abut 4	—	—	—	—
10. Exc Abut 4	Worker	8.00	12.0	LDA,LDT1,LDT2
10. Exc Abut 4	Vendor	130	7.63	HHDT,MHDT
10. Exc Abut 4	Hauling	6.00	20.0	HHDT
10. Exc Abut 4	Onsite truck	0.00	0.00	HHDT
11. CIDH Piles (Abuts 1, 4)	—	—	—	—

11. CIDH Piles (Abuts 1, 4)	Worker	20.0	12.0	LDA,LDT1,LDT2
11. CIDH Piles (Abuts 1, 4)	Vendor	338	7.63	HHDT,MHDT
11. CIDH Piles (Abuts 1, 4)	Hauling	0.00	20.0	HHDT
11. CIDH Piles (Abuts 1, 4)	Onsite truck	—	—	HHDT
14a. Form, Rebar, Pour (soffit, Stems & decks)	—	—	—	—
14a. Form, Rebar, Pour (soffit, Stems & decks)	Worker	54.0	12.0	LDA,LDT1,LDT2
14a. Form, Rebar, Pour (soffit, Stems & decks)	Vendor	116	7.63	HHDT,MHDT
14a. Form, Rebar, Pour (soffit, Stems & decks)	Hauling	0.00	20.0	HHDT
14a. Form, Rebar, Pour (soffit, Stems & decks)	Onsite truck	—	—	HHDT
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	—	—	—	—
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Worker	0.00	12.0	LDA,LDT1,LDT2
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Vendor	400	7.63	HHDT,MHDT
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Hauling	0.00	20.0	HHDT
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Onsite truck	—	—	HHDT
14b. Form, Rebar, Pour (soffit, Stems & decks)	—	—	—	—
14b. Form, Rebar, Pour (soffit, Stems & decks)	Worker	0.00	12.0	LDA,LDT1,LDT2
14b. Form, Rebar, Pour (soffit, Stems & decks)	Vendor	400	7.63	HHDT,MHDT
14b. Form, Rebar, Pour (soffit, Stems & decks)	Hauling	0.00	20.0	HHDT

14b. Form, Rebar, Pour (soffit, Stems & decks)	Onsite truck	—	—	HHDT

5.4. Vehicles

5.4.1. Construction Vehicle Control Strategies

Non-applicable. No control strategies activated by user.

5.5. Architectural Coatings

Phase Name	Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)

5.6. Dust Mitigation

5.6.1. Construction Earthmoving Activities

Phase Name	Material Imported (cy)	Material Exported (cy)	Acres Graded (acres)	Material Demolished (sq. ft.)	Acres Paved (acres)
2. ESA Fencing; Clear & Grub; Mob	—	—	32.0	0.00	—
4. Ground Impr Abut 1	1,500	1,500	0.00	0.00	—
6. Embankment Grading (Abut 1)	—	—	3.00	0.00	—
8. Ground Impr Abut 4	1,500	1,500	0.00	0.00	—
9. Embankment Grading (Abut 4)	—	—	3.00	0.00	—
7. Exc Abut 1	—	500	0.00	0.00	—
10. Exc Abut 4	—	500	0.00	0.00	—

5.6.2. Construction Earthmoving Control Strategies

Non-applicable. No control strategies activated by user.

5.7. Construction Paving

Land Use	Area Paved (acres)	% Asphalt
User Defined Industrial	0.00	0%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2025	0.00	589	0.03	< 0.005
2026	0.00	589	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	7.50	annual days of extreme heat
Extreme Precipitation	2.70	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	3.64	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (Radke et al., 2017, CEC-500-2017-008), and consider inundation location and depth for the San Francisco Bay, the Sacramento-San Joaquin River Delta and California coast resulting different increments of sea level rise coupled with extreme storm events. Users may select from four scenarios to view the range in potential inundation depth for the grid cell. The four scenarios are: No rise, 0.5 meter, 1.0 meter, 1.41 meters
Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

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

Air Quality Degradation	N/A	N/A	N/A	N/A

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

6.3. Adjusted Climate Risk Scores

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

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores 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	37.6
AQ-PM	44.5
AQ-DPM	45.5
Drinking Water	29.0
Lead Risk Housing	21.4
Pesticides	0.00
Toxic Releases	35.8
Traffic	55.5
Effect Indicators	—
CleanUp Sites	33.9
Groundwater	64.5
Haz Waste Facilities/Generators	87.7
Impaired Water Bodies	72.2
Solid Waste	0.00
Sensitive Population	—
Asthma	27.1
Cardio-vascular	4.32
Low Birth Weights	20.9
Socioeconomic Factor Indicators	—
Education	16.8
Housing	30.2
Linguistic	22.2
Poverty	15.6
Unemployment	72.5

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	58.91184396
Employed	48.77454125
Median HI	71.4744001
Education	—
Bachelor's or higher	75.77312973
High school enrollment	100
Preschool enrollment	88.27152573
Transportation	—
Auto Access	26.42114718
Active commuting	41.99923008
Social	—
2-parent households	74.72090337
Voting	67.3681509
Neighborhood	—
Alcohol availability	81.09842166
Park access	81.35506224
Retail density	19.41485949
Supermarket access	2.399589375
Tree canopy	35.94251251
Housing	—
Homeownership	34.7747979
Housing habitability	66.35442063
Low-inc homeowner severe housing cost burden	65.0455537
Low-inc renter severe housing cost burden	68.13807263
Uncrowded housing	60.05389452

Health Outcomes	—
Insured adults	71.87219299
Arthritis	89.2
Asthma ER Admissions	73.3
High Blood Pressure	94.0
Cancer (excluding skin)	55.0
Asthma	72.9
Coronary Heart Disease	88.8
Chronic Obstructive Pulmonary Disease	86.1
Diagnosed Diabetes	92.6
Life Expectancy at Birth	51.7
Cognitively Disabled	36.6
Physically Disabled	77.4
Heart Attack ER Admissions	89.3
Mental Health Not Good	69.9
Chronic Kidney Disease	90.3
Obesity	79.9
Pedestrian Injuries	19.6
Physical Health Not Good	90.6
Stroke	88.3
Health Risk Behaviors	—
Binge Drinking	2.4
Current Smoker	68.2
No Leisure Time for Physical Activity	83.8
Climate Change Exposures	—
Wildfire Risk	57.5
SLR Inundation Area	0.0

Children	87.0
Elderly	73.1
English Speaking	54.0
Foreign-born	27.7
Outdoor Workers	56.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	31.6
Traffic Density	37.9
Traffic Access	48.8
Other Indices	—
Hardship	21.0
Other Decision Support	—
2016 Voting	74.1

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	19.0
Healthy Places Index Score for Project Location (b)	70.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
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	Project footprint estimated to be approx 1.5 acres.
Construction: Construction Phases	Construction assumptions provided by project engineers.
Construction: Off-Road Equipment	Construction assumptions provided by project engineers.
Construction: Dust From Material Movement	Construction assumptions provided by project engineers.
Construction: Trips and VMT	Construction assumptions provided by project engineers.

Fenton Construction Phase 2 - CIP Detailed Report

Off-Site Improvements

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Fenton Construction Phase 2 - CIP
Construction Start Date	2/11/2026
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	2.50
Precipitation (days)	19.8
Location	Fenton Pkwy, San Diego, CA 92108, USA
County	San Diego
City	San Diego
Air District	San Diego County APCD
Air Basin	San Diego
TAZ	6340
EDFZ	12
Electric Utility	San Diego Gas & Electric
Gas Utility	San Diego Gas & Electric
App Version	2022.1.1.21

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
Road Construction	0.10	Mile	0.15	0.00	—	—	—	—

Other Non-Asphalt Surfaces	0.15	Acre	0.15	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.	4.43	3.30	40.0	35.8	0.13	1.29	6.40	7.69	1.14	1.21	2.35	—	17,784	17,784	0.83	1.83	0.62	18,352
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.26	0.21	2.14	2.13	0.01	0.07	0.31	0.39	0.07	0.05	0.12	—	830	830	0.04	0.07	0.39	852
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.05	0.04	0.39	0.39	< 0.005	0.01	0.06	0.07	0.01	0.01	0.02	—	137	137	0.01	0.01	0.06	141

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2026	4.43	3.30	40.0	35.8	0.13	1.29	6.40	7.69	1.14	1.21	2.35	—	17,784	17,784	0.83	1.83	0.62	18,352
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2026	0.26	0.21	2.14	2.13	0.01	0.07	0.31	0.39	0.07	0.05	0.12	—	830	830	0.04	0.07	0.39	852
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2026	0.05	0.04	0.39	0.39	< 0.005	0.01	0.06	0.07	0.01	0.01	0.02	—	137	137	0.01	0.01	0.06	141

3. Construction Emissions Details

3.1. Linear, Grubbing & Land Clearing (2026) - 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	0.44	0.37	3.22	3.48	< 0.005	0.19	—	0.19	0.17	—	0.17	—	490	490	0.02	< 0.005	—	492
Dust From Material Movement	—	—	—	—	—	—	0.53	0.53	—	0.06	0.06	—	—	—	—	—	—	—
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.03	4.03	< 0.005	< 0.005	—	4.04
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.67	0.67	< 0.005	< 0.005	—	0.67
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	0.02	0.02	0.02	0.23	0.00	0.00	0.05	0.05	0.00	0.01	0.01	—	52.7	52.7	< 0.005	< 0.005	0.01	53.4
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	49.2	49.2	< 0.005	0.01	< 0.005	51.3
Hauling	0.06	0.02	1.13	0.42	0.01	0.02	0.22	0.24	0.01	0.06	0.07	—	844	844	0.04	0.14	0.05	886
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.44	0.44	< 0.005	< 0.005	< 0.005	0.44
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.40	0.40	< 0.005	< 0.005	< 0.005	0.42
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.94	6.94	< 0.005	< 0.005	0.01	7.29
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.07	0.07	< 0.005	< 0.005	< 0.005	0.07
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.07	0.07	< 0.005	< 0.005	< 0.005	0.07
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.15	1.15	< 0.005	< 0.005	< 0.005	1.21

3.3. Linear, Grading & Excavation (2026) - 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	3.52	2.96	25.2	29.1	0.06	1.09	—	1.09	1.00	—	1.00	—	6,495	6,495	0.26	0.05	—	6,517
Dust From Material Movement	—	—	—	—	—	—	3.24	3.24	—	0.35	0.35	—	—	—	—	—	—	—
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	0.12	0.10	0.83	0.96	< 0.005	0.04	—	0.04	0.03	—	0.03	—	214	214	0.01	< 0.005	—	214
Dust From Material Movement	—	—	—	—	—	—	0.11	0.11	—	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	0.02	0.02	0.15	0.17	< 0.005	0.01	—	0.01	0.01	—	0.01	—	35.4	35.4	< 0.005	< 0.005	—	35.5
Dust From Material Movement	—	—	—	—	—	—	0.02	0.02	—	< 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	0.12	0.11	0.09	1.14	0.00	0.00	0.25	0.25	0.00	0.06	0.06	—	263	263	0.01	0.01	0.03	267
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	49.2	49.2	< 0.005	0.01	< 0.005	51.3
Hauling	0.79	0.23	14.7	5.48	0.07	0.21	2.89	3.10	0.14	0.79	0.93	—	10,977	10,977	0.55	1.76	0.60	11,517
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.04	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	8.74	8.74	< 0.005	< 0.005	0.01	8.86
Vendor	< 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	1.69
Hauling	0.03	0.01	0.48	0.18	< 0.005	0.01	0.09	0.10	< 0.005	0.03	0.03	—	361	361	0.02	0.06	0.33	379
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.45	1.45	< 0.005	< 0.005	< 0.005	1.47
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.27	0.27	< 0.005	< 0.005	< 0.005	0.28
Hauling	< 0.005	< 0.005	0.09	0.03	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	0.01	—	59.7	59.7	< 0.005	0.01	0.05	62.7

3.5. Linear, Drainage, Utilities, & Sub-Grade (2026) - 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	2.85	2.39	21.2	23.3	0.05	0.83	—	0.83	0.76	—	0.76	—	5,693	5,693	0.23	0.05	—	5,712
Dust From Material Movement	—	—	—	—	—	—	2.66	2.66	—	0.29	0.29	—	—	—	—	—	—	—
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	0.09	0.07	0.64	0.70	< 0.005	0.02	—	0.02	0.02	—	0.02	—	172	172	0.01	< 0.005	—	172
Dust From Material Movement	—	—	—	—	—	—	0.08	0.08	—	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	0.02	0.01	0.12	0.13	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	28.4	28.4	< 0.005	< 0.005	—	28.5
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	0.10	0.09	0.08	0.99	0.00	0.00	0.22	0.22	0.00	0.05	0.05	—	228	228	0.01	0.01	0.02	231
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	49.2	49.2	< 0.005	0.01	< 0.005	51.3
Hauling	0.06	0.02	1.13	0.42	0.01	0.02	0.22	0.24	0.01	0.06	0.07	—	844	844	0.04	0.14	0.05	886
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.03	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	6.94	6.94	< 0.005	< 0.005	0.01	7.04
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.48	1.48	< 0.005	< 0.005	< 0.005	1.55
Hauling	< 0.005	< 0.005	0.03	0.01	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	25.4	25.4	< 0.005	< 0.005	0.02	26.7
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.15	1.15	< 0.005	< 0.005	< 0.005	1.17
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.25	0.25	< 0.005	< 0.005	< 0.005	0.26
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.21	4.21	< 0.005	< 0.005	< 0.005	4.42

3.7. Linear, Paving (2026) - 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	1.00	0.84	7.37	10.8	0.01	0.30	—	0.30	0.28	—	0.28	—	1,619	1,619	0.07	0.01	—	1,625

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	0.15	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	22.2	22.2	< 0.005	< 0.005	—	22.3
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	3.67	3.67	< 0.005	< 0.005	—	3.68
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	0.07	0.06	0.06	0.69	0.00	0.00	0.15	0.15	0.00	0.04	0.04	—	158	158	0.01	0.01	0.02	160
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	49.2	49.2	< 0.005	0.01	< 0.005	51.3
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	< 0.005	< 0.005	—	2.18	2.18	< 0.005	< 0.005	< 0.005	2.22
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.67	0.67	< 0.005	< 0.005	< 0.005	0.70
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	< 0.005	< 0.005	—	0.36	0.36	< 0.005	< 0.005	< 0.005	0.37
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.11	0.11	< 0.005	< 0.005	< 0.005	0.12
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 (2026) - 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	0.15	0.12	0.86	1.13	< 0.005	0.02	—	0.02	0.02	—	0.02	—	134	134	0.01	< 0.005	—	134
Architectural Coatings	—	0.36	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.83	1.83	< 0.005	< 0.005	—	1.84
Architectural Coatings	—	< 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	—	0.30	0.30	< 0.005	< 0.005	—	0.30
Architectural Coatings	—	< 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	0.02	0.02	0.02	0.23	0.00	0.00	0.05	0.05	0.00	0.01	0.01	—	52.7	52.7	< 0.005	< 0.005	0.01	53.4
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	49.2	49.2	< 0.005	0.01	< 0.005	51.3
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	< 0.005	< 0.005	—	0.73	0.73	< 0.005	< 0.005	< 0.005	0.74
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.67	0.67	< 0.005	< 0.005	< 0.005	0.70
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	< 0.005	< 0.005	—	0.12	0.12	< 0.005	< 0.005	< 0.005	0.12
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.11	0.11	< 0.005	< 0.005	< 0.005	0.12
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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequest ered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Remove d	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequest ered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Remove d	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequest ered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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
Linear, Grubbing & Land Clearing	Linear, Grubbing & Land Clearing	2/9/2026	2/11/2026	5.00	3.00	—
Linear, Grading & Excavation	Linear, Grading & Excavation	2/12/2026	2/27/2026	5.00	12.0	—
Linear, Drainage, Utilities, & Sub-Grade	Linear, Drainage, Utilities, & Sub-Grade	3/2/2026	3/16/2026	5.00	11.0	—
Linear, Paving	Linear, Paving	3/17/2026	3/23/2026	5.00	5.00	—
Architectural Coating	Architectural Coating	3/24/2026	3/30/2026	5.00	5.00	—

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
Linear, Grubbing & Land Clearing	Crawler Tractors	Diesel	Average	1.00	8.00	87.0	0.43
Linear, Grubbing & Land Clearing	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
Linear, Grubbing & Land Clearing	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Grading & Excavation	Crawler Tractors	Diesel	Average	1.00	8.00	87.0	0.43

Linear, Grading & Excavation	Excavators	Diesel	Average	3.00	8.00	36.0	0.38
Linear, Grading & Excavation	Graders	Diesel	Average	1.00	8.00	148	0.41
Linear, Grading & Excavation	Rollers	Diesel	Average	2.00	8.00	36.0	0.38
Linear, Grading & Excavation	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
Linear, Grading & Excavation	Scrapers	Diesel	Average	2.00	8.00	423	0.48
Linear, Grading & Excavation	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Grading & Excavation	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Linear, Drainage, Utilities, & Sub-Grade	Air Compressors	Diesel	Average	1.00	8.00	37.0	0.48
Linear, Drainage, Utilities, & Sub-Grade	Generator Sets	Diesel	Average	1.00	8.00	14.0	0.74
Linear, Drainage, Utilities, & Sub-Grade	Graders	Diesel	Average	1.00	8.00	148	0.41
Linear, Drainage, Utilities, & Sub-Grade	Plate Compactors	Diesel	Average	1.00	8.00	8.00	0.43
Linear, Drainage, Utilities, & Sub-Grade	Pumps	Diesel	Average	1.00	8.00	11.0	0.74
Linear, Drainage, Utilities, & Sub-Grade	Rough Terrain Forklifts	Diesel	Average	1.00	8.00	96.0	0.40
Linear, Drainage, Utilities, & Sub-Grade	Scrapers	Diesel	Average	2.00	8.00	423	0.48
Linear, Drainage, Utilities, & Sub-Grade	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Drainage, Utilities, & Sub-Grade	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Linear, Paving	Pavers	Diesel	Average	1.00	8.00	81.0	0.42

Linear, Paving	Paving Equipment	Diesel	Average	1.00	8.00	89.0	0.36
Linear, Paving	Rollers	Diesel	Average	3.00	8.00	36.0	0.38
Linear, Paving	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Paving	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Architectural Coating	Air Compressors	Diesel	Average	1.00	6.00	37.0	0.48

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Architectural Coating	—	—	—	—
Architectural Coating	Worker	6.00	12.0	LDA,LDT1,LDT2
Architectural Coating	Vendor	2.00	7.63	HHDT,MHDT
Architectural Coating	Hauling	0.00	20.0	HHDT
Architectural Coating	Onsite truck	—	—	HHDT
Linear, Grubbing & Land Clearing	—	—	—	—
Linear, Grubbing & Land Clearing	Worker	6.00	12.0	LDA,LDT1,LDT2
Linear, Grubbing & Land Clearing	Vendor	2.00	7.63	HHDT,MHDT
Linear, Grubbing & Land Clearing	Hauling	12.0	20.0	HHDT
Linear, Grubbing & Land Clearing	Onsite truck	—	—	HHDT
Linear, Grading & Excavation	—	—	—	—
Linear, Grading & Excavation	Worker	30.0	12.0	LDA,LDT1,LDT2
Linear, Grading & Excavation	Vendor	2.00	7.63	HHDT,MHDT
Linear, Grading & Excavation	Hauling	156	20.0	HHDT
Linear, Grading & Excavation	Onsite truck	—	—	HHDT
Linear, Drainage, Utilities, & Sub-Grade	—	—	—	—
Linear, Drainage, Utilities, & Sub-Grade	Worker	26.0	12.0	LDA,LDT1,LDT2

Linear, Drainage, Utilities, & Sub-Grade	Vendor	2.00	7.63	HHDT,MHDT
Linear, Drainage, Utilities, & Sub-Grade	Hauling	12.0	20.0	HHDT
Linear, Drainage, Utilities, & Sub-Grade	Onsite truck	—	—	HHDT
Linear, Paving	—	—	—	—
Linear, Paving	Worker	18.0	12.0	LDA,LDT1,LDT2
Linear, Paving	Vendor	2.00	7.63	HHDT,MHDT
Linear, Paving	Hauling	0.00	20.0	HHDT
Linear, Paving	Onsite truck	—	—	HHDT

5.4. Vehicles

5.4.1. Construction Vehicle Control Strategies

Non-applicable. No control strategies activated by user.

5.5. Architectural Coatings

Phase Name	Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
Architectural Coating	0.00	0.00	0.00	0.00	392

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)
Linear, Grubbing & Land Clearing	—	250	0.15	0.00	—
Linear, Grading & Excavation	13,400	200	0.15	0.00	—
Linear, Drainage, Utilities, & Sub-Grade	1,036	—	0.15	0.00	—

5.6.2. Construction Earthmoving Control Strategies

Non-applicable. No control strategies activated by user.

5.7. Construction Paving

Land Use	Area Paved (acres)	% Asphalt
Road Construction	0.15	100%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2026	0.00	589	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	7.50	annual days of extreme heat
Extreme Precipitation	2.70	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	3.64	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (Radke et al., 2017, CEC-500-2017-008), and consider inundation location and depth for the San Francisco Bay, the Sacramento-San Joaquin River Delta and California coast resulting different increments of sea level rise coupled with extreme storm events. Users may select from four scenarios to view the range in potential inundation depth for the grid cell. The four scenarios are: No rise, 0.5 meter, 1.0 meter, 1.41 meters
Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

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

Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

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

6.3. Adjusted Climate Risk Scores

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

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores 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	37.6
AQ-PM	44.5
AQ-DPM	45.5
Drinking Water	29.0
Lead Risk Housing	21.4
Pesticides	0.00
Toxic Releases	35.8
Traffic	55.5
Effect Indicators	—
CleanUp Sites	33.9
Groundwater	64.5
Haz Waste Facilities/Generators	87.7
Impaired Water Bodies	72.2
Solid Waste	0.00
Sensitive Population	—
Asthma	27.1
Cardio-vascular	4.32
Low Birth Weights	20.9
Socioeconomic Factor Indicators	—
Education	16.8
Housing	30.2
Linguistic	22.2
Poverty	15.6
Unemployment	72.5

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	58.91184396
Employed	48.77454125
Median HI	71.4744001
Education	—
Bachelor's or higher	75.77312973
High school enrollment	100
Preschool enrollment	88.27152573
Transportation	—
Auto Access	26.42114718
Active commuting	41.99923008
Social	—
2-parent households	74.72090337
Voting	67.3681509
Neighborhood	—
Alcohol availability	81.09842166
Park access	81.35506224
Retail density	19.41485949
Supermarket access	2.399589375
Tree canopy	35.94251251
Housing	—
Homeownership	34.7747979
Housing habitability	66.35442063
Low-inc homeowner severe housing cost burden	65.0455537

Low-inc renter severe housing cost burden	68.13807263
Uncrowded housing	60.05389452
Health Outcomes	—
Insured adults	71.87219299
Arthritis	89.2
Asthma ER Admissions	73.3
High Blood Pressure	94.0
Cancer (excluding skin)	55.0
Asthma	72.9
Coronary Heart Disease	88.8
Chronic Obstructive Pulmonary Disease	86.1
Diagnosed Diabetes	92.6
Life Expectancy at Birth	51.7
Cognitively Disabled	36.6
Physically Disabled	77.4
Heart Attack ER Admissions	89.3
Mental Health Not Good	69.9
Chronic Kidney Disease	90.3
Obesity	79.9
Pedestrian Injuries	19.6
Physical Health Not Good	90.6
Stroke	88.3
Health Risk Behaviors	—
Binge Drinking	2.4
Current Smoker	68.2
No Leisure Time for Physical Activity	83.8
Climate Change Exposures	—

Wildfire Risk	57.5
SLR Inundation Area	0.0
Children	87.0
Elderly	73.1
English Speaking	54.0
Foreign-born	27.7
Outdoor Workers	56.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	31.6
Traffic Density	37.9
Traffic Access	48.8
Other Indices	—
Hardship	21.0
Other Decision Support	—
2016 Voting	74.1

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	19.0
Healthy Places Index Score for Project Location (b)	70.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
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	Construction assumptions provided by project engineers.
Construction: Trips and VMT	Workers included for architectural coating phase.
Construction: Paving	Paving only required once.

Fenton Construction Phase 1 - CIP HRA Detailed Report

Bridge Construction

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8. User Changes to Default Data

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Fenton Construction Phase 1 - CIP HRA
Construction Start Date	1/1/2025
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	2.50
Precipitation (days)	19.8
Location	Fenton Pkwy, San Diego, CA 92108, USA
County	San Diego
City	San Diego
Air District	San Diego County APCD
Air Basin	San Diego
TAZ	6340
EDFZ	12
Electric Utility	San Diego Gas & Electric
Gas Utility	San Diego Gas & Electric
App Version	2022.1.1.21

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
User Defined Industrial	0.20	User Defined Unit	1.50	0.00	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

Sector	#	Measure Title
Construction	C-5	Use Advanced Engine Tiers

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, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	3.39	2.75	28.6	26.2	0.05	0.88	0.10	0.95	0.81	0.03	0.83	—	6,131	6,131	0.39	0.21	1.02	6,203
Mit.	1.66	1.37	14.9	31.7	0.05	0.31	0.10	0.38	0.29	0.03	0.31	—	6,131	6,131	0.39	0.21	1.02	6,203
% Reduced	51%	50%	48%	-21%	—	65%	—	60%	64%	—	62%	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	7.73	6.39	59.7	63.1	0.12	2.32	8.21	10.5	2.13	3.56	5.69	—	12,984	12,984	0.64	0.26	0.03	13,060
Mit.	2.53	2.16	23.9	74.4	0.12	0.49	8.21	8.70	0.46	3.56	4.02	—	12,984	12,984	0.64	0.26	0.03	13,060
% Reduced	67%	66%	60%	-18%	—	79%	—	17%	78%	—	29%	—	—	—	—	—	—	—
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	2.06	1.70	16.1	15.3	0.03	0.57	0.60	1.16	0.52	0.27	0.79	—	3,413	3,413	0.17	0.06	0.10	3,436
Mit.	0.83	0.71	7.55	18.7	0.03	0.17	0.60	0.76	0.16	0.27	0.43	—	3,413	3,413	0.17	0.06	0.10	3,436
% Reduced	60%	58%	53%	-22%	—	70%	—	34%	70%	—	46%	—	—	—	—	—	—	—

Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.38	0.31	2.93	2.79	0.01	0.10	0.11	0.21	0.10	0.05	0.14	—	565	565	0.03	0.01	0.02	569
Mit.	0.15	0.13	1.38	3.41	0.01	0.03	0.11	0.14	0.03	0.05	0.08	—	565	565	0.03	0.01	0.02	569
% Reduced	60%	58%	53%	-22%	—	70%	—	34%	70%	—	46%	—	—	—	—	—	—	—

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	3.39	2.75	28.6	26.2	0.05	0.88	0.10	0.95	0.81	0.03	0.83	—	6,131	6,131	0.39	0.21	1.02	6,203
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	7.73	6.39	59.7	63.1	0.12	2.32	8.21	10.5	2.13	3.56	5.69	—	12,984	12,984	0.64	0.26	0.03	13,060
2026	2.77	2.30	20.8	21.4	0.05	0.75	0.02	0.77	0.69	0.01	0.69	—	4,912	4,912	0.22	0.07	< 0.005	4,938
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	2.06	1.70	16.1	15.3	0.03	0.57	0.60	1.16	0.52	0.27	0.79	—	3,413	3,413	0.17	0.06	0.10	3,436
2026	0.21	0.18	1.56	1.59	< 0.005	0.06	< 0.005	0.06	0.05	< 0.005	0.05	—	342	342	0.01	< 0.005	< 0.005	344
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	0.38	0.31	2.93	2.79	0.01	0.10	0.11	0.21	0.10	0.05	0.14	—	565	565	0.03	0.01	0.02	569
2026	0.04	0.03	0.28	0.29	< 0.005	0.01	< 0.005	0.01	0.01	< 0.005	0.01	—	56.6	56.6	< 0.005	< 0.005	< 0.005	56.9

2.3. Construction Emissions by Year, Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	1.66	1.37	14.9	31.7	0.05	0.31	0.10	0.38	0.29	0.03	0.31	—	6,131	6,131	0.39	0.21	1.02	6,203
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	2.53	2.16	23.9	74.4	0.12	0.49	8.21	8.70	0.46	3.56	4.02	—	12,984	12,984	0.64	0.26	0.03	13,060
2026	1.02	0.90	9.48	27.1	0.05	0.21	0.02	0.23	0.20	0.01	0.20	—	4,912	4,912	0.22	0.07	< 0.005	4,938
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	0.83	0.71	7.55	18.7	0.03	0.17	0.60	0.76	0.16	0.27	0.43	—	3,413	3,413	0.17	0.06	0.10	3,436
2026	0.09	0.08	0.82	1.93	< 0.005	0.02	< 0.005	0.02	0.02	< 0.005	0.02	—	342	342	0.01	< 0.005	< 0.005	344
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	0.15	0.13	1.38	3.41	0.01	0.03	0.11	0.14	0.03	0.05	0.08	—	565	565	0.03	0.01	0.02	569
2026	0.02	0.01	0.15	0.35	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	56.6	56.6	< 0.005	< 0.005	< 0.005	56.9

3. Construction Emissions Details

3.1. 2. ESA Fencing; Clear & Grub; Mob (2025) - 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	3.17	2.67	24.1	24.9	0.05	1.08	—	1.08	1.00	—	1.00	—	5,146	5,146	0.21	0.04	—	5,164
Dust From Material Movement	—	—	—	—	—	—	8.14	8.14	—	3.54	3.54	—	—	—	—	—	—	—
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	0.14	0.12	1.06	1.09	< 0.005	0.05	—	0.05	0.04	—	0.04	—	226	226	0.01	< 0.005	—	226
Dust From Material Movement	—	—	—	—	—	—	0.36	0.36	—	0.16	0.16	—	—	—	—	—	—	—
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	0.03	0.02	0.19	0.20	< 0.005	0.01	—	0.01	0.01	—	0.01	—	37.3	37.3	< 0.005	< 0.005	—	37.5
Dust From Material Movement	—	—	—	—	—	—	0.07	0.07	—	0.03	0.03	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Vendor	< 0.005	< 0.005	0.05	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.82	6.82	< 0.005	< 0.005	< 0.005	7.16
Hauling	0.01	< 0.005	0.13	0.09	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	19.3	19.3	< 0.005	< 0.005	< 0.005	20.4
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.30	0.30	< 0.005	< 0.005	< 0.005	0.31
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.84	0.84	< 0.005	< 0.005	< 0.005	0.89
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.05	0.05	< 0.005	< 0.005	< 0.005	0.05
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.14	0.14	< 0.005	< 0.005	< 0.005	0.15

3.2. 2. ESA Fencing; Clear & Grub; Mob (2025) - Mitigated

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	0.49	0.49	3.12	29.2	0.05	0.10	—	0.10	0.10	—	0.10	—	5,146	5,146	0.21	0.04	—	5,164
Dust From Material Movement	—	—	—	—	—	—	8.14	8.14	—	3.54	3.54	—	—	—	—	—	—	—
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	0.14	1.28	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	226	226	0.01	< 0.005	—	226
Dust From Material Movement	—	—	—	—	—	—	0.36	0.36	—	0.16	0.16	—	—	—	—	—	—	—
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	0.23	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	37.3	37.3	< 0.005	< 0.005	—	37.5
Dust From Material Movement	—	—	—	—	—	—	0.07	0.07	—	0.03	0.03	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.05	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.82	6.82	< 0.005	< 0.005	< 0.005	7.16
Hauling	0.01	< 0.005	0.13	0.09	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	19.3	19.3	< 0.005	< 0.005	< 0.005	20.4
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.30	0.30	< 0.005	< 0.005	< 0.005	0.31

Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.84	0.84	< 0.005	< 0.005	< 0.005	0.89
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.05	0.05	< 0.005	< 0.005	< 0.005	0.05
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.14	0.14	< 0.005	< 0.005	< 0.005	0.15

3.3. 4. Ground Impr Abut 1 (2025) - 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	1.56	1.30	11.5	14.6	0.03	0.47	—	0.47	0.43	—	0.43	—	2,885	2,885	0.12	0.02	—	2,895
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.07	0.06	0.50	0.64	< 0.005	0.02	—	0.02	0.02	—	0.02	—	126	126	0.01	< 0.005	—	127
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.09	0.12	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	20.9	20.9	< 0.005	< 0.005	—	21.0
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	10.2	10.2	< 0.005	< 0.005	< 0.005	10.7
Hauling	0.03	0.02	0.43	0.29	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	62.8	62.8	0.01	0.01	< 0.005	66.2
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.45	0.45	< 0.005	< 0.005	< 0.005	0.47
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.74	2.74	< 0.005	< 0.005	< 0.005	2.88
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.07	0.07	< 0.005	< 0.005	< 0.005	0.08
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.45	0.45	< 0.005	< 0.005	< 0.005	0.48

3.4. 4. Ground Impr Abut 1 (2025) - Mitigated

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	0.43	0.40	3.32	17.5	0.03	0.09	—	0.09	0.09	—	0.09	—	2,885	2,885	0.12	0.02	—	2,895
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.15	0.77	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	126	126	0.01	< 0.005	—	127
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.03	0.14	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	20.9	20.9	< 0.005	< 0.005	—	21.0

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	10.2	10.2	< 0.005	< 0.005	< 0.005	10.7
Hauling	0.03	0.02	0.43	0.29	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	62.8	62.8	0.01	0.01	< 0.005	66.2
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.45	0.45	< 0.005	< 0.005	< 0.005	0.47
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.74	2.74	< 0.005	< 0.005	< 0.005	2.88
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.07	0.07	< 0.005	< 0.005	< 0.005	0.08
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.45	0.45	< 0.005	< 0.005	< 0.005	0.48

3.5. 6. Embankment Grading (Abut 1) (2025) - 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	1.68	1.41	12.3	12.6	0.02	0.55	—	0.55	0.50	—	0.50	—	2,162	2,162	0.09	0.02	—	2,170
Dust From Material Movement	—	—	—	—	—	—	6.55	6.55	—	3.37	3.37	—	—	—	—	—	—	—
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	0.20	0.21	< 0.005	0.01	—	0.01	0.01	—	0.01	—	35.5	35.5	< 0.005	< 0.005	—	35.7
Dust From Material Movement	—	—	—	—	—	—	0.11	0.11	—	0.06	0.06	—	—	—	—	—	—	—
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	—	5.88	5.88	< 0.005	< 0.005	—	5.90
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.05	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.82	6.82	< 0.005	< 0.005	< 0.005	7.16
Hauling	< 0.005	< 0.005	0.07	0.04	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.66	9.66	< 0.005	< 0.005	< 0.005	10.2
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.11	0.11	< 0.005	< 0.005	< 0.005	0.12
Hauling	< 0.005	< 0.005	< 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	< 0.005	0.17
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.03	0.03	< 0.005	< 0.005	< 0.005	0.03

3.6. 6. Embankment Grading (Abut 1) (2025) - Mitigated

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	0.22	0.22	2.25	12.2	0.02	0.04	—	0.04	0.04	—	0.04	—	2,162	2,162	0.09	0.02	—	2,170

Dust From Material Movement	—	—	—	—	—	—	6.55	6.55	—	3.37	3.37	—	—	—	—	—	—	—
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	0.04	0.20	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	35.5	35.5	< 0.005	< 0.005	—	35.7
Dust From Material Movement	—	—	—	—	—	—	0.11	0.11	—	0.06	0.06	—	—	—	—	—	—	—
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	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	5.88	5.88	< 0.005	< 0.005	—	5.90
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.05	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.82	6.82	< 0.005	< 0.005	< 0.005	7.16
Hauling	< 0.005	< 0.005	0.07	0.04	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.66	9.66	< 0.005	< 0.005	< 0.005	10.2

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.11	0.11	< 0.005	< 0.005	< 0.005	0.12
Hauling	< 0.005	< 0.005	< 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	< 0.005	0.17
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.03	0.03	< 0.005	< 0.005	< 0.005	0.03

3.7. 8. Ground Impr Abut 4 (2025) - 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	1.54	1.28	11.6	12.3	0.03	0.44	—	0.44	0.40	—	0.40	—	2,990	2,990	0.12	0.02	—	3,001
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.07	0.06	0.51	0.54	< 0.005	0.02	—	0.02	0.02	—	0.02	—	131	131	0.01	< 0.005	—	132

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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.09	0.10	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	21.7	21.7	< 0.005	< 0.005	—	21.8
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	10.2	10.2	< 0.005	< 0.005	< 0.005	10.7
Hauling	0.03	0.02	0.43	0.29	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	62.8	62.8	0.01	0.01	< 0.005	66.2
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.45	0.45	< 0.005	< 0.005	< 0.005	0.47
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.74	2.74	< 0.005	< 0.005	< 0.005	2.88
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.07	0.07	< 0.005	< 0.005	< 0.005	0.08

Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.45	0.45	< 0.005	< 0.005	< 0.005	0.48

3.8. 8. Ground Impr Abut 4 (2025) - Mitigated

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	0.44	0.41	3.37	16.7	0.03	0.09	—	0.09	0.09	—	0.09	—	2,990	2,990	0.12	0.02	—	3,001
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.15	0.73	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	131	131	0.01	< 0.005	—	132
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.03	0.13	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	21.7	21.7	< 0.005	< 0.005	—	21.8

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	10.2	10.2	< 0.005	< 0.005	< 0.005	10.7
Hauling	0.03	0.02	0.43	0.29	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	62.8	62.8	0.01	0.01	< 0.005	66.2
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.45	0.45	< 0.005	< 0.005	< 0.005	0.47
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.74	2.74	< 0.005	< 0.005	< 0.005	2.88
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.07	0.07	< 0.005	< 0.005	< 0.005	0.08
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.45	0.45	< 0.005	< 0.005	< 0.005	0.48

3.9. 9. Embankment Grading (Abut 4) (2025) - 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	1.68	1.41	12.3	12.6	0.02	0.55	—	0.55	0.50	—	0.50	—	2,162	2,162	0.09	0.02	—	2,170
Dust From Material Movement	—	—	—	—	—	—	6.55	6.55	—	3.37	3.37	—	—	—	—	—	—	—
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	0.20	0.21	< 0.005	0.01	—	0.01	0.01	—	0.01	—	35.5	35.5	< 0.005	< 0.005	—	35.7
Dust From Material Movement	—	—	—	—	—	—	0.11	0.11	—	0.06	0.06	—	—	—	—	—	—	—
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	—	5.88	5.88	< 0.005	< 0.005	—	5.90
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.05	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.82	6.82	< 0.005	< 0.005	< 0.005	7.16
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.11	0.11	< 0.005	< 0.005	< 0.005	0.12
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.10. 9. Embankment Grading (Abut 4) (2025) - Mitigated

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	0.22	0.22	2.25	12.2	0.02	0.04	—	0.04	0.04	—	0.04	—	2,162	2,162	0.09	0.02	—	2,170

Dust From Material Movement	—	—	—	—	—	—	6.55	6.55	—	3.37	3.37	—	—	—	—	—	—	—
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	0.04	0.20	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	35.5	35.5	< 0.005	< 0.005	—	35.7
Dust From Material Movement	—	—	—	—	—	—	0.11	0.11	—	0.06	0.06	—	—	—	—	—	—	—
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	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	5.88	5.88	< 0.005	< 0.005	—	5.90
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.05	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.82	6.82	< 0.005	< 0.005	< 0.005	7.16
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.11	0.11	< 0.005	< 0.005	< 0.005	0.12
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.11. 1. General Construction (2025) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.49	1.24	10.8	10.2	0.02	0.40	—	0.40	0.37	—	0.37	—	2,091	2,091	0.08	0.02	—	2,098
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.49	1.24	10.8	10.2	0.02	0.40	—	0.40	0.37	—	0.37	—	2,091	2,091	0.08	0.02	—	2,098
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	1.07	0.89	7.73	7.29	0.02	0.29	—	0.29	0.26	—	0.26	—	1,494	1,494	0.06	0.01	—	1,499
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	0.19	0.16	1.41	1.33	< 0.005	0.05	—	0.05	0.05	—	0.05	—	247	247	0.01	< 0.005	—	248
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.12. 1. General Construction (2025) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.67	0.59	6.30	11.9	0.02	0.16	—	0.16	0.15	—	0.15	—	2,091	2,091	0.08	0.02	—	2,098
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.67	0.59	6.30	11.9	0.02	0.16	—	0.16	0.15	—	0.15	—	2,091	2,091	0.08	0.02	—	2,098
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	0.48	0.42	4.50	8.47	0.02	0.11	—	0.11	0.11	—	0.11	—	1,494	1,494	0.06	0.01	—	1,499
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	0.09	0.08	0.82	1.55	< 0.005	0.02	—	0.02	0.02	—	0.02	—	247	247	0.01	< 0.005	—	248
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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

3.13. 1. General Construction (2026) - 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	1.45	1.20	10.5	10.1	0.02	0.37	—	0.37	0.34	—	0.34	—	2,091	2,091	0.08	0.02	—	2,098
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	0.16	0.13	1.15	1.11	< 0.005	0.04	—	0.04	0.04	—	0.04	—	229	229	0.01	< 0.005	—	230
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	0.03	0.02	0.21	0.20	< 0.005	0.01	—	0.01	0.01	—	0.01	—	37.9	37.9	< 0.005	< 0.005	—	38.1
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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

3.14. 1. General Construction (2026) - Mitigated

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	0.67	0.59	6.28	11.9	0.02	0.16	—	0.16	0.15	—	0.15	—	2,091	2,091	0.08	0.02	—	2,098
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	0.07	0.06	0.69	1.30	< 0.005	0.02	—	0.02	0.02	—	0.02	—	229	229	0.01	< 0.005	—	230
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	0.13	0.24	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	37.9	37.9	< 0.005	< 0.005	—	38.1
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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

3.15. 3. CIDH Piles (Pier 2, 3) (2025) - 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	1.19	0.99	8.85	10.2	0.02	0.36	—	0.36	0.33	—	0.33	—	2,185	2,185	0.09	0.02	—	2,193

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	0.07	0.06	0.51	0.59	< 0.005	0.02	—	0.02	0.02	—	0.02	—	126	126	0.01	< 0.005	—	126
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	0.09	0.11	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	20.8	20.8	< 0.005	< 0.005	—	20.9
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.26	0.16	3.81	2.72	< 0.005	< 0.005	0.05	0.06	< 0.005	0.01	0.02	—	576	576	0.10	0.09	0.01	605
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.02	0.01	0.21	0.15	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	33.0	33.0	0.01	0.01	0.01	34.7
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.04	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	5.46	5.46	< 0.005	< 0.005	< 0.005	5.74
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

3.16. 3. CIDH Piles (Pier 2, 3) (2025) - Mitigated

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	0.54	0.48	3.31	12.7	0.02	0.13	—	0.13	0.12	—	0.12	—	2,185	2,185	0.09	0.02	—	2,193
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	0.19	0.73	< 0.005	0.01	—	0.01	0.01	—	0.01	—	126	126	0.01	< 0.005	—	126
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	0.03	0.13	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	20.8	20.8	< 0.005	< 0.005	—	20.9
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.26	0.16	3.81	2.72	< 0.005	< 0.005	0.05	0.06	< 0.005	0.01	0.02	—	576	576	0.10	0.09	0.01	605
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.02	0.01	0.21	0.15	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	33.0	33.0	0.01	0.01	0.01	34.7
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.04	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	5.46	5.46	< 0.005	< 0.005	< 0.005	5.74
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

3.17. 5. Column Form, Rebar, Pour (Pier 2, 3) (2025) - 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	0.45	0.38	3.66	3.12	0.01	0.15	—	0.15	0.14	—	0.14	—	990	990	0.04	0.01	—	994
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	0.21	0.18	< 0.005	0.01	—	0.01	0.01	—	0.01	—	57.0	57.0	< 0.005	< 0.005	—	57.2
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	9.43	9.43	< 0.005	< 0.005	—	9.47
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.09	0.06	1.31	0.93	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	198	198	0.03	0.03	< 0.005	208
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	11.3	11.3	< 0.005	< 0.005	< 0.005	11.9
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.87	1.87	< 0.005	< 0.005	< 0.005	1.97
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

3.18. 5. Column Form, Rebar, Pour (Pier 2, 3) (2025) - Mitigated

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	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994
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	0.03	0.28	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	57.0	57.0	< 0.005	< 0.005	—	57.2
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	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	9.43	9.43	< 0.005	< 0.005	—	9.47
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.09	0.06	1.31	0.93	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	198	198	0.03	0.03	< 0.005	208

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	11.3	11.3	< 0.005	< 0.005	< 0.005	11.9
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.87	1.87	< 0.005	< 0.005	< 0.005	1.97
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

3.19. 12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls) (2025) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.45	0.38	3.66	3.12	0.01	0.15	—	0.15	0.14	—	0.14	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.08	0.07	0.66	0.56	< 0.005	0.03	—	0.03	0.02	—	0.02	—	179	179	0.01	< 0.005	—	180
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	0.12	0.10	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	29.6	29.6	< 0.005	< 0.005	—	29.7
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.26	0.88	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	196	196	0.03	0.03	0.19	206
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.02	0.01	0.23	0.16	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	35.6	35.6	0.01	0.01	0.01	37.4
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.04	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	5.89	5.89	< 0.005	< 0.005	< 0.005	6.19
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

3.20. 12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls) (2025) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.09	0.88	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	179	179	0.01	< 0.005	—	180
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	0.16	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	29.6	29.6	< 0.005	< 0.005	—	29.7
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.26	0.88	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	196	196	0.03	0.03	0.19	206
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.02	0.01	0.23	0.16	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	35.6	35.6	0.01	0.01	0.01	37.4
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.04	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	5.89	5.89	< 0.005	< 0.005	< 0.005	6.19
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

3.21. 13. Erect Falsework (2025) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.45	0.38	3.66	3.12	0.01	0.15	—	0.15	0.14	—	0.14	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.05	0.04	0.41	0.35	< 0.005	0.02	—	0.02	0.02	—	0.02	—	111	111	< 0.005	< 0.005	—	112
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.08	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	18.4	18.4	< 0.005	< 0.005	—	18.5

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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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

3.22. 13. Erect Falsework (2025) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.05	0.55	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	111	111	< 0.005	< 0.005	—	112
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.10	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	18.4	18.4	< 0.005	< 0.005	—	18.5
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
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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

3.23. 15. Cure Deck, Stress Bridge, Strip Falsework (2025) - 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	0.45	0.38	3.66	3.12	0.01	0.15	—	0.15	0.14	—	0.14	—	990	990	0.04	0.01	—	994
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	0.26	0.22	< 0.005	0.01	—	0.01	0.01	—	0.01	—	69.8	69.8	< 0.005	< 0.005	—	70.0
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	< 0.005	0.05	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	11.6	11.6	< 0.005	< 0.005	—	11.6
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.04	0.03	0.63	0.45	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	95.4	95.4	0.02	0.01	< 0.005	100
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.04	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.69	6.69	< 0.005	< 0.005	< 0.005	7.03
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.11	1.11	< 0.005	< 0.005	< 0.005	1.16
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

3.24. 15. Cure Deck, Stress Bridge, Strip Falsework (2025) - Mitigated

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	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994

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	0.03	0.34	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	69.8	69.8	< 0.005	< 0.005	—	70.0
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	< 0.005	< 0.005	0.01	0.06	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	11.6	11.6	< 0.005	< 0.005	—	11.6
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.04	0.03	0.63	0.45	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	95.4	95.4	0.02	0.01	< 0.005	100
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.04	0.03	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	6.69	6.69	< 0.005	< 0.005	< 0.005	7.03
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.11	1.11	< 0.005	< 0.005	< 0.005	1.16
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

3.25. 15. Cure Deck, Stress Bridge, Strip Falsework (2026) - 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	0.44	0.37	3.45	3.07	0.01	0.14	—	0.14	0.13	—	0.13	—	990	990	0.04	0.01	—	993
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	0.09	0.08	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	27.1	27.1	< 0.005	< 0.005	—	27.2
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	—	4.49	4.49	< 0.005	< 0.005	—	4.51
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.04	0.03	0.62	0.44	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	94.0	94.0	0.02	0.01	< 0.005	98.7
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.56	2.56	< 0.005	< 0.005	< 0.005	2.69
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.42	0.42	< 0.005	< 0.005	< 0.005	0.45
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

3.26. 15. Cure Deck, Stress Bridge, Strip Falsework (2026) - Mitigated

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	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	993
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	0.13	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	27.1	27.1	< 0.005	< 0.005	—	27.2
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	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.49	4.49	< 0.005	< 0.005	—	4.51
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.04	0.03	0.62	0.44	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	94.0	94.0	0.02	0.01	< 0.005	98.7
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.56	2.56	< 0.005	< 0.005	< 0.005	2.69
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.42	0.42	< 0.005	< 0.005	< 0.005	0.45
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

3.27. 16. Riprap (Abut 1 & 4) (2025) - 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	0.37	0.31	2.36	4.14	0.01	0.11	—	0.11	0.10	—	0.10	—	643	643	0.03	0.01	—	645
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	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.26	1.26	< 0.005	< 0.005	—	1.26
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	—	0.21	0.21	< 0.005	< 0.005	—	0.21
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.07	0.04	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.66	9.66	< 0.005	< 0.005	< 0.005	10.2
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	—	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005

3.28. 16. Riprap (Abut 1 & 4) (2025) - Mitigated

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	0.07	0.07	0.91	4.51	0.01	0.01	—	0.01	0.01	—	0.01	—	643	643	0.03	0.01	—	645
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	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.26	1.26	< 0.005	< 0.005	—	1.26
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	—	0.21	0.21	< 0.005	< 0.005	—	0.21
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.07	0.04	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.66	9.66	< 0.005	< 0.005	< 0.005	10.2
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	—	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005

3.29. 16. Riprap (Abut 1 & 4) (2026) - 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	0.35	0.30	2.15	4.15	0.01	0.09	—	0.09	0.09	—	0.09	—	643	643	0.03	0.01	—	645
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	0.12	0.23	< 0.005	0.01	—	0.01	< 0.005	—	< 0.005	—	35.2	35.2	< 0.005	< 0.005	—	35.4
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	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	5.83	5.83	< 0.005	< 0.005	—	5.85
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.06	0.04	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.50	9.50	< 0.005	< 0.005	< 0.005	10.0
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	—	0.52	0.52	< 0.005	< 0.005	< 0.005	0.55
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	—	0.09	0.09	< 0.005	< 0.005	< 0.005	0.09

3.30. 16. Riprap (Abut 1 & 4) (2026) - Mitigated

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	0.07	0.07	0.91	4.51	0.01	0.01	—	0.01	0.01	—	0.01	—	643	643	0.03	0.01	—	645
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	0.05	0.25	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	35.2	35.2	< 0.005	< 0.005	—	35.4
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	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	5.83	5.83	< 0.005	< 0.005	—	5.85

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	0.06	0.04	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	9.50	9.50	< 0.005	< 0.005	< 0.005	10.0
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	—	0.52	0.52	< 0.005	< 0.005	< 0.005	0.55
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
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	—	0.09	0.09	< 0.005	< 0.005	< 0.005	0.09

3.31. 17. Sidewalk Barrier Install, Deck Grind (2026) - 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	0.44	0.37	3.45	3.07	0.01	0.14	—	0.14	0.13	—	0.13	—	990	990	0.04	0.01	—	993
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	—	43.4	43.4	< 0.005	< 0.005	—	43.6
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	—	7.19	7.19	< 0.005	< 0.005	—	7.21
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.04	0.03	0.62	0.44	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	94.0	94.0	0.02	0.01	< 0.005	98.7
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.10	4.10	< 0.005	< 0.005	< 0.005	4.31
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.68	0.68	< 0.005	< 0.005	< 0.005	0.71
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

3.32. 17. Sidewalk Barrier Install, Deck Grind (2026) - Mitigated

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	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	993
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	0.02	0.21	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	43.4	43.4	< 0.005	< 0.005	—	43.6
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	0.04	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	7.19	7.19	< 0.005	< 0.005	—	7.21
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.04	0.03	0.62	0.44	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	94.0	94.0	0.02	0.01	< 0.005	98.7
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.10	4.10	< 0.005	< 0.005	< 0.005	4.31
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.68	0.68	< 0.005	< 0.005	< 0.005	0.71
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

3.33. 11. CIDH Piles (Abuts 1, 4) (2025) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.08	0.90	7.93	9.42	0.02	0.33	—	0.33	0.30	—	0.30	—	1,938	1,938	0.08	0.02	—	1,945
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.08	0.90	7.93	9.42	0.02	0.33	—	0.33	0.30	—	0.30	—	1,938	1,938	0.08	0.02	—	1,945
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	0.14	0.11	1.00	1.19	< 0.005	0.04	—	0.04	0.04	—	0.04	—	244	244	0.01	< 0.005	—	245
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	0.02	0.02	0.18	0.22	< 0.005	0.01	—	0.01	0.01	—	0.01	—	40.4	40.4	< 0.005	< 0.005	—	40.6
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.28	0.18	3.66	2.56	< 0.005	< 0.005	0.05	0.06	< 0.005	0.01	0.02	—	571	571	0.10	0.09	0.55	601
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.26	0.16	3.81	2.72	< 0.005	< 0.005	0.05	0.06	< 0.005	0.01	0.02	—	576	576	0.10	0.09	0.01	605
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.03	0.02	0.47	0.33	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	72.3	72.3	0.01	0.01	0.03	75.9
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	< 0.005	0.09	0.06	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	12.0	12.0	< 0.005	< 0.005	< 0.005	12.6
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

3.34. 11. CIDH Piles (Abuts 1, 4) (2025) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.51	0.45	3.19	11.5	0.02	0.13	—	0.13	0.12	—	0.12	—	1,938	1,938	0.08	0.02	—	1,945
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.51	0.45	3.19	11.5	0.02	0.13	—	0.13	0.12	—	0.12	—	1,938	1,938	0.08	0.02	—	1,945
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	0.06	0.06	0.40	1.44	< 0.005	0.02	—	0.02	0.02	—	0.02	—	244	244	0.01	< 0.005	—	245

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	0.26	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	40.4	40.4	< 0.005	< 0.005	—	40.6
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.28	0.18	3.66	2.56	< 0.005	< 0.005	0.05	0.06	< 0.005	0.01	0.02	—	571	571	0.10	0.09	0.55	601
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.26	0.16	3.81	2.72	< 0.005	< 0.005	0.05	0.06	< 0.005	0.01	0.02	—	576	576	0.10	0.09	0.01	605
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.03	0.02	0.47	0.33	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	72.3	72.3	0.01	0.01	0.03	75.9
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	< 0.005	0.09	0.06	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	12.0	12.0	< 0.005	< 0.005	< 0.005	12.6
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

3.35. 14a. Form, Rebar, Pour (soffit, Stems & decks) (2025) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.45	0.38	3.66	3.12	0.01	0.15	—	0.15	0.14	—	0.14	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.45	0.38	3.66	3.12	0.01	0.15	—	0.15	0.14	—	0.14	—	990	990	0.04	0.01	—	994
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	0.14	0.12	1.16	0.99	< 0.005	0.05	—	0.05	0.04	—	0.04	—	315	315	0.01	< 0.005	—	316
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	0.03	0.02	0.21	0.18	< 0.005	0.01	—	0.01	0.01	—	0.01	—	52.1	52.1	< 0.005	< 0.005	—	52.3
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.26	0.88	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	196	196	0.03	0.03	0.19	206
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.09	0.06	1.31	0.93	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	198	198	0.03	0.03	< 0.005	208
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.03	0.02	0.41	0.29	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	62.5	62.5	0.01	0.01	0.03	65.7
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	10.4	10.4	< 0.005	< 0.005	< 0.005	10.9
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

3.36. 14a. Form, Rebar, Pour (soffit, Stems & decks) (2025) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.09	0.09	0.49	4.88	0.01	0.02	—	0.02	0.02	—	0.02	—	990	990	0.04	0.01	—	994
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	0.16	1.55	< 0.005	0.01	—	0.01	0.01	—	0.01	—	315	315	0.01	< 0.005	—	316
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	0.03	0.28	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	52.1	52.1	< 0.005	< 0.005	—	52.3
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.26	0.88	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	196	196	0.03	0.03	0.19	206
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Vendor	0.09	0.06	1.31	0.93	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	198	198	0.03	0.03	< 0.005	208
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.03	0.02	0.41	0.29	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	62.5	62.5	0.01	0.01	0.03	65.7
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	< 0.005	0.07	0.05	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	10.4	10.4	< 0.005	< 0.005	< 0.005	10.9
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

3.37. 12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls) (2025) - 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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.33	0.21	4.33	3.03	< 0.005	< 0.005	0.06	0.07	< 0.005	0.02	0.02	—	676	676	0.11	0.10	0.65	711
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.86	1.86	< 0.005	< 0.005	< 0.005	1.95
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.31	0.31	< 0.005	< 0.005	< 0.005	0.32
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

3.38. 12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls) (2025) - Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.33	0.21	4.33	3.03	< 0.005	< 0.005	0.06	0.07	< 0.005	0.02	0.02	—	676	676	0.11	0.10	0.65	711
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.86	1.86	< 0.005	< 0.005	< 0.005	1.95
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.31	0.31	< 0.005	< 0.005	< 0.005	0.32
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

3.39. 14b. Form, Rebar, Pour (soffit, Stems & decks) (2025) - 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	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.31	0.19	4.51	3.22	< 0.005	< 0.005	0.06	0.07	< 0.005	0.02	0.02	—	682	682	0.11	0.10	0.02	716
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.86	1.86	< 0.005	< 0.005	< 0.005	1.95
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.31	0.31	< 0.005	< 0.005	< 0.005	0.32
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

3.40. 14b. Form, Rebar, Pour (soffit, Stems & decks) (2025) - Mitigated

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	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.31	0.19	4.51	3.22	< 0.005	< 0.005	0.06	0.07	< 0.005	0.02	0.02	—	682	682	0.11	0.10	0.02	716
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.86	1.86	< 0.005	< 0.005	< 0.005	1.95
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.31	0.31	< 0.005	< 0.005	< 0.005	0.32
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

3.41. 7. Exc Abut 1 (2025) - 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	0.37	0.31	2.36	4.14	0.01	0.11	—	0.11	0.10	—	0.10	—	643	643	0.03	0.01	—	645
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.04	0.07	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	10.6	10.6	< 0.005	< 0.005	—	10.6

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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.75	1.75	< 0.005	< 0.005	—	1.76
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.46	1.05	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	222	222	0.04	0.03	0.01	233
Hauling	0.01	< 0.005	0.10	0.07	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	14.5	14.5	< 0.005	< 0.005	< 0.005	15.3
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.63	3.63	< 0.005	< 0.005	< 0.005	3.81
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.24	0.24	< 0.005	< 0.005	< 0.005	0.25
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.60	0.60	< 0.005	< 0.005	< 0.005	0.63

Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.04	0.04	< 0.005	< 0.005	< 0.005	0.04

3.42. 7. Exc Abut 1 (2025) - Mitigated

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	0.07	0.07	0.91	4.51	0.01	0.01	—	0.01	0.01	—	0.01	—	643	643	0.03	0.01	—	645
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.07	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	10.6	10.6	< 0.005	< 0.005	—	10.6
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.75	1.75	< 0.005	< 0.005	—	1.76

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.46	1.05	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	222	222	0.04	0.03	0.01	233
Hauling	0.01	< 0.005	0.10	0.07	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	14.5	14.5	< 0.005	< 0.005	< 0.005	15.3
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.63	3.63	< 0.005	< 0.005	< 0.005	3.81
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.24	0.24	< 0.005	< 0.005	< 0.005	0.25
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.60	0.60	< 0.005	< 0.005	< 0.005	0.63
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.04	0.04	< 0.005	< 0.005	< 0.005	0.04

3.43. 10. Exc Abut 4 (2025) - 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	0.37	0.31	2.36	4.14	0.01	0.11	—	0.11	0.10	—	0.10	—	643	643	0.03	0.01	—	645
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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.04	0.07	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	10.6	10.6	< 0.005	< 0.005	—	10.6
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.75	1.75	< 0.005	< 0.005	—	1.76
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.46	1.05	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	222	222	0.04	0.03	0.01	233
Hauling	0.01	< 0.005	0.10	0.07	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	14.5	14.5	< 0.005	< 0.005	< 0.005	15.3
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.63	3.63	< 0.005	< 0.005	< 0.005	3.81
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.24	0.24	< 0.005	< 0.005	< 0.005	0.25
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.60	0.60	< 0.005	< 0.005	< 0.005	0.63
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.04	0.04	< 0.005	< 0.005	< 0.005	0.04

3.44. 10. Exc Abut 4 (2025) - Mitigated

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	0.07	0.07	0.91	4.51	0.01	0.01	—	0.01	0.01	—	0.01	—	643	643	0.03	0.01	—	645

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
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.07	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	10.6	10.6	< 0.005	< 0.005	—	10.6
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.75	1.75	< 0.005	< 0.005	—	1.76
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.10	0.06	1.46	1.05	< 0.005	< 0.005	0.02	0.02	< 0.005	0.01	0.01	—	222	222	0.04	0.03	0.01	233
Hauling	0.01	< 0.005	0.10	0.07	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	14.5	14.5	< 0.005	< 0.005	< 0.005	15.3

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.63	3.63	< 0.005	< 0.005	< 0.005	3.81
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.24	0.24	< 0.005	< 0.005	< 0.005	0.25
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.60	0.60	< 0.005	< 0.005	< 0.005	0.63
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.04	0.04	< 0.005	< 0.005	< 0.005	0.04

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

4.10.4. Soil Carbon Accumulation By Vegetation Type - Mitigated

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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

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

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

Land Use	TOG	ROG	NOx	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.6. Avoided and Sequestered Emissions by Species - Mitigated

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

5.1. Construction Schedule

Phase Name	Phase Type	Start Date	End Date	Days Per Week	Work Days per Phase	Phase Description
2. ESA Fencing; Clear & Grub; Mob	Site Preparation	1/1/2025	1/22/2025	5.00	16.0	—
4. Ground Impr Abut 1	Grading	1/22/2025	2/12/2025	5.00	16.0	—
6. Embankment Grading (Abut 1)	Grading	2/12/2025	2/19/2025	5.00	6.00	—
8. Ground Impr Abut 4	Grading	2/19/2025	3/12/2025	5.00	16.0	—
9. Embankment Grading (Abut 4)	Grading	3/12/2025	3/19/2025	5.00	6.00	—
1. General Construction	Building Construction	1/1/2025	2/25/2026	5.00	301	—
3. CIDH Piles (Pier 2, 3)	Building Construction	1/22/2025	2/19/2025	5.00	21.0	—
5. Column Form, Rebar, Pour (Pier 2, 3)	Building Construction	2/12/2025	3/12/2025	5.00	21.0	—
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Building Construction	4/2/2025	7/2/2025	5.00	66.0	—
13. Erect Falsework	Building Construction	5/28/2025	7/23/2025	5.00	41.0	—
15. Cure Deck, Stress Bridge, Strip Falsework	Building Construction	11/26/2025	1/14/2026	5.00	36.0	—
16. Riprap (Abut 1 & 4)	Building Construction	12/31/2025	1/28/2026	5.00	21.0	—
17. Sidewalk Barrier Install, Deck Grind	Building Construction	1/14/2026	2/4/2026	5.00	16.0	—
11. CIDH Piles (Abuts 1, 4)	Building Construction	2/26/2025	4/30/2025	5.00	46.0	—
14a. Form, Rebar, Pour (soffit, Stems & decks)	Building Construction	6/18/2025	11/26/2025	5.00	116	—
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Building Construction	7/1/2025	7/1/2025	5.00	1.00	Concrete trucks for pour

14b. Form, Rebar, Pour (soffit, Stems & decks)	Building Construction	11/25/2025	11/25/2025	5.00	1.00	Concrete trucks for pour
7. Exc Abut 1	Trenching	2/19/2025	2/26/2025	5.00	6.00	—
10. Exc Abut 4	Trenching	3/19/2025	3/26/2025	5.00	6.00	—

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
2. ESA Fencing; Clear & Grub; Mob	Other Construction Equipment	Diesel	Average	1.00	8.00	170	0.42
2. ESA Fencing; Clear & Grub; Mob	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
2. ESA Fencing; Clear & Grub; Mob	Graders	Diesel	Average	1.00	8.00	148	0.41
2. ESA Fencing; Clear & Grub; Mob	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
2. ESA Fencing; Clear & Grub; Mob	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
2. ESA Fencing; Clear & Grub; Mob	Scrapers	Diesel	Average	1.00	8.00	423	0.48
4. Ground Impr Abut 1	Cranes	Diesel	Average	1.00	10.0	367	0.29
4. Ground Impr Abut 1	Bore/Drill Rigs	Diesel	Average	1.00	10.0	83.0	0.50
4. Ground Impr Abut 1	Generator Sets	Diesel	Average	1.00	10.0	14.0	0.74
4. Ground Impr Abut 1	Air Compressors	Diesel	Average	1.00	10.0	37.0	0.48
4. Ground Impr Abut 1	Forklifts	Diesel	Average	1.00	10.0	82.0	0.20
4. Ground Impr Abut 1	Rubber Tired Loaders	Diesel	Average	1.00	10.0	150	0.36
6. Embankment Grading (Abut 1)	Rollers	Diesel	Average	1.00	8.00	36.0	0.38
6. Embankment Grading (Abut 1)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36

6. Embankment Grading (Abut 1)	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
6. Embankment Grading (Abut 1)	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
8. Ground Impr Abut 4	Rubber Tired Loaders	Diesel	Average	1.00	10.0	175	0.36
8. Ground Impr Abut 4	Cranes	Diesel	Average	1.00	10.0	367	0.29
8. Ground Impr Abut 4	Bore/Drill Rigs	Diesel	Average	1.00	10.0	83.0	0.50
8. Ground Impr Abut 4	Generator Sets	Diesel	Average	1.00	10.0	14.0	0.74
8. Ground Impr Abut 4	Air Compressors	Diesel	Average	1.00	10.0	37.0	0.48
8. Ground Impr Abut 4	Forklifts	Diesel	Average	1.00	10.0	82.0	0.20
9. Embankment Grading (Abut 4)	Rollers	Diesel	Average	1.00	8.00	36.0	0.38
9. Embankment Grading (Abut 4)	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
9. Embankment Grading (Abut 4)	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
9. Embankment Grading (Abut 4)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
1. General Construction	Air Compressors	Diesel	Average	1.00	8.00	37.0	0.48
1. General Construction	Aerial Lifts	Diesel	Average	1.00	8.00	46.0	0.31
1. General Construction	Cranes	Diesel	Average	1.00	8.00	367	0.29
1. General Construction	Forklifts	Diesel	Average	1.00	8.00	82.0	0.20
1. General Construction	Generator Sets	Diesel	Average	4.00	8.00	14.0	0.74
1. General Construction	Welders	Diesel	Average	1.00	8.00	46.0	0.45
3. CIDH Piles (Pier 2, 3)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
3. CIDH Piles (Pier 2, 3)	Bore/Drill Rigs	Diesel	Average	1.00	8.00	83.0	0.50
3. CIDH Piles (Pier 2, 3)	Cranes	Diesel	Average	1.00	8.00	367	0.29
3. CIDH Piles (Pier 2, 3)	Generator Sets	Diesel	Average	3.00	8.00	14.0	0.74
5. Column Form, Rebar, Pour (Pier 2, 3)	Cranes	Diesel	Average	1.00	8.00	367	0.29

12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Cranes	Diesel	Average	1.00	8.00	367	0.29
13. Erect Falsework	Cranes	Diesel	Average	1.00	8.00	367	0.29
15. Cure Deck, Stress Bridge, Strip Falsework	Cranes	Diesel	Average	1.00	8.00	367	0.29
16. Riprap (Abut 1 & 4)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
16. Riprap (Abut 1 & 4)	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
17. Sidewalk Barrier Install, Deck Grind	Cranes	Diesel	Average	1.00	8.00	367	0.29
11. CIDH Piles (Abuts 1, 4)	Cranes	Diesel	Average	1.00	6.00	367	0.29
11. CIDH Piles (Abuts 1, 4)	Generator Sets	Diesel	Average	3.00	8.00	14.0	0.74
11. CIDH Piles (Abuts 1, 4)	Bore/Drill Rigs	Diesel	Average	1.00	8.00	83.0	0.50
11. CIDH Piles (Abuts 1, 4)	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
14a. Form, Rebar, Pour (soffit, Stems & decks)	Cranes	Diesel	Average	1.00	8.00	367	0.29
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Cranes	Diesel	Average	0.00	6.00	367	0.29
14b. Form, Rebar, Pour (soffit, Stems & decks)	Cranes	Diesel	Average	0.00	6.00	367	0.29
7. Exc Abut 1	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
7. Exc Abut 1	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
10. Exc Abut 4	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
10. Exc Abut 4	Excavators	Diesel	Average	1.00	8.00	36.0	0.38

5.2.2. Mitigated

Phase Name	Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor

2. ESA Fencing; Clear & Grub; Mob	Other Construction Equipment	Diesel	Tier 4 Final	1.00	8.00	170	0.42
2. ESA Fencing; Clear & Grub; Mob	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
2. ESA Fencing; Clear & Grub; Mob	Graders	Diesel	Tier 4 Final	1.00	8.00	148	0.41
2. ESA Fencing; Clear & Grub; Mob	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
2. ESA Fencing; Clear & Grub; Mob	Rubber Tired Dozers	Diesel	Tier 4 Final	1.00	8.00	367	0.40
2. ESA Fencing; Clear & Grub; Mob	Scrapers	Diesel	Tier 4 Final	1.00	8.00	423	0.48
4. Ground Impr Abut 1	Cranes	Diesel	Tier 4 Final	1.00	10.0	367	0.29
4. Ground Impr Abut 1	Bore/Drill Rigs	Diesel	Tier 4 Final	1.00	10.0	83.0	0.50
4. Ground Impr Abut 1	Generator Sets	Diesel	Average	1.00	10.0	14.0	0.74
4. Ground Impr Abut 1	Air Compressors	Diesel	Tier 4 Final	1.00	10.0	37.0	0.48
4. Ground Impr Abut 1	Forklifts	Diesel	Tier 4 Final	1.00	10.0	82.0	0.20
4. Ground Impr Abut 1	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	10.0	150	0.36
6. Embankment Grading (Abut 1)	Rollers	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
6. Embankment Grading (Abut 1)	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
6. Embankment Grading (Abut 1)	Rubber Tired Dozers	Diesel	Tier 4 Final	1.00	8.00	367	0.40
6. Embankment Grading (Abut 1)	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
8. Ground Impr Abut 4	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	10.0	175	0.36
8. Ground Impr Abut 4	Cranes	Diesel	Tier 4 Final	1.00	10.0	367	0.29
8. Ground Impr Abut 4	Bore/Drill Rigs	Diesel	Tier 4 Final	1.00	10.0	83.0	0.50
8. Ground Impr Abut 4	Generator Sets	Diesel	Average	1.00	10.0	14.0	0.74
8. Ground Impr Abut 4	Air Compressors	Diesel	Tier 4 Final	1.00	10.0	37.0	0.48

8. Ground Impr Abut 4	Forklifts	Diesel	Tier 4 Final	1.00	10.0	82.0	0.20
9. Embankment Grading (Abut 4)	Rollers	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
9. Embankment Grading (Abut 4)	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
9. Embankment Grading (Abut 4)	Rubber Tired Dozers	Diesel	Tier 4 Final	1.00	8.00	367	0.40
9. Embankment Grading (Abut 4)	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
1. General Construction	Air Compressors	Diesel	Tier 4 Final	1.00	8.00	37.0	0.48
1. General Construction	Aerial Lifts	Diesel	Tier 4 Final	1.00	8.00	46.0	0.31
1. General Construction	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
1. General Construction	Forklifts	Diesel	Tier 4 Final	1.00	8.00	82.0	0.20
1. General Construction	Generator Sets	Diesel	Average	4.00	8.00	14.0	0.74
1. General Construction	Welders	Diesel	Tier 4 Final	1.00	8.00	46.0	0.45
3. CIDH Piles (Pier 2, 3)	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
3. CIDH Piles (Pier 2, 3)	Bore/Drill Rigs	Diesel	Tier 4 Final	1.00	8.00	83.0	0.50
3. CIDH Piles (Pier 2, 3)	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
3. CIDH Piles (Pier 2, 3)	Generator Sets	Diesel	Average	3.00	8.00	14.0	0.74
5. Column Form, Rebar, Pour (Pier 2, 3)	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
13. Erect Falsework	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
15. Cure Deck, Stress Bridge, Strip Falsework	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
16. Riprap (Abut 1 & 4)	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
16. Riprap (Abut 1 & 4)	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
17. Sidewalk Barrier Install, Deck Grind	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29

11. CIDH Piles (Abuts 1, 4)	Cranes	Diesel	Tier 4 Final	1.00	6.00	367	0.29
11. CIDH Piles (Abuts 1, 4)	Generator Sets	Diesel	Average	3.00	8.00	14.0	0.74
11. CIDH Piles (Abuts 1, 4)	Bore/Drill Rigs	Diesel	Tier 4 Final	1.00	8.00	83.0	0.50
11. CIDH Piles (Abuts 1, 4)	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
14a. Form, Rebar, Pour (soffit, Stems & decks)	Cranes	Diesel	Tier 4 Final	1.00	8.00	367	0.29
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Cranes	Diesel	Average	0.00	6.00	367	0.29
14b. Form, Rebar, Pour (soffit, Stems & decks)	Cranes	Diesel	Average	0.00	6.00	367	0.29
7. Exc Abut 1	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
7. Exc Abut 1	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
10. Exc Abut 4	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
10. Exc Abut 4	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
2. ESA Fencing; Clear & Grub; Mob	—	—	—	—
2. ESA Fencing; Clear & Grub; Mob	Worker	0.00	12.0	LDA,LDT1,LDT2
2. ESA Fencing; Clear & Grub; Mob	Vendor	4.00	0.19	HHDT,MHDT
2. ESA Fencing; Clear & Grub; Mob	Hauling	8.00	0.19	HHDT
2. ESA Fencing; Clear & Grub; Mob	Onsite truck	—	—	HHDT
4. Ground Impr Abut 1	—	—	—	—

4. Ground Impr Abut 1	Worker	0.00	12.0	LDA,LDT1,LDT2
4. Ground Impr Abut 1	Vendor	6.00	0.19	HHDT,MHDT
4. Ground Impr Abut 1	Hauling	26.0	0.19	HHDT
4. Ground Impr Abut 1	Onsite truck	—	—	HHDT
6. Embankment Grading (Abut 1)	—	—	—	—
6. Embankment Grading (Abut 1)	Worker	0.00	12.0	LDA,LDT1,LDT2
6. Embankment Grading (Abut 1)	Vendor	4.00	0.19	HHDT,MHDT
6. Embankment Grading (Abut 1)	Hauling	4.00	0.19	HHDT
6. Embankment Grading (Abut 1)	Onsite truck	—	—	HHDT
8. Ground Impr Abut 4	—	—	—	—
8. Ground Impr Abut 4	Worker	0.00	12.0	LDA,LDT1,LDT2
8. Ground Impr Abut 4	Vendor	6.00	0.19	HHDT,MHDT
8. Ground Impr Abut 4	Hauling	26.0	0.19	HHDT
8. Ground Impr Abut 4	Onsite truck	—	—	HHDT
9. Embankment Grading (Abut 4)	—	—	—	—
9. Embankment Grading (Abut 4)	Worker	0.00	12.0	LDA,LDT1,LDT2
9. Embankment Grading (Abut 4)	Vendor	4.00	0.19	HHDT,MHDT
9. Embankment Grading (Abut 4)	Hauling	0.00	20.0	HHDT
9. Embankment Grading (Abut 4)	Onsite truck	—	—	HHDT
1. General Construction	—	—	—	—
1. General Construction	Worker	0.00	12.0	LDA,LDT1,LDT2
1. General Construction	Vendor	0.00	7.63	HHDT,MHDT
1. General Construction	Hauling	0.00	20.0	HHDT
1. General Construction	Onsite truck	—	—	HHDT
3. CIDH Piles (Pier 2, 3)	—	—	—	—
3. CIDH Piles (Pier 2, 3)	Worker	0.00	12.0	LDA,LDT1,LDT2
3. CIDH Piles (Pier 2, 3)	Vendor	338	0.19	HHDT,MHDT

3. CIDH Piles (Pier 2, 3)	Hauling	0.00	20.0	HHDT
3. CIDH Piles (Pier 2, 3)	Onsite truck	0.00	0.00	HHDT
5. Column Form, Rebar, Pour (Pier 2, 3)	—	—	—	—
5. Column Form, Rebar, Pour (Pier 2, 3)	Worker	0.00	12.0	LDA,LDT1,LDT2
5. Column Form, Rebar, Pour (Pier 2, 3)	Vendor	116	0.19	HHDT,MHDT
5. Column Form, Rebar, Pour (Pier 2, 3)	Hauling	0.00	20.0	HHDT
5. Column Form, Rebar, Pour (Pier 2, 3)	Onsite truck	0.00	0.00	HHDT
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	—	—	—	—
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Worker	0.00	12.0	LDA,LDT1,LDT2
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Vendor	116	0.19	HHDT,MHDT
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Hauling	0.00	20.0	HHDT
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Onsite truck	0.00	0.00	HHDT
13. Erect Falsework	—	—	—	—
13. Erect Falsework	Worker	0.00	12.0	LDA,LDT1,LDT2
13. Erect Falsework	Vendor	0.00	0.19	HHDT,MHDT
13. Erect Falsework	Hauling	0.00	20.0	HHDT
13. Erect Falsework	Onsite truck	—	—	HHDT
15. Cure Deck, Stress Bridge, Strip Falsework	—	—	—	—
15. Cure Deck, Stress Bridge, Strip Falsework	Worker	0.00	12.0	LDA,LDT1,LDT2

15. Cure Deck, Stress Bridge, Strip Falsework	Vendor	56.0	0.19	HHDT,MHDT
15. Cure Deck, Stress Bridge, Strip Falsework	Hauling	0.00	20.0	HHDT
15. Cure Deck, Stress Bridge, Strip Falsework	Onsite truck	0.00	0.00	HHDT
16. Riprap (Abut 1 & 4)	—	—	—	—
16. Riprap (Abut 1 & 4)	Worker	0.00	12.0	LDA,LDT1,LDT2
16. Riprap (Abut 1 & 4)	Vendor	0.00	7.63	HHDT,MHDT
16. Riprap (Abut 1 & 4)	Hauling	4.00	0.19	HHDT
16. Riprap (Abut 1 & 4)	Onsite truck	—	—	HHDT
17. Sidewalk Barrier Install, Deck Grind	—	—	—	—
17. Sidewalk Barrier Install, Deck Grind	Worker	0.00	12.0	LDA,LDT1,LDT2
17. Sidewalk Barrier Install, Deck Grind	Vendor	56.0	0.19	HHDT,MHDT
17. Sidewalk Barrier Install, Deck Grind	Hauling	0.00	20.0	HHDT
17. Sidewalk Barrier Install, Deck Grind	Onsite truck	0.00	0.00	HHDT
7. Exc Abut 1	—	—	—	—
7. Exc Abut 1	Worker	0.00	12.0	LDA,LDT1,LDT2
7. Exc Abut 1	Vendor	130	0.19	HHDT,MHDT
7. Exc Abut 1	Hauling	6.00	0.19	HHDT
7. Exc Abut 1	Onsite truck	0.00	0.00	HHDT
10. Exc Abut 4	—	—	—	—
10. Exc Abut 4	Worker	0.00	12.0	LDA,LDT1,LDT2
10. Exc Abut 4	Vendor	130	0.19	HHDT,MHDT
10. Exc Abut 4	Hauling	6.00	0.19	HHDT
10. Exc Abut 4	Onsite truck	0.00	0.00	HHDT
11. CIDH Piles (Abuts 1, 4)	—	—	—	—
11. CIDH Piles (Abuts 1, 4)	Worker	0.00	12.0	LDA,LDT1,LDT2
11. CIDH Piles (Abuts 1, 4)	Vendor	338	0.19	HHDT,MHDT

11. CIDH Piles (Abuts 1, 4)	Hauling	0.00	20.0	HHDT
11. CIDH Piles (Abuts 1, 4)	Onsite truck	—	—	HHDT
14a. Form, Rebar, Pour (soffit, Stems & decks)	—	—	—	—
14a. Form, Rebar, Pour (soffit, Stems & decks)	Worker	0.00	12.0	LDA,LDT1,LDT2
14a. Form, Rebar, Pour (soffit, Stems & decks)	Vendor	116	0.19	HHDT,MHDT
14a. Form, Rebar, Pour (soffit, Stems & decks)	Hauling	0.00	20.0	HHDT
14a. Form, Rebar, Pour (soffit, Stems & decks)	Onsite truck	—	—	HHDT
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	—	—	—	—
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Worker	0.00	12.0	LDA,LDT1,LDT2
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Vendor	400	0.19	HHDT,MHDT
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Hauling	0.00	20.0	HHDT
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Onsite truck	—	—	HHDT
14b. Form, Rebar, Pour (soffit, Stems & decks)	—	—	—	—
14b. Form, Rebar, Pour (soffit, Stems & decks)	Worker	0.00	12.0	LDA,LDT1,LDT2
14b. Form, Rebar, Pour (soffit, Stems & decks)	Vendor	400	0.19	HHDT,MHDT
14b. Form, Rebar, Pour (soffit, Stems & decks)	Hauling	0.00	20.0	HHDT
14b. Form, Rebar, Pour (soffit, Stems & decks)	Onsite truck	—	—	HHDT

5.3.2. Mitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
2. ESA Fencing; Clear & Grub; Mob	—	—	—	—
2. ESA Fencing; Clear & Grub; Mob	Worker	0.00	12.0	LDA,LDT1,LDT2
2. ESA Fencing; Clear & Grub; Mob	Vendor	4.00	0.19	HHDT,MHDT
2. ESA Fencing; Clear & Grub; Mob	Hauling	8.00	0.19	HHDT
2. ESA Fencing; Clear & Grub; Mob	Onsite truck	—	—	HHDT
4. Ground Impr Abut 1	—	—	—	—
4. Ground Impr Abut 1	Worker	0.00	12.0	LDA,LDT1,LDT2
4. Ground Impr Abut 1	Vendor	6.00	0.19	HHDT,MHDT
4. Ground Impr Abut 1	Hauling	26.0	0.19	HHDT
4. Ground Impr Abut 1	Onsite truck	—	—	HHDT
6. Embankment Grading (Abut 1)	—	—	—	—
6. Embankment Grading (Abut 1)	Worker	0.00	12.0	LDA,LDT1,LDT2
6. Embankment Grading (Abut 1)	Vendor	4.00	0.19	HHDT,MHDT
6. Embankment Grading (Abut 1)	Hauling	4.00	0.19	HHDT
6. Embankment Grading (Abut 1)	Onsite truck	—	—	HHDT
8. Ground Impr Abut 4	—	—	—	—
8. Ground Impr Abut 4	Worker	0.00	12.0	LDA,LDT1,LDT2
8. Ground Impr Abut 4	Vendor	6.00	0.19	HHDT,MHDT
8. Ground Impr Abut 4	Hauling	26.0	0.19	HHDT
8. Ground Impr Abut 4	Onsite truck	—	—	HHDT
9. Embankment Grading (Abut 4)	—	—	—	—
9. Embankment Grading (Abut 4)	Worker	0.00	12.0	LDA,LDT1,LDT2
9. Embankment Grading (Abut 4)	Vendor	4.00	0.19	HHDT,MHDT
9. Embankment Grading (Abut 4)	Hauling	0.00	20.0	HHDT
9. Embankment Grading (Abut 4)	Onsite truck	—	—	HHDT

1. General Construction	—	—	—	—
1. General Construction	Worker	0.00	12.0	LDA,LDT1,LDT2
1. General Construction	Vendor	0.00	7.63	HHDT,MHDT
1. General Construction	Hauling	0.00	20.0	HHDT
1. General Construction	Onsite truck	—	—	HHDT
3. CIDH Piles (Pier 2, 3)	—	—	—	—
3. CIDH Piles (Pier 2, 3)	Worker	0.00	12.0	LDA,LDT1,LDT2
3. CIDH Piles (Pier 2, 3)	Vendor	338	0.19	HHDT,MHDT
3. CIDH Piles (Pier 2, 3)	Hauling	0.00	20.0	HHDT
3. CIDH Piles (Pier 2, 3)	Onsite truck	0.00	0.00	HHDT
5. Column Form, Rebar, Pour (Pier 2, 3)	—	—	—	—
5. Column Form, Rebar, Pour (Pier 2, 3)	Worker	0.00	12.0	LDA,LDT1,LDT2
5. Column Form, Rebar, Pour (Pier 2, 3)	Vendor	116	0.19	HHDT,MHDT
5. Column Form, Rebar, Pour (Pier 2, 3)	Hauling	0.00	20.0	HHDT
5. Column Form, Rebar, Pour (Pier 2, 3)	Onsite truck	0.00	0.00	HHDT
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	—	—	—	—
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Worker	0.00	12.0	LDA,LDT1,LDT2
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Vendor	116	0.19	HHDT,MHDT
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Hauling	0.00	20.0	HHDT
12a. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Onsite truck	0.00	0.00	HHDT
13. Erect Falsework	—	—	—	—

13. Erect Falsework	Worker	0.00	12.0	LDA,LDT1,LDT2
13. Erect Falsework	Vendor	0.00	0.19	HHDT,MHDT
13. Erect Falsework	Hauling	0.00	20.0	HHDT
13. Erect Falsework	Onsite truck	—	—	HHDT
15. Cure Deck, Stress Bridge, Strip Falsework	—	—	—	—
15. Cure Deck, Stress Bridge, Strip Falsework	Worker	0.00	12.0	LDA,LDT1,LDT2
15. Cure Deck, Stress Bridge, Strip Falsework	Vendor	56.0	0.19	HHDT,MHDT
15. Cure Deck, Stress Bridge, Strip Falsework	Hauling	0.00	20.0	HHDT
15. Cure Deck, Stress Bridge, Strip Falsework	Onsite truck	0.00	0.00	HHDT
16. Riprap (Abut 1 & 4)	—	—	—	—
16. Riprap (Abut 1 & 4)	Worker	0.00	12.0	LDA,LDT1,LDT2
16. Riprap (Abut 1 & 4)	Vendor	0.00	7.63	HHDT,MHDT
16. Riprap (Abut 1 & 4)	Hauling	4.00	0.19	HHDT
16. Riprap (Abut 1 & 4)	Onsite truck	—	—	HHDT
17. Sidewalk Barrier Install, Deck Grind	—	—	—	—
17. Sidewalk Barrier Install, Deck Grind	Worker	0.00	12.0	LDA,LDT1,LDT2
17. Sidewalk Barrier Install, Deck Grind	Vendor	56.0	0.19	HHDT,MHDT
17. Sidewalk Barrier Install, Deck Grind	Hauling	0.00	20.0	HHDT
17. Sidewalk Barrier Install, Deck Grind	Onsite truck	0.00	0.00	HHDT
7. Exc Abut 1	—	—	—	—
7. Exc Abut 1	Worker	0.00	12.0	LDA,LDT1,LDT2
7. Exc Abut 1	Vendor	130	0.19	HHDT,MHDT
7. Exc Abut 1	Hauling	6.00	0.19	HHDT
7. Exc Abut 1	Onsite truck	0.00	0.00	HHDT

10. Exc Abut 4	—	—	—	—
10. Exc Abut 4	Worker	0.00	12.0	LDA,LDT1,LDT2
10. Exc Abut 4	Vendor	130	0.19	HHDT,MHDT
10. Exc Abut 4	Hauling	6.00	0.19	HHDT
10. Exc Abut 4	Onsite truck	0.00	0.00	HHDT
11. CIDH Piles (Abuts 1, 4)	—	—	—	—
11. CIDH Piles (Abuts 1, 4)	Worker	0.00	12.0	LDA,LDT1,LDT2
11. CIDH Piles (Abuts 1, 4)	Vendor	338	0.19	HHDT,MHDT
11. CIDH Piles (Abuts 1, 4)	Hauling	0.00	20.0	HHDT
11. CIDH Piles (Abuts 1, 4)	Onsite truck	—	—	HHDT
14a. Form, Rebar, Pour (soffit, Stems & decks)	—	—	—	—
14a. Form, Rebar, Pour (soffit, Stems & decks)	Worker	0.00	12.0	LDA,LDT1,LDT2
14a. Form, Rebar, Pour (soffit, Stems & decks)	Vendor	116	0.19	HHDT,MHDT
14a. Form, Rebar, Pour (soffit, Stems & decks)	Hauling	0.00	20.0	HHDT
14a. Form, Rebar, Pour (soffit, Stems & decks)	Onsite truck	—	—	HHDT
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	—	—	—	—
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Worker	0.00	12.0	LDA,LDT1,LDT2
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Vendor	400	0.19	HHDT,MHDT
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Hauling	0.00	20.0	HHDT
12b. Form, Rebar, Pour (Abut 1 & 4 Ftg, Stem, Walls)	Onsite truck	—	—	HHDT
14b. Form, Rebar, Pour (soffit, Stems & decks)	—	—	—	—

14b. Form, Rebar, Pour (soffit, Stems & decks)	Worker	0.00	12.0	LDA,LDT1,LDT2
14b. Form, Rebar, Pour (soffit, Stems & decks)	Vendor	400	0.19	HHDT,MHDT
14b. Form, Rebar, Pour (soffit, Stems & decks)	Hauling	0.00	20.0	HHDT
14b. Form, Rebar, Pour (soffit, Stems & decks)	Onsite truck	—	—	HHDT

5.4. Vehicles

5.4.1. Construction Vehicle Control Strategies

Non-applicable. No control strategies activated by user.

5.5. Architectural Coatings

Phase Name	Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)

5.6. Dust Mitigation

5.6.1. Construction Earthmoving Activities

Phase Name	Material Imported (cy)	Material Exported (cy)	Acres Graded (acres)	Material Demolished (sq. ft.)	Acres Paved (acres)
2. ESA Fencing; Clear & Grub; Mob	—	—	32.0	0.00	—
4. Ground Impr Abut 1	1,500	1,500	0.00	0.00	—
6. Embankment Grading (Abut 1)	—	—	3.00	0.00	—
8. Ground Impr Abut 4	1,500	1,500	0.00	0.00	—
9. Embankment Grading (Abut 4)	—	—	3.00	0.00	—
7. Exc Abut 1	—	500	0.00	0.00	—

10. Exc Abut 4	—	500	0.00	0.00	—

5.6.2. Construction Earthmoving Control Strategies

Non-applicable. No control strategies activated by user.

5.7. Construction Paving

Land Use	Area Paved (acres)	% Asphalt
User Defined Industrial	0.00	0%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2025	0.00	589	0.03	< 0.005
2026	0.00	589	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

5.18.1.2. Mitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.1.2. Mitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

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

5.18.2.2. Mitigated

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

6. Climate Risk Detailed Report

6.1. Climate Risk Summary

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

Climate Hazard	Result for Project Location	Unit
Temperature and Extreme Heat	7.50	annual days of extreme heat
Extreme Precipitation	2.70	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	3.64	annual hectares burned

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

Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (Radke et al., 2017, CEC-500-2017-008), and consider inundation location and depth for the San Francisco Bay, the Sacramento-San Joaquin River Delta and California coast resulting different increments of sea level rise coupled with extreme storm events. Users may select from four scenarios to view the range in potential inundation depth for the grid cell. The four scenarios are: No rise, 0.5 meter, 1.0 meter, 1.41 meters
Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

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

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

6.3. Adjusted Climate Risk Scores

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

Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores 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	37.6
AQ-PM	44.5
AQ-DPM	45.5
Drinking Water	29.0
Lead Risk Housing	21.4
Pesticides	0.00
Toxic Releases	35.8
Traffic	55.5
Effect Indicators	—
CleanUp Sites	33.9
Groundwater	64.5

Haz Waste Facilities/Generators	87.7
Impaired Water Bodies	72.2
Solid Waste	0.00
Sensitive Population	—
Asthma	27.1
Cardio-vascular	4.32
Low Birth Weights	20.9
Socioeconomic Factor Indicators	—
Education	16.8
Housing	30.2
Linguistic	22.2
Poverty	15.6
Unemployment	72.5

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	58.91184396
Employed	48.77454125
Median HI	71.4744001
Education	—
Bachelor's or higher	75.77312973
High school enrollment	100
Preschool enrollment	88.27152573
Transportation	—
Auto Access	26.42114718

Active commuting	41.99923008
Social	—
2-parent households	74.72090337
Voting	67.3681509
Neighborhood	—
Alcohol availability	81.09842166
Park access	81.35506224
Retail density	19.41485949
Supermarket access	2.399589375
Tree canopy	35.94251251
Housing	—
Homeownership	34.7747979
Housing habitability	66.35442063
Low-inc homeowner severe housing cost burden	65.0455537
Low-inc renter severe housing cost burden	68.13807263
Uncrowded housing	60.05389452
Health Outcomes	—
Insured adults	71.87219299
Arthritis	89.2
Asthma ER Admissions	73.3
High Blood Pressure	94.0
Cancer (excluding skin)	55.0
Asthma	72.9
Coronary Heart Disease	88.8
Chronic Obstructive Pulmonary Disease	86.1
Diagnosed Diabetes	92.6
Life Expectancy at Birth	51.7

Cognitively Disabled	36.6
Physically Disabled	77.4
Heart Attack ER Admissions	89.3
Mental Health Not Good	69.9
Chronic Kidney Disease	90.3
Obesity	79.9
Pedestrian Injuries	19.6
Physical Health Not Good	90.6
Stroke	88.3
Health Risk Behaviors	—
Binge Drinking	2.4
Current Smoker	68.2
No Leisure Time for Physical Activity	83.8
Climate Change Exposures	—
Wildfire Risk	57.5
SLR Inundation Area	0.0
Children	87.0
Elderly	73.1
English Speaking	54.0
Foreign-born	27.7
Outdoor Workers	56.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	31.6
Traffic Density	37.9
Traffic Access	48.8
Other Indices	—
Hardship	21.0

Other Decision Support	—
2016 Voting	74.1

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	19.0
Healthy Places Index Score for Project Location (b)	70.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
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	Project footprint estimated to be approx 1.5 acres.
Construction: Construction Phases	Construction assumptions provided by project engineers.
Construction: Off-Road Equipment	Construction assumptions provided by project engineers.
Construction: Dust From Material Movement	Construction assumptions provided by project engineers.

Construction: Trips and VMT	Construction assumptions provided by project engineers. Zeroed out worker trips as they are passenger vehicles and not diesel fueled vehicles. Reduced truck trips to 0.19 miles to represent "on-site" emissions.

Fenton Construction Phase 2 - CIP HRA Detailed Report

Off-Site Improvements

Table of Contents

8. User Changes to Default Data

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Fenton Construction Phase 2 - CIP HRA
Construction Start Date	2/11/2026
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	2.50
Precipitation (days)	19.8
Location	Fenton Pkwy, San Diego, CA 92108, USA
County	San Diego
City	San Diego
Air District	San Diego County APCD
Air Basin	San Diego
TAZ	6340
EDFZ	12
Electric Utility	San Diego Gas & Electric
Gas Utility	San Diego Gas & Electric
App Version	2022.1.1.21

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
Road Construction	0.10	Mile	0.15	0.00	—	—	—	—

Other Non-Asphalt Surfaces	0.15	Acre	0.15	0.00	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

Sector	#	Measure Title
Construction	C-5	Use Advanced Engine Tiers

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.	3.70	3.06	27.7	30.9	0.06	1.09	3.27	4.36	1.00	0.36	1.36	—	6,869	6,869	0.33	0.11	0.01	6,911
Mit.	0.83	0.75	8.71	39.3	0.06	0.17	3.27	3.39	0.16	0.36	0.48	—	6,869	6,869	0.33	0.11	0.01	6,911
% Reduced	78%	75%	69%	-27%	—	84%	—	22%	84%	—	65%	—	—	—	—	—	—	—
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.23	0.19	1.69	1.91	< 0.005	0.07	0.19	0.26	0.06	0.02	0.08	—	427	427	0.02	0.01	< 0.005	429
Mit.	0.06	0.06	0.50	2.45	< 0.005	0.01	0.19	0.20	0.01	0.02	0.03	—	427	427	0.02	0.01	< 0.005	429
% Reduced	76%	71%	71%	-28%	—	85%	—	22%	84%	—	63%	—	—	—	—	—	—	—
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.04	0.04	0.31	0.35	< 0.005	0.01	0.04	0.05	0.01	< 0.005	0.02	—	70.6	70.6	< 0.005	< 0.005	< 0.005	71.0

Mit.	0.01	0.01	0.09	0.45	< 0.005	< 0.005	0.04	0.04	< 0.005	< 0.005	0.01	—	70.6	70.6	< 0.005	< 0.005	< 0.005	71.0
% Reduced	76%	71%	71%	-28%	—	85%	—	22%	84%	—	63%	—	—	—	—	—	—	—

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2026	3.70	3.06	27.7	30.9	0.06	1.09	3.27	4.36	1.00	0.36	1.36	—	6,869	6,869	0.33	0.11	0.01	6,911
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2026	0.23	0.19	1.69	1.91	< 0.005	0.07	0.19	0.26	0.06	0.02	0.08	—	427	427	0.02	0.01	< 0.005	429
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2026	0.04	0.04	0.31	0.35	< 0.005	0.01	0.04	0.05	0.01	< 0.005	0.02	—	70.6	70.6	< 0.005	< 0.005	< 0.005	71.0

2.3. Construction Emissions by Year, Mitigated

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)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2026	0.83	0.75	8.71	39.3	0.06	0.17	3.27	3.39	0.16	0.36	0.48	—	6,869	6,869	0.33	0.11	0.01	6,911

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2026	0.06	0.06	0.50	2.45	< 0.005	0.01	0.19	0.20	0.01	0.02	0.03	—	427	427	0.02	0.01	< 0.005	429
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2026	0.01	0.01	0.09	0.45	< 0.005	< 0.005	0.04	0.04	< 0.005	< 0.005	0.01	—	70.6	70.6	< 0.005	< 0.005	< 0.005	71.0

3. Construction Emissions Details

3.1. Linear, Grubbing & Land Clearing (2026) - 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	0.44	0.37	3.22	3.48	< 0.005	0.19	—	0.19	0.17	—	0.17	—	490	490	0.02	< 0.005	—	492
Dust From Material Movement	—	—	—	—	—	—	0.53	0.53	—	0.06	0.06	—	—	—	—	—	—	—
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.03	4.03	< 0.005	< 0.005	—	4.04

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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.67	0.67	< 0.005	< 0.005	—	0.67
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.36	3.36	< 0.005	< 0.005	< 0.005	3.53
Hauling	0.01	0.01	0.19	0.13	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	28.5	28.5	0.01	< 0.005	< 0.005	30.0
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.03	0.03	< 0.005	< 0.005	< 0.005	0.03
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.23	0.23	< 0.005	< 0.005	< 0.005	0.25
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005

Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.04	0.04	< 0.005	< 0.005	< 0.005	0.04

3.2. Linear, Grubbing & Land Clearing (2026) - Mitigated

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	0.05	0.05	0.84	3.43	< 0.005	0.01	—	0.01	0.01	—	0.01	—	490	490	0.02	< 0.005	—	492
Dust From Material Movement	—	—	—	—	—	—	0.53	0.53	—	0.06	0.06	—	—	—	—	—	—	—
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.03	4.03	< 0.005	< 0.005	—	4.04
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
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	< 0.005	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	0.67	0.67	< 0.005	< 0.005	—	0.67

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.36	3.36	< 0.005	< 0.005	< 0.005	3.53
Hauling	0.01	0.01	0.19	0.13	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	28.5	28.5	0.01	< 0.005	< 0.005	30.0
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.03	0.03	< 0.005	< 0.005	< 0.005	0.03
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.23	0.23	< 0.005	< 0.005	< 0.005	0.25
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.04	0.04	< 0.005	< 0.005	< 0.005	0.04

3.3. Linear, Grading & Excavation (2026) - 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	3.52	2.96	25.2	29.1	0.06	1.09	—	1.09	1.00	—	1.00	—	6,495	6,495	0.26	0.05	—	6,517
Dust From Material Movement	—	—	—	—	—	—	3.24	3.24	—	0.35	0.35	—	—	—	—	—	—	—
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	0.12	0.10	0.83	0.96	< 0.005	0.04	—	0.04	0.03	—	0.03	—	214	214	0.01	< 0.005	—	214
Dust From Material Movement	—	—	—	—	—	—	0.11	0.11	—	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	0.02	0.02	0.15	0.17	< 0.005	0.01	—	0.01	0.01	—	0.01	—	35.4	35.4	< 0.005	< 0.005	—	35.5
Dust From Material Movement	—	—	—	—	—	—	0.02	0.02	—	< 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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.36	3.36	< 0.005	< 0.005	< 0.005	3.53
Hauling	0.17	0.09	2.53	1.73	< 0.005	< 0.005	0.03	0.03	< 0.005	0.01	0.01	—	371	371	0.07	0.06	0.01	391
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.11	0.11	< 0.005	< 0.005	< 0.005	0.12
Hauling	0.01	< 0.005	0.08	0.06	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	12.1	12.1	< 0.005	< 0.005	< 0.005	12.8
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
Hauling	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.00	2.00	< 0.005	< 0.005	< 0.005	2.11

3.4. Linear, Grading & Excavation (2026) - Mitigated

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	0.66	0.66	6.16	37.5	0.06	0.12	—	0.12	0.12	—	0.12	—	6,495	6,495	0.26	0.05	—	6,517

Dust From Material Movement	—	—	—	—	—	—	3.24	3.24	—	0.35	0.35	—	—	—	—	—	—	—
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	0.20	1.23	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	214	214	0.01	< 0.005	—	214
Dust From Material Movement	—	—	—	—	—	—	0.11	0.11	—	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	0.04	0.23	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	35.4	35.4	< 0.005	< 0.005	—	35.5
Dust From Material Movement	—	—	—	—	—	—	0.02	0.02	—	< 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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.36	3.36	< 0.005	< 0.005	< 0.005	3.53
Hauling	0.17	0.09	2.53	1.73	< 0.005	< 0.005	0.03	0.03	< 0.005	0.01	0.01	—	371	371	0.07	0.06	0.01	391

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.11	0.11	< 0.005	< 0.005	< 0.005	0.12
Hauling	0.01	< 0.005	0.08	0.06	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	12.1	12.1	< 0.005	< 0.005	< 0.005	12.8
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
Hauling	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.00	2.00	< 0.005	< 0.005	< 0.005	2.11

3.5. Linear, Drainage, Utilities, & Sub-Grade (2026) - 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	2.85	2.39	21.2	23.3	0.05	0.83	—	0.83	0.76	—	0.76	—	5,693	5,693	0.23	0.05	—	5,712
Dust From Material Movement	—	—	—	—	—	—	2.66	2.66	—	0.29	0.29	—	—	—	—	—	—	—
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	0.09	0.07	0.64	0.70	< 0.005	0.02	—	0.02	0.02	—	0.02	—	172	172	0.01	< 0.005	—	172

Dust From Material Movement	—	—	—	—	—	—	0.08	0.08	—	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	0.02	0.01	0.12	0.13	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	28.4	28.4	< 0.005	< 0.005	—	28.5
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.36	3.36	< 0.005	< 0.005	< 0.005	3.53
Hauling	0.01	0.01	0.19	0.13	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	28.5	28.5	0.01	< 0.005	< 0.005	30.0
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.10	0.10	< 0.005	< 0.005	< 0.005	0.11
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.85	0.85	< 0.005	< 0.005	< 0.005	0.90
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02

Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.14	0.14	< 0.005	< 0.005	< 0.005	0.15

3.6. Linear, Drainage, Utilities, & Sub-Grade (2026) - Mitigated

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	0.79	0.74	5.12	31.6	0.05	0.17	—	0.17	0.16	—	0.16	—	5,693	5,693	0.23	0.05	—	5,712
Dust From Material Movement	—	—	—	—	—	—	2.66	2.66	—	0.29	0.29	—	—	—	—	—	—	—
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	0.95	< 0.005	0.01	—	0.01	< 0.005	—	< 0.005	—	172	172	0.01	< 0.005	—	172
Dust From Material Movement	—	—	—	—	—	—	0.08	0.08	—	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	0.17	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	28.4	28.4	< 0.005	< 0.005	—	28.5

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.36	3.36	< 0.005	< 0.005	< 0.005	3.53
Hauling	0.01	0.01	0.19	0.13	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	28.5	28.5	0.01	< 0.005	< 0.005	30.0
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.10	0.10	< 0.005	< 0.005	< 0.005	0.11
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.85	0.85	< 0.005	< 0.005	< 0.005	0.90
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.02	0.02	< 0.005	< 0.005	< 0.005	0.02
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.14	0.14	< 0.005	< 0.005	< 0.005	0.15

3.7. Linear, Paving (2026) - 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	1.00	0.84	7.37	10.8	0.01	0.30	—	0.30	0.28	—	0.28	—	1,619	1,619	0.07	0.01	—	1,625
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	0.15	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	22.2	22.2	< 0.005	< 0.005	—	22.3
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	3.67	3.67	< 0.005	< 0.005	—	3.68
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.36	3.36	< 0.005	< 0.005	< 0.005	3.53
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.05	0.05	< 0.005	< 0.005	< 0.005	0.05
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.01	0.01	< 0.005	< 0.005	< 0.005	0.01
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.8. Linear, Paving (2026) - Mitigated

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	0.18	0.18	2.58	11.3	0.01	0.03	—	0.03	0.03	—	0.03	—	1,619	1,619	0.07	0.01	—	1,625
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	0.04	0.16	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	22.2	22.2	< 0.005	< 0.005	—	22.3
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	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	3.67	3.67	< 0.005	< 0.005	—	3.68

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.36	3.36	< 0.005	< 0.005	< 0.005	3.53
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.05	0.05	< 0.005	< 0.005	< 0.005	0.05
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.01	0.01	< 0.005	< 0.005	< 0.005	0.01
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 (2026) - 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	0.15	0.12	0.86	1.13	< 0.005	0.02	—	0.02	0.02	—	0.02	—	134	134	0.01	< 0.005	—	134
Architectural Coatings	—	0.36	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.83	1.83	< 0.005	< 0.005	—	1.84
Architectural Coatings	—	< 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	—	0.30	0.30	< 0.005	< 0.005	—	0.30
Architectural Coatings	—	< 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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.36	3.36	< 0.005	< 0.005	< 0.005	3.53
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.05	0.05	< 0.005	< 0.005	< 0.005	0.05
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.01	0.01	< 0.005	< 0.005	< 0.005	0.01
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.10. Architectural Coating (2026) - Mitigated

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	0.02	0.02	0.65	0.96	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	134	134	0.01	< 0.005	—	134
Architectural Coatings	—	0.36	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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	—	1.83	1.83	< 0.005	< 0.005	—	1.84
Architectural Coatings	—	< 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	—	0.30	0.30	< 0.005	< 0.005	—	0.30
Architectural Coatings	—	< 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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	3.36	3.36	< 0.005	< 0.005	< 0.005	3.53
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.05	0.05	< 0.005	< 0.005	< 0.005	0.05
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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.01	0.01	< 0.005	< 0.005	< 0.005	0.01
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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

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

4.10.4. Soil Carbon Accumulation By Vegetation Type - Mitigated

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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

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

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

Land Use	TOG	ROG	NOx	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	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.6. Avoided and Sequestered Emissions by Species - Mitigated

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

5.1. Construction Schedule

Phase Name	Phase Type	Start Date	End Date	Days Per Week	Work Days per Phase	Phase Description
Linear, Grubbing & Land Clearing	Linear, Grubbing & Land Clearing	2/9/2026	2/11/2026	5.00	3.00	—

Linear, Grading & Excavation	Linear, Grading & Excavation	2/12/2026	2/27/2026	5.00	12.0	—
Linear, Drainage, Utilities, & Sub-Grade	Linear, Drainage, Utilities, & Sub-Grade	3/2/2026	3/16/2026	5.00	11.0	—
Linear, Paving	Linear, Paving	3/17/2026	3/23/2026	5.00	5.00	—
Architectural Coating	Architectural Coating	3/24/2026	3/30/2026	5.00	5.00	—

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
Linear, Grubbing & Land Clearing	Crawler Tractors	Diesel	Average	1.00	8.00	87.0	0.43
Linear, Grubbing & Land Clearing	Excavators	Diesel	Average	1.00	8.00	36.0	0.38
Linear, Grubbing & Land Clearing	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Grading & Excavation	Crawler Tractors	Diesel	Average	1.00	8.00	87.0	0.43
Linear, Grading & Excavation	Excavators	Diesel	Average	3.00	8.00	36.0	0.38
Linear, Grading & Excavation	Graders	Diesel	Average	1.00	8.00	148	0.41
Linear, Grading & Excavation	Rollers	Diesel	Average	2.00	8.00	36.0	0.38
Linear, Grading & Excavation	Rubber Tired Loaders	Diesel	Average	1.00	8.00	150	0.36
Linear, Grading & Excavation	Scrapers	Diesel	Average	2.00	8.00	423	0.48
Linear, Grading & Excavation	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82

Linear, Grading & Excavation	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Linear, Drainage, Utilities, & Sub-Grade	Air Compressors	Diesel	Average	1.00	8.00	37.0	0.48
Linear, Drainage, Utilities, & Sub-Grade	Generator Sets	Diesel	Average	1.00	8.00	14.0	0.74
Linear, Drainage, Utilities, & Sub-Grade	Graders	Diesel	Average	1.00	8.00	148	0.41
Linear, Drainage, Utilities, & Sub-Grade	Plate Compactors	Diesel	Average	1.00	8.00	8.00	0.43
Linear, Drainage, Utilities, & Sub-Grade	Pumps	Diesel	Average	1.00	8.00	11.0	0.74
Linear, Drainage, Utilities, & Sub-Grade	Rough Terrain Forklifts	Diesel	Average	1.00	8.00	96.0	0.40
Linear, Drainage, Utilities, & Sub-Grade	Scrapers	Diesel	Average	2.00	8.00	423	0.48
Linear, Drainage, Utilities, & Sub-Grade	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Drainage, Utilities, & Sub-Grade	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Linear, Paving	Pavers	Diesel	Average	1.00	8.00	81.0	0.42
Linear, Paving	Paving Equipment	Diesel	Average	1.00	8.00	89.0	0.36
Linear, Paving	Rollers	Diesel	Average	3.00	8.00	36.0	0.38
Linear, Paving	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Paving	Tractors/Loaders/Backhoes	Diesel	Average	2.00	8.00	84.0	0.37
Architectural Coating	Air Compressors	Diesel	Average	1.00	6.00	37.0	0.48

5.2.2. Mitigated

Phase Name	Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
Linear, Grubbing & Land Clearing	Crawler Tractors	Diesel	Tier 4 Final	1.00	8.00	87.0	0.43

Linear, Grubbing & Land Clearing	Excavators	Diesel	Tier 4 Final	1.00	8.00	36.0	0.38
Linear, Grubbing & Land Clearing	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Grading & Excavation	Crawler Tractors	Diesel	Tier 4 Final	1.00	8.00	87.0	0.43
Linear, Grading & Excavation	Excavators	Diesel	Tier 4 Final	3.00	8.00	36.0	0.38
Linear, Grading & Excavation	Graders	Diesel	Tier 4 Final	1.00	8.00	148	0.41
Linear, Grading & Excavation	Rollers	Diesel	Tier 4 Final	2.00	8.00	36.0	0.38
Linear, Grading & Excavation	Rubber Tired Loaders	Diesel	Tier 4 Final	1.00	8.00	150	0.36
Linear, Grading & Excavation	Scrapers	Diesel	Tier 4 Final	2.00	8.00	423	0.48
Linear, Grading & Excavation	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Grading & Excavation	Tractors/Loaders/Backhoes	Diesel	Tier 4 Final	2.00	8.00	84.0	0.37
Linear, Drainage, Utilities, & Sub-Grade	Air Compressors	Diesel	Tier 4 Final	1.00	8.00	37.0	0.48
Linear, Drainage, Utilities, & Sub-Grade	Generator Sets	Diesel	Average	1.00	8.00	14.0	0.74
Linear, Drainage, Utilities, & Sub-Grade	Graders	Diesel	Tier 4 Final	1.00	8.00	148	0.41
Linear, Drainage, Utilities, & Sub-Grade	Plate Compactors	Diesel	Average	1.00	8.00	8.00	0.43
Linear, Drainage, Utilities, & Sub-Grade	Pumps	Diesel	Average	1.00	8.00	11.0	0.74
Linear, Drainage, Utilities, & Sub-Grade	Rough Terrain Forklifts	Diesel	Tier 4 Final	1.00	8.00	96.0	0.40
Linear, Drainage, Utilities, & Sub-Grade	Scrapers	Diesel	Tier 4 Final	2.00	8.00	423	0.48

Linear, Drainage, Utilities, & Sub-Grade	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Drainage, Utilities, & Sub-Grade	Tractors/Loaders/Backhoes	Diesel	Tier 4 Final	2.00	8.00	84.0	0.37
Linear, Paving	Pavers	Diesel	Tier 4 Final	1.00	8.00	81.0	0.42
Linear, Paving	Paving Equipment	Diesel	Tier 4 Final	1.00	8.00	89.0	0.36
Linear, Paving	Rollers	Diesel	Tier 4 Final	3.00	8.00	36.0	0.38
Linear, Paving	Signal Boards	Electric	Average	0.00	8.00	6.00	0.82
Linear, Paving	Tractors/Loaders/Backhoes	Diesel	Tier 4 Final	2.00	8.00	84.0	0.37
Architectural Coating	Air Compressors	Diesel	Tier 4 Final	1.00	6.00	37.0	0.48

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Architectural Coating	—	—	—	—
Architectural Coating	Worker	0.00	12.0	LDA,LDT1,LDT2
Architectural Coating	Vendor	2.00	0.19	HHDT,MHDT
Architectural Coating	Hauling	0.00	20.0	HHDT
Architectural Coating	Onsite truck	—	—	HHDT
Linear, Grubbing & Land Clearing	—	—	—	—
Linear, Grubbing & Land Clearing	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Grubbing & Land Clearing	Vendor	2.00	0.19	HHDT,MHDT
Linear, Grubbing & Land Clearing	Hauling	12.0	0.19	HHDT
Linear, Grubbing & Land Clearing	Onsite truck	—	—	HHDT
Linear, Grading & Excavation	—	—	—	—
Linear, Grading & Excavation	Worker	0.00	12.0	LDA,LDT1,LDT2

Linear, Grading & Excavation	Vendor	2.00	0.19	HHDT,MHDT
Linear, Grading & Excavation	Hauling	156	0.19	HHDT
Linear, Grading & Excavation	Onsite truck	—	—	HHDT
Linear, Drainage, Utilities, & Sub-Grade	—	—	—	—
Linear, Drainage, Utilities, & Sub-Grade	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Drainage, Utilities, & Sub-Grade	Vendor	2.00	0.19	HHDT,MHDT
Linear, Drainage, Utilities, & Sub-Grade	Hauling	12.0	0.19	HHDT
Linear, Drainage, Utilities, & Sub-Grade	Onsite truck	—	—	HHDT
Linear, Paving	—	—	—	—
Linear, Paving	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Paving	Vendor	2.00	0.19	HHDT,MHDT
Linear, Paving	Hauling	0.00	20.0	HHDT
Linear, Paving	Onsite truck	—	—	HHDT

5.3.2. Mitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Architectural Coating	—	—	—	—
Architectural Coating	Worker	0.00	12.0	LDA,LDT1,LDT2
Architectural Coating	Vendor	2.00	0.19	HHDT,MHDT
Architectural Coating	Hauling	0.00	20.0	HHDT
Architectural Coating	Onsite truck	—	—	HHDT
Linear, Grubbing & Land Clearing	—	—	—	—
Linear, Grubbing & Land Clearing	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Grubbing & Land Clearing	Vendor	2.00	0.19	HHDT,MHDT
Linear, Grubbing & Land Clearing	Hauling	12.0	0.19	HHDT
Linear, Grubbing & Land Clearing	Onsite truck	—	—	HHDT
Linear, Grading & Excavation	—	—	—	—

Linear, Grading & Excavation	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Grading & Excavation	Vendor	2.00	0.19	HHDT,MHDT
Linear, Grading & Excavation	Hauling	156	0.19	HHDT
Linear, Grading & Excavation	Onsite truck	—	—	HHDT
Linear, Drainage, Utilities, & Sub-Grade	—	—	—	—
Linear, Drainage, Utilities, & Sub-Grade	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Drainage, Utilities, & Sub-Grade	Vendor	2.00	0.19	HHDT,MHDT
Linear, Drainage, Utilities, & Sub-Grade	Hauling	12.0	0.19	HHDT
Linear, Drainage, Utilities, & Sub-Grade	Onsite truck	—	—	HHDT
Linear, Paving	—	—	—	—
Linear, Paving	Worker	0.00	12.0	LDA,LDT1,LDT2
Linear, Paving	Vendor	2.00	0.19	HHDT,MHDT
Linear, Paving	Hauling	0.00	20.0	HHDT
Linear, Paving	Onsite truck	—	—	HHDT

5.4. Vehicles

5.4.1. Construction Vehicle Control Strategies

Non-applicable. No control strategies activated by user.

5.5. Architectural Coatings

Phase Name	Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
Architectural Coating	0.00	0.00	0.00	0.00	392

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)
Linear, Grubbing & Land Clearing	—	250	0.15	0.00	—
Linear, Grading & Excavation	13,400	200	0.15	0.00	—
Linear, Drainage, Utilities, & Sub-Grade	1,036	—	0.15	0.00	—

5.6.2. Construction Earthmoving Control Strategies

Non-applicable. No control strategies activated by user.

5.7. Construction Paving

Land Use	Area Paved (acres)	% Asphalt
Road Construction	0.15	100%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO_2	CH_4	N_2O
2026	0.00	589	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

5.18.1.2. Mitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.1.2. Mitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

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

5.18.2.2. Mitigated

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

6. Climate Risk Detailed Report

6.1. Climate Risk Summary

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

Climate Hazard	Result for Project Location	Unit
Temperature and Extreme Heat	7.50	annual days of extreme heat
Extreme Precipitation	2.70	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	3.64	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (Radke et al., 2017, CEC-500-2017-008), and consider inundation location and depth for the San Francisco Bay, the Sacramento-San Joaquin River Delta and California coast resulting different increments of sea level rise coupled with extreme storm events. Users may select from four scenarios to view the range in potential inundation depth for the grid cell. The four scenarios are: No rise, 0.5 meter, 1.0 meter, 1.41 meters
Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

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

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

6.3. Adjusted Climate Risk Scores

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

Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores 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	37.6
AQ-PM	44.5
AQ-DPM	45.5
Drinking Water	29.0
Lead Risk Housing	21.4
Pesticides	0.00
Toxic Releases	35.8
Traffic	55.5
Effect Indicators	—
CleanUp Sites	33.9

Groundwater	64.5
Haz Waste Facilities/Generators	87.7
Impaired Water Bodies	72.2
Solid Waste	0.00
Sensitive Population	—
Asthma	27.1
Cardio-vascular	4.32
Low Birth Weights	20.9
Socioeconomic Factor Indicators	—
Education	16.8
Housing	30.2
Linguistic	22.2
Poverty	15.6
Unemployment	72.5

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	58.91184396
Employed	48.77454125
Median HI	71.4744001
Education	—
Bachelor's or higher	75.77312973
High school enrollment	100
Preschool enrollment	88.27152573
Transportation	—

Auto Access	26.42114718
Active commuting	41.99923008
Social	—
2-parent households	74.72090337
Voting	67.3681509
Neighborhood	—
Alcohol availability	81.09842166
Park access	81.35506224
Retail density	19.41485949
Supermarket access	2.399589375
Tree canopy	35.94251251
Housing	—
Homeownership	34.7747979
Housing habitability	66.35442063
Low-inc homeowner severe housing cost burden	65.0455537
Low-inc renter severe housing cost burden	68.13807263
Uncrowded housing	60.05389452
Health Outcomes	—
Insured adults	71.87219299
Arthritis	89.2
Asthma ER Admissions	73.3
High Blood Pressure	94.0
Cancer (excluding skin)	55.0
Asthma	72.9
Coronary Heart Disease	88.8
Chronic Obstructive Pulmonary Disease	86.1
Diagnosed Diabetes	92.6

Life Expectancy at Birth	51.7
Cognitively Disabled	36.6
Physically Disabled	77.4
Heart Attack ER Admissions	89.3
Mental Health Not Good	69.9
Chronic Kidney Disease	90.3
Obesity	79.9
Pedestrian Injuries	19.6
Physical Health Not Good	90.6
Stroke	88.3
Health Risk Behaviors	—
Binge Drinking	2.4
Current Smoker	68.2
No Leisure Time for Physical Activity	83.8
Climate Change Exposures	—
Wildfire Risk	57.5
SLR Inundation Area	0.0
Children	87.0
Elderly	73.1
English Speaking	54.0
Foreign-born	27.7
Outdoor Workers	56.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	31.6
Traffic Density	37.9
Traffic Access	48.8
Other Indices	—

Hardship	21.0
Other Decision Support	—
2016 Voting	74.1

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	19.0
Healthy Places Index Score for Project Location (b)	70.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
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	Construction assumptions provided by project engineers.
Construction: Trips and VMT	Workers included for architectural coating phase. Worker trips zeroed out because they are not a source of DPM. Truck trips reduced to 0.19 miles to reflect "on-site" emissions.
Construction: Paving	Paving only required once.

Appendix B
Health Risk Assessment Output Files

```
**
**************************************
**
** AERMOD Input Produced by:
** AERMOD View Ver. 12.0.0
** Lakes Environmental Software Inc.
** Date: 12/21/2023
** File: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\Fenton Parkway
Construction2\Fenton Parkway Construction2.ADI
**
**************************************
**
**
**************************************
** AERMOD Control Pathway
**************************************
**
**
CO STARTING
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   MODELOPT DFAULT CONC
   AVERTIME 1 PERIOD
   URBANOPT 3276208 San_Diego_County
   POLLUTID PM_10
   RUNORNOT RUN
   ERRORFIL "Fenton Parkway Construction2.err"
CO FINISHED
**
**************************************
** AERMOD Source Pathway
**************************************
**
**
SO STARTING
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** Source ID - Type - X Coord. - Y Coord. **
** --------------------------------------------------------------------
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** PREFIX
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** Configuration = Adjacent
** Emission Rate = 1.0
** Vertical Dimension = 10.00
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   SRCPARAM L0000005     0.012345679      5.00      4.65     4.65
   SRCPARAM L0000006     0.012345679      5.00      4.65     4.65
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   SRCPARAM L0000010     0.012345679      5.00      4.65     4.65
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   SRCPARAM L0000023     0.012345679      5.00      4.65     4.65
   SRCPARAM L0000024     0.012345679      5.00      4.65     4.65
   SRCPARAM L0000025     0.012345679      5.00      4.65     4.65
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   SRCPARAM L0000027     0.012345679      5.00      4.65     4.65
   SRCPARAM L0000028     0.012345679      5.00      4.65     4.65
   SRCPARAM L0000029     0.012345679      5.00      4.65     4.65
   SRCPARAM L0000030     0.012345679      5.00      4.65     4.65
   SRCPARAM L0000031     0.012345679      5.00      4.65     4.65
   SRCPARAM L0000032     0.012345679      5.00      4.65     4.65
```

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   SRCPARAM L0000033     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000034     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000035     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000036     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000037     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000038     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000039     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000040     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000041     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000042     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000043     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000044     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000045     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000046     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000047     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000048     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000049     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000050     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000051     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000052     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000053     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000054     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000055     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000056     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000057     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000058     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000059     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000060     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000061     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000062     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000063     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000064     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000065     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000066     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000067     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000068     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000069     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000070     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000071     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000072     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000073     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000074     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000075     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000076     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000077     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000078     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000079     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000080     0.012345679      5.00       4.65     4.65
   SRCPARAM L0000081     0.012345679      5.00       4.65     4.65
** ----------------------------------------------------------------------------
```

```
   URBANSRC ALL
   SRCGROUP ALL
SO FINISHED
**
****************************************
** AERMOD Receptor Pathway
****************************************
**
**
RE STARTING
   INCLUDED "Fenton Parkway Construction2.rou"
RE FINISHED
**
****************************************
** AERMOD Meteorology Pathway
****************************************
**
**
ME STARTING
   SURFFILE "SDAPCD Kearny MetData\KVR_2019-2021_v22112.SFC"
   PROFFILE "SDAPCD Kearny MetData\KVR_2019-2021_v22112.PFL"
   SURFDATA 93107 2019
   UAIRDATA 3190 2019
   SITEDATA 72293 2019
   PROFBASE 132.0 METERS
ME FINISHED
**
****************************************
** AERMOD Output Pathway
****************************************
**
**
OU STARTING
   RECTABLE ALLAVE 1ST
   RECTABLE 1 1ST
** Auto-Generated Plotfiles
   PLOTFILE 1 ALL 1ST "FENTON PARKWAY CONSTRUCTION2.AD\01H1GALL.PLT" 31
   PLOTFILE PERIOD ALL "FENTON PARKWAY CONSTRUCTION2.AD\PE00GALL.PLT" 32
   SUMMFILE "Fenton Parkway Construction2.sum"
OU FINISHED


  ***  Message Summary For AERMOD Model Setup ***

   --------- Summary of Total Messages --------

 A Total of          0    Fatal Error Message(s)
 A Total of          1    Warning Message(s)
 A Total of          0    Informational Message(s)
```

```
    ******** FATAL ERROR MESSAGES ********
              ***   NONE  ***


    ********   WARNING MESSAGES   ********
 MX W403    275       PFLCNV: Turbulence data is being used w/o ADJ_U* option
SigA Data

 ***********************************
 *** SETUP Finishes Successfully ***
 ***********************************

  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***       11:15:09

                                  PAGE   1
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                                          ***     MODEL SETUP OPTIONS SUMMARY
 ***
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - -


 ** Model Options Selected:
      * Model Uses Regulatory DEFAULT Options
      * Model Is Setup For Calculation of Average CONCentration Values.
      * NO GAS DEPOSITION Data Provided.
      * NO PARTICLE DEPOSITION Data Provided.
      * Model Uses NO DRY DEPLETION. DDPLETE  =  F
      * Model Uses NO WET DEPLETION. WETDPLT  =  F
      * Stack-tip Downwash.
      * Model Accounts for ELEVated Terrain Effects.
      * Use Calms Processing Routine.
      * Use Missing Data Processing Routine.
      * No Exponential Decay.
      * Model Uses URBAN Dispersion Algorithm for the SBL for    81 Source(s),
        for  Total of    1 Urban Area(s):
   Urban Population =   3276208.0 ;  Urban  Roughness Length =  1.000 m
      * Urban Roughness Length of 1.0 Meter Used.
      * CCVR_Sub - Meteorological data includes CCVR substitutions
      * Model Assumes No FLAGPOLE Receptor Heights.
      * The User Specified a Pollutant Type of: PM_10

 **Model Calculates  1 Short Term Average(s) of:   1-HR
     and Calculates PERIOD Averages

 **This Run Includes:     81 Source(s);     1   Source Group(s); and    1266
```

```
Receptor(s)

                with:      0 POINT(s), including
                           0 POINTCAP(s) and      0 POINTHOR(s)
                 and:     81 VOLUME source(s)
                 and:      0 AREA type source(s)
                 and:      0 LINE source(s)
                 and:      0 RLINE/RLINEXT source(s)
                 and:      0 OPENPIT source(s)
                 and:      0 BUOYANT LINE source(s) with a total of     0 line(s)
                 and:      0 SWPOINT source(s)


 **Model Set To Continue RUNning After the Setup Testing.

 **The AERMET Input Meteorological Data Version Date:  22112

 **Output Options Selected:
          Model Outputs Tables of PERIOD Averages by Receptor
          Model Outputs Tables of Highest Short Term Values by Receptor (RECTABLE
Keyword)
          Model Outputs External File(s) of High Values for Plotting (PLOTFILE
Keyword)
          Model Outputs Separate Summary File of High Ranked Values (SUMMFILE
Keyword)

 **NOTE:  The Following Flags May Appear Following CONC Values:  c for Calm Hours
                                                               m   for Missing Hours
                                                               b   for Both Calm and
Missing Hours

 **Misc. Inputs:  Base Elev. for Pot. Temp. Profile (m MSL) =   132.00 ;  Decay
Coef. =    0.000   ;    Rot. Angle =     0.0
                  Emission Units = GRAMS/SEC                              ;
Emission Rate Unit Factor =   0.10000E+07
                  Output Units   = MICROGRAMS/M**3

 **Approximate Storage Requirements of Model =      3.7 MB of RAM.

 **Input Runstream File:          aermod.inp

 **Output Print File:             aermod.out


 **Detailed Error/Message File:   Fenton Parkway Construction2.err

 **File for Summary of Results:   Fenton Parkway Construction2.sum
```

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** VOLUME SOURCE DATA ***

SOURCE ID	NUMBER PART. CATS.	EMISSION RATE (GRAMS/SEC)	X (METERS)	Y (METERS)	BASE ELEV. (METERS)	RELEASE HEIGHT (METERS)	INIT. SY (METERS)	INIT. SZ (METERS)	URBAN SOURCE	EMISSION RATE SCALAR VARY BY	AIRCRAFT
L0000001	0	0.12346E-01	488143.2	3626723.5	15.9	5.00	4.65	4.65	YES		NO
L0000002	0	0.12346E-01	488147.6	3626714.5	15.1	5.00	4.65	4.65	YES		NO
L0000003	0	0.12346E-01	488152.1	3626705.6	14.5	5.00	4.65	4.65	YES		NO
L0000004	0	0.12346E-01	488156.6	3626696.6	15.3	5.00	4.65	4.65	YES		NO
L0000005	0	0.12346E-01	488161.0	3626687.7	15.9	5.00	4.65	4.65	YES		NO
L0000006	0	0.12346E-01	488169.2	3626682.0	15.6	5.00	4.65	4.65	YES		NO
L0000007	0	0.12346E-01	488177.2	3626676.2	14.9	5.00	4.65	4.65	YES		NO
L0000008	0	0.12346E-01	488180.1	3626666.6	14.1	5.00	4.65	4.65	YES		NO
L0000009	0	0.12346E-01	488185.7	3626660.1	13.5	5.00	4.65	4.65	YES		NO
L0000010	0	0.12346E-01	488193.8	3626656.3	13.0	5.00	4.65	4.65	YES		NO
L0000011	0	0.12346E-01	488197.4	3626647.0	12.6	5.00	4.65	4.65	YES		NO
L0000012	0	0.12346E-01	488201.1	3626637.7	12.3	5.00	4.65	4.65	YES		NO
L0000013	0	0.12346E-01	488204.7	3626628.4	12.0	5.00	4.65	4.65	YES		NO
L0000014	0	0.12346E-01	488208.3	3626619.1	11.8	5.00	4.65	4.65	YES		NO
L0000015	0	0.12346E-01	488212.0	3626609.8	11.7	5.00	4.65	4.65	YES		NO
L0000016	0	0.12346E-01	488215.6	3626600.5	12.1	5.00	4.65	4.65	YES		NO

L0000017 0 0.12346E-01 488219.3 3626591.2 12.4 5.00 4.65
4.65 YES NO
L0000 018 0 0.12346E-01 488222.9 3626581.8 12.8 5.00 4.65
4.65 YES NO
L0000 019 0 0.12346E-01 488220.8 3626573.1 14.4 5.00 4.65
4.65 YES NO
L0000 020 0 0.12346E-01 488217.9 3626564.2 15.9 5.00 4.65
4.65 YES NO
L0000 021 0 0.12346E-01 488219.9 3626554.4 18.0 5.00 4.65
4.65 YES NO
L0000 022 0 0.12346E-01 488224.1 3626545.6 19.5 5.00 4.65
4.65 YES NO
L0000 023 0 0.12346E-01 488229.8 3626537.4 20.3 5.00 4.65
4.65 YES NO
L0000 024 0 0.12346E-01 488236.3 3626531.1 20.3 5.00 4.65
4.65 YES NO
L0000 025 0 0.12346E-01 488239.3 3626540.7 20.3 5.00 4.65
4.65 YES NO
L0000 026 0 0.12346E-01 488235.3 3626549.0 20.3 5.00 4.65
4.65 YES NO
L0000 027 0 0.12346E-01 488233.9 3626556.3 19.2 5.00 4.65
4.65 YES NO
L0000 028 0 0.12346E-01 488241.9 3626562.3 18.5 5.00 4.65
4.65 YES NO
L0000 029 0 0.12346E-01 488234.2 3626567.1 16.9 5.00 4.65
4.65 YES NO
L0000 030 0 0.12346E-01 488234.1 3626574.6 15.4 5.00 4.65
4.65 YES NO
L0000 031 0 0.12346E-01 488236.1 3626583.7 14.1 5.00 4.65
4.65 YES NO
L0000 032 0 0.12346E-01 488232.3 3626592.9 13.0 5.00 4.65
4.65 YES NO
L0000 033 0 0.12346E-01 488228.5 3626602.2 12.3 5.00 4.65
4.65 YES NO
L0000 034 0 0.12346E-01 488224.6 3626611.4 12.0 5.00 4.65
4.65 YES NO
L0000 035 0 0.12346E-01 488220.8 3626620.7 12.1 5.00 4.65
4.65 YES NO
L0000 036 0 0.12346E-01 488217.0 3626629.9 12.2 5.00 4.65
4.65 YES NO
L0000 037 0 0.12346E-01 488213.2 3626639.2 12.5 5.00 4.65
4.65 YES NO
L0000 038 0 0.12346E-01 488209.4 3626648.4 12.6 5.00 4.65
4.65 YES NO
L0000 039 0 0.12346E-01 488205.6 3626657.7 12.7 5.00 4.65
4.65 YES NO
L0000 040 0 0.12346E-01 488204.5 3626667.0 12.8 5.00 4.65
4.65 YES NO

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** VOLUME SOURCE DATA ***

SOURCE ID	NUMBER PART. CATS.	EMISSION RATE (GRAMS/SEC)	X (METERS)	Y (METERS)	BASE ELEV. (METERS)	RELEASE HEIGHT (METERS)	INIT. SY (METERS)	INIT. SZ (METERS)	URBAN SOURCE	EMISSION RATE SCALAR VARY BY	AIRCRAFT
L0000041	0	0.12346E-01	488203.2	3626676.5	13.1	5.00	4.65	4.65	YES		NO
L0000042	0	0.12346E-01	488200.4	3626686.1	13.9	5.00	4.65	4.65	YES		NO
L0000043	0	0.12346E-01	488197.9	3626695.5	14.5	5.00	4.65	4.65	YES		NO
L0000044	0	0.12346E-01	488207.2	3626699.3	14.6	5.00	4.65	4.65	YES		NO
L0000045	0	0.12346E-01	488216.4	3626703.1	14.8	5.00	4.65	4.65	YES		NO
L0000046	0	0.12346E-01	488225.7	3626706.9	15.0	5.00	4.65	4.65	YES		NO
L0000047	0	0.12346E-01	488234.4	3626711.6	15.1	5.00	4.65	4.65	YES		NO
L0000048	0	0.12346E-01	488242.6	3626717.3	15.3	5.00	4.65	4.65	YES		NO
L0000049	0	0.12346E-01	488233.4	3626720.1	15.1	5.00	4.65	4.65	YES		NO
L0000050	0	0.12346E-01	488223.7	3626722.9	15.1	5.00	4.65	4.65	YES		NO
L0000051	0	0.12346E-01	488214.1	3626725.4	15.2	5.00	4.65	4.65	YES		NO
L0000052	0	0.12346E-01	488204.4	3626723.0	15.2	5.00	4.65	4.65	YES		NO
L0000053	0	0.12346E-01	488195.1	3626721.9	15.2	5.00	4.65	4.65	YES		NO
L0000054	0	0.12346E-01	488189.1	3626729.9	15.3	5.00	4.65	4.65	YES		NO
L0000055	0	0.12346E-01	488181.3	3626735.3	15.4	5.00	4.65	4.65	YES		NO
L0000056	0	0.12346E-01	488172.4	3626732.2	15.3	5.00	4.65	4.65	YES		NO

L0000057 0 0.12346E-01 488163.7 3626727.3 15.1 5.00 4.65
4.65 YES NO
L0000 058 0 0.12346E-01 488155.0 3626722.4 14.9 5.00 4.65
4.65 YES NO
L0000 059 0 0.12346E-01 488159.5 3626713.5 14.8 5.00 4.65
4.65 YES NO
L0000 060 0 0.12346E-01 488164.0 3626704.6 14.8 5.00 4.65
4.65 YES NO
L0000 061 0 0.12346E-01 488168.9 3626695.9 15.2 5.00 4.65
4.65 YES NO
L0000 062 0 0.12346E-01 488176.7 3626689.8 15.0 5.00 4.65
4.65 YES NO
L0000 063 0 0.12346E-01 488183.1 3626682.4 14.6 5.00 4.65
4.65 YES NO
L0000 064 0 0.12346E-01 488187.5 3626673.4 14.0 5.00 4.65
4.65 YES NO
L0000 065 0 0.12346E-01 488195.1 3626671.4 13.4 5.00 4.65
4.65 YES NO
L0000 066 0 0.12346E-01 488194.5 3626679.6 13.8 5.00 4.65
4.65 YES NO
L0000 067 0 0.12346E-01 488191.4 3626689.1 14.4 5.00 4.65
4.65 YES NO
L0000 068 0 0.12346E-01 488188.3 3626698.6 14.9 5.00 4.65
4.65 YES NO
L0000 069 0 0.12346E-01 488194.2 3626703.7 15.0 5.00 4.65
4.65 YES NO
L0000 070 0 0.12346E-01 488203.7 3626707.1 15.1 5.00 4.65
4.65 YES NO
L0000 071 0 0.12346E-01 488213.1 3626710.4 15.1 5.00 4.65
4.65 YES NO
L0000 072 0 0.12346E-01 488222.5 3626713.7 15.0 5.00 4.65
4.65 YES NO
L0000 073 0 0.12346E-01 488216.6 3626717.2 15.1 5.00 4.65
4.65 YES NO
L0000 074 0 0.12346E-01 488206.9 3626716.0 15.1 5.00 4.65
4.65 YES NO
L0000 075 0 0.12346E-01 488197.1 3626713.9 15.1 5.00 4.65
4.65 YES NO
L0000 076 0 0.12346E-01 488187.3 3626711.8 15.1 5.00 4.65
4.65 YES NO
L0000 077 0 0.12346E-01 488182.7 3626719.5 15.2 5.00 4.65
4.65 YES NO
L0000 078 0 0.12346E-01 488176.7 3626722.9 15.2 5.00 4.65
4.65 YES NO
L0000 079 0 0.12346E-01 488167.7 3626718.4 15.0 5.00 4.65
4.65 YES NO
L0000 080 0 0.12346E-01 488172.7 3626710.5 15.1 5.00 4.65
4.65 YES NO
*** AERMOD - VERSION 23132 *** *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ *** 12/21/23

```
 *** AERMET - VERSION  22112 ***   ***
                       ***       11:15:09

                                  PAGE   4
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data


                                                          ***  VOLUME SOURCE DATA ***

               NUMBER EMISSION RATE                      BASE     RELEASE    INIT.
INIT.   URBAN  EMISSION RATE   AIRCRAFT
   SOURCE       PART.  (GRAMS/SEC)    X          Y      ELEV.    HEIGHT     SY
SZ     SOURCE  SCALAR VARY
     ID         CATS.               (METERS) (METERS) (METERS) (METERS) (METERS)
(METERS)           BY
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - -

 L0000081         0   0.12346E-01  488178.5 3626702.4    15.1     5.00     4.65
4.65   YES                     NO
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***       11:15:09

                                  PAGE   5
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data


                                                   *** SOURCE IDs DEFINING SOURCE GROUPS ***

 SRCGROUP ID                                                  SOURCE IDs
 -----------                                                  ----------


 ALL         L0000001    , L0000002    , L0000003    , L0000004    , L0000005   ,
L0000006    , L0000007    , L0000008   ,

             L0000009    , L0000010    , L0000011    , L0000012    , L0000013   ,
L0000014    , L0000015    , L0000016   ,

             L0000017    , L0000018    , L0000019    , L0000020    , L0000021   ,
L0000022    , L0000023    , L0000024   ,

             L0000025    , L0000026    , L0000027    , L0000028    , L0000029   ,
L0000030    , L0000031    , L0000032   ,

             L0000033    , L0000034    , L0000035    , L0000036    , L0000037   ,
L0000038    , L0000039    , L0000040   ,
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             L0000041    , L0000042    , L0000043    , L0000044    , L0000045   ,
L0000046    , L0000047    , L0000048   ,

             L0000049    , L0000050    , L0000051    , L0000052    , L0000053   ,
L0000054    , L0000055    , L0000056   ,

             L0000057    , L0000058    , L0000059    , L0000060    , L0000061   ,
L0000062    , L0000063    , L0000064   ,

             L0000065    , L0000066    , L0000067    , L0000068    , L0000069   ,
L0000070    , L0000071    , L0000072   ,

             L0000073    , L0000074    , L0000075    , L0000076    , L0000077   ,
L0000078    , L0000079    , L0000080   ,

             L0000081    ,
```

```
                                            *** SOURCE IDs DEFINED AS URBAN SOURCES
***

  URBAN ID   URBAN  POP                                  SOURCE IDs
  --------   ---------                                   ----------


              3276208.   L0000001    , L0000002    , L0000003    , L0000004   ,
L0000005    , L0000006    , L0000007   ,
 L0000008    ,

             L0000009    , L0000010    , L0000011    , L0000012    , L0000013   ,
L0000014    , L0000015    , L0000016   ,

             L0000017    , L0000018    , L0000019    , L0000020    , L0000021   ,
L0000022    , L0000023    , L0000024   ,

             L0000025    , L0000026    , L0000027    , L0000028    , L0000029   ,
L0000030    , L0000031    , L0000032   ,

             L0000033    , L0000034    , L0000035    , L0000036    , L0000037   ,
L0000038    , L0000039    , L0000040   ,

             L0000041    , L0000042    , L0000043    , L0000044    , L0000045   ,
L0000046    , L0000047    , L0000048   ,
```

```
              L0000049    , L0000050    , L0000051    , L0000052    , L0000053   ,
L0000054    , L0000055    , L0000056   ,

              L0000057    , L0000058    , L0000059    , L0000060    , L0000061   ,
L0000062    , L0000063    , L0000064   ,

              L0000065    , L0000066    , L0000067    , L0000068    , L0000069   ,
L0000070    , L0000071    , L0000072   ,

              L0000073    , L0000074    , L0000075    , L0000076    , L0000077   ,
L0000078    , L0000079    , L0000080   ,

              L0000081    ,
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                                            ***  DISCRETE CARTESIAN RECEPTORS ***
                                           (X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
                                                         (METERS)

   (    487527.0, 3626464.5,      20.0,     123.4,       0.0);       (    487547.0,
3626464.5,      19.8,     123.4,       0.0);
  (    487567.0, 3626464.5,      19.5,     123.6,       0.0);       (    487587.0,
3626464.5,      19.2,     123.6,       0.0);
  (    487607.0, 3626464.5,      18.8,     123.7,       0.0);       (    487507.0,
3626484.5,      20.3,     123.3,       0.0);
  (    487527.0, 3626484.5,      20.2,     123.3,       0.0);       (    487547.0,
3626484.5,      20.0,     123.4,       0.0);
  (    487567.0, 3626484.5,      19.8,     123.4,       0.0);       (    487587.0,
3626484.5,      19.4,     123.6,       0.0);
  (    487607.0, 3626484.5,      18.9,     123.6,       0.0);       (    487627.0,
3626484.5,      18.3,     123.7,       0.0);
  (    487647.0, 3626484.5,      18.0,     123.7,       0.0);       (    487487.0,
3626504.5,      20.5,     123.3,       0.0);
  (    487507.0, 3626504.5,      20.6,     123.3,       0.0);       (    487527.0,
3626504.5,      20.4,     123.3,       0.0);
  (    487547.0, 3626504.5,      19.9,     123.3,       0.0);       (    487567.0,
3626504.5,      19.7,     123.4,       0.0);
  (    487587.0, 3626504.5,      19.4,     123.4,       0.0);       (    487607.0,
3626504.5,      18.8,     123.6,       0.0);
  (    487627.0, 3626504.5,      18.4,     123.6,       0.0);       (    487647.0,
3626504.5,      18.2,     123.7,       0.0);
  (    487667.0, 3626504.5,      18.0,     123.7,       0.0);       (    487687.0,
3626504.5,      17.6,     123.7,       0.0);
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(487707.0, 3626504.5, 17.1, 123.7, 0.0); (487467.0, 3626524.5, 20.6, 122.9, 0.0);
(487487.0, 3626524.5, 20.6, 123.0, 0.0); (487507.0, 3626524.5, 20.8, 123.3, 0.0);
(487527.0, 3626524.5, 20.6, 123.3, 0.0); (487547.0, 3626524.5, 19.9, 123.3, 0.0);
(487567.0, 3626524.5, 19.6, 123.3, 0.0); (487587.0, 3626524.5, 19.4, 123.4, 0.0);
(487607.0, 3626524.5, 19.0, 123.4, 0.0); (487627.0, 3626524.5, 18.5, 123.6, 0.0);
(487647.0, 3626524.5, 18.3, 123.6, 0.0); (487667.0, 3626524.5, 18.0, 123.6, 0.0);
(487687.0, 3626524.5, 17.6, 123.7, 0.0); (487707.0, 3626524.5, 17.5, 123.7, 0.0);
(487727.0, 3626524.5, 17.6, 123.7, 0.0); (487747.0, 3626524.5, 18.0, 123.7, 0.0);
(487767.0, 3626524.5, 18.2, 123.7, 0.0); (487447.0, 3626544.5, 21.6, 122.2, 0.0);
(487467.0, 3626544.5, 21.2, 122.2, 0.0); (487487.0, 3626544.5, 21.1, 122.2, 0.0);
(487507.0, 3626544.5, 20.9, 122.9, 0.0); (487527.0, 3626544.5, 20.2, 123.3, 0.0);
(487547.0, 3626544.5, 20.1, 123.3, 0.0); (487567.0, 3626544.5, 19.8, 123.3, 0.0);
(487587.0, 3626544.5, 19.7, 123.3, 0.0); (487607.0, 3626544.5, 19.9, 123.3, 0.0);
(487627.0, 3626544.5, 19.4, 123.4, 0.0); (487647.0, 3626544.5, 18.9, 123.4, 0.0);
(487667.0, 3626544.5, 18.3, 123.6, 0.0); (487687.0, 3626544.5, 17.8, 123.6, 0.0);
(487707.0, 3626544.5, 18.0, 123.7, 0.0); (487727.0, 3626544.5, 18.3, 123.7, 0.0);
(487747.0, 3626544.5, 18.4, 123.7, 0.0); (487767.0, 3626544.5, 18.5, 123.7, 0.0);
(487787.0, 3626544.5, 18.8, 123.7, 0.0); (487807.0, 3626544.5, 18.9, 123.7, 0.0);
(487827.0, 3626544.5, 18.8, 123.7, 0.0); (487427.0, 3626564.5, 22.2, 119.9, 0.0);
(487447.0, 3626564.5, 22.0, 121.7, 0.0); (487467.0, 3626564.5, 21.7, 122.2, 0.0);
(487487.0, 3626564.5, 21.4, 122.2, 0.0); (487507.0, 3626564.5, 21.0, 122.2, 0.0);
(487527.0, 3626564.5, 20.5, 122.9, 0.0); (487547.0, 3626564.5, 20.0, 123.3, 0.0);
(487567.0, 3626564.5, 19.6, 123.3, 0.0); (487587.0, 3626564.5, 19.7, 123.3, 0.0);
(487607.0, 3626564.5, 20.2, 123.3, 0.0); (487627.0, 3626564.5, 19.5, 123.3, 0.0);
(487647.0, 3626564.5, 19.1, 123.4, 0.0); (487667.0, 3626564.5, 18.8, 123.4, 0.0);

(487687.0, 3626564.5, 18.5, 123.6, 0.0); (487707.0,
3626564.5, 18.4, 123.6, 0.0);
(487727.0, 3626564.5, 18.8, 123.6, 0.0); (487747.0,
3626564.5, 18.7, 123.6, 0.0);
(487767.0, 3626564.5, 18.7, 123.7, 0.0); (487787.0,
3626564.5, 19.2, 123.7, 0.0);
(487807.0, 3626564.5, 19.2, 123.7, 0.0); (487827.0,
3626564.5, 19.1, 123.7, 0.0);
(487847.0, 3626564.5, 18.9, 123.7, 0.0); (487867.0,
3626564.5, 19.1, 123.7, 0.0);
(487427.0, 3626584.5, 22.7, 119.3, 0.0); (487447.0,
3626584.5, 22.3, 119.9, 0.0);
(487467.0, 3626584.5, 22.0, 122.2, 0.0); (487487.0,
3626584.5, 21.5, 122.2, 0.0);
(487507.0, 3626584.5, 21.1, 122.2, 0.0); (487527.0,
3626584.5, 21.2, 122.2, 0.0);

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(487547.0, 3626584.5, 19.8, 122.9, 0.0); (487567.0,
3626584.5, 19.3, 123.3, 0.0);
(487587.0, 3626584.5, 19.5, 123.3, 0.0); (487607.0,
3626584.5, 20.1, 123.3, 0.0);
(487627.0, 3626584.5, 19.2, 123.3, 0.0); (487647.0,
3626584.5, 19.1, 123.3, 0.0);
(487667.0, 3626584.5, 19.3, 123.3, 0.0); (487687.0,
3626584.5, 19.3, 123.4, 0.0);
(487707.0, 3626584.5, 18.8, 123.4, 0.0); (487727.0,
3626584.5, 19.2, 123.6, 0.0);
(487747.0, 3626584.5, 19.1, 123.6, 0.0); (487767.0,
3626584.5, 18.9, 123.6, 0.0);
(487787.0, 3626584.5, 19.2, 123.6, 0.0); (487807.0,
3626584.5, 19.2, 123.6, 0.0);
(487827.0, 3626584.5, 19.2, 123.7, 0.0); (487847.0,
3626584.5, 19.3, 123.7, 0.0);
(487867.0, 3626584.5, 19.6, 123.7, 0.0); (487887.0,
3626584.5, 19.5, 123.7, 0.0);
(487907.0, 3626584.5, 19.1, 123.7, 0.0); (487427.0,
3626604.5, 22.8, 119.3, 0.0);
(487447.0, 3626604.5, 22.6, 119.3, 0.0); (487467.0,
3626604.5, 22.4, 119.3, 0.0);

(487487.0, 3626604.5, 21.9, 122.2, 0.0); (487507.0, 3626604.5, 21.4, 122.2, 0.0);
(487527.0, 3626604.5, 21.2, 122.2, 0.0); (487547.0, 3626604.5, 20.0, 122.2, 0.0);
(487567.0, 3626604.5, 19.2, 123.3, 0.0); (487587.0, 3626604.5, 18.9, 123.3, 0.0);
(487607.0, 3626604.5, 19.1, 123.3, 0.0); (487627.0, 3626604.5, 19.3, 123.3, 0.0);
(487647.0, 3626604.5, 19.4, 123.3, 0.0); (487667.0, 3626604.5, 19.5, 123.3, 0.0);
(487687.0, 3626604.5, 19.5, 123.3, 0.0); (487707.0, 3626604.5, 19.2, 123.4, 0.0);
(487727.0, 3626604.5, 19.4, 123.4, 0.0); (487747.0, 3626604.5, 19.5, 123.4, 0.0);
(487767.0, 3626604.5, 19.4, 123.6, 0.0); (487787.0, 3626604.5, 19.2, 123.6, 0.0);
(487807.0, 3626604.5, 19.8, 123.6, 0.0); (487827.0, 3626604.5, 19.8, 123.6, 0.0);
(487847.0, 3626604.5, 19.7, 123.6, 0.0); (487867.0, 3626604.5, 19.6, 123.6, 0.0);
(487887.0, 3626604.5, 19.4, 123.7, 0.0); (487907.0, 3626604.5, 19.1, 123.7, 0.0);
(487927.0, 3626604.5, 18.9, 123.7, 0.0); (487407.0, 3626624.5, 23.4, 101.5, 0.0);
(487427.0, 3626624.5, 23.0, 101.5, 0.0); (487447.0, 3626624.5, 22.9, 101.4, 0.0);
(487467.0, 3626624.5, 22.6, 119.3, 0.0); (487487.0, 3626624.5, 22.2, 121.7, 0.0);
(487507.0, 3626624.5, 21.8, 122.2, 0.0); (487527.0, 3626624.5, 21.4, 122.2, 0.0);
(487547.0, 3626624.5, 20.1, 122.2, 0.0); (487567.0, 3626624.5, 19.0, 122.4, 0.0);
(487587.0, 3626624.5, 18.4, 123.3, 0.0); (487607.0, 3626624.5, 18.5, 123.3, 0.0);
(487627.0, 3626624.5, 19.0, 123.3, 0.0); (487647.0, 3626624.5, 19.4, 123.3, 0.0);
(487667.0, 3626624.5, 19.6, 123.3, 0.0); (487687.0, 3626624.5, 19.6, 123.3, 0.0);
(487707.0, 3626624.5, 19.6, 123.3, 0.0); (487727.0, 3626624.5, 19.7, 123.3, 0.0);
(487747.0, 3626624.5, 19.7, 123.3, 0.0); (487767.0, 3626624.5, 19.7, 123.4, 0.0);
(487787.0, 3626624.5, 19.7, 123.4, 0.0); (487807.0, 3626624.5, 20.2, 123.4, 0.0);
(487827.0, 3626624.5, 20.3, 123.6, 0.0); (487847.0, 3626624.5, 20.1, 123.6, 0.0);
(487867.0, 3626624.5, 19.7, 123.6, 0.0); (487887.0, 3626624.5, 19.5, 123.6, 0.0);
(487907.0, 3626624.5, 19.1, 123.6, 0.0); (487927.0, 3626624.5, 19.0, 123.7, 0.0);

```
   (    487947.0, 3626624.5,      19.0,     123.7,       0.0);       (    487407.0,
3626644.5,      23.6,     101.5,       0.0);
  (    487427.0, 3626644.5,      23.5,     101.5,       0.0);       (    487447.0,
3626644.5,      23.2,     101.5,       0.0);
  (    487467.0, 3626644.5,      22.6,     101.5,       0.0);       (    487487.0,
3626644.5,      22.4,     119.3,       0.0);
  (    487507.0, 3626644.5,      22.2,     121.7,       0.0);       (    487527.0,
3626644.5,      21.7,     122.2,       0.0);
  (    487547.0, 3626644.5,      20.0,     122.2,       0.0);       (    487567.0,
3626644.5,      18.7,     122.2,       0.0);
  (    487587.0, 3626644.5,      18.2,     122.4,       0.0);       (    487607.0,
3626644.5,      18.4,     123.3,       0.0);
  (    487627.0, 3626644.5,      18.5,     123.3,       0.0);       (    487647.0,
3626644.5,      19.2,     123.3,       0.0);
  (    487667.0, 3626644.5,      19.6,     123.3,       0.0);       (    487687.0,
3626644.5,      19.7,     123.3,       0.0);
  (    487707.0, 3626644.5,      19.9,     123.3,       0.0);       (    487727.0,
3626644.5,      19.9,     123.3,       0.0);
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***       11:15:09

                                  PAGE   9
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                                                     ***  DISCRETE CARTESIAN RECEPTORS ***
                                                    (X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
                                                                    (METERS)

   (    487747.0, 3626644.5,      19.7,     123.3,       0.0);       (    487767.0,
3626644.5,      19.7,     123.3,       0.0);
  (    487787.0, 3626644.5,      20.5,     123.3,       0.0);       (    487807.0,
3626644.5,      20.5,     123.3,       0.0);
  (    487827.0, 3626644.5,      20.8,     123.3,       0.0);       (    487847.0,
3626644.5,      20.5,     123.4,       0.0);
  (    487867.0, 3626644.5,      19.7,     123.6,       0.0);       (    487887.0,
3626644.5,      19.8,     123.6,       0.0);
  (    487907.0, 3626644.5,      19.2,     123.6,       0.0);       (    487927.0,
3626644.5,      18.9,     123.6,       0.0);
  (    487947.0, 3626644.5,      19.0,     123.6,       0.0);       (    487967.0,
3626644.5,      18.8,     123.6,       0.0);
  (    487387.0, 3626664.5,      24.3,     101.5,       0.0);       (    487407.0,
3626664.5,      24.0,     101.5,       0.0);
  (    487427.0, 3626664.5,      23.7,     101.5,       0.0);       (    487447.0,
3626664.5,      23.5,     101.5,       0.0);
  (    487467.0, 3626664.5,      23.0,     101.5,       0.0);       (    487487.0,
3626664.5,      22.7,     101.5,       0.0);
  (    487507.0, 3626664.5,      22.2,     119.3,       0.0);       (    487527.0,
3626664.5,      21.1,     121.7,       0.0);
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(487547.0, 3626664.5, 20.6, 122.2, 0.0); (487567.0, 3626664.5, 20.2, 122.2, 0.0);
(487587.0, 3626664.5, 19.7, 122.2, 0.0); (487607.0, 3626664.5, 19.2, 122.2, 0.0);
(487627.0, 3626664.5, 18.8, 122.4, 0.0); (487647.0, 3626664.5, 19.1, 122.7, 0.0);
(487667.0, 3626664.5, 19.6, 123.3, 0.0); (487687.0, 3626664.5, 19.9, 123.3, 0.0);
(487707.0, 3626664.5, 20.1, 123.3, 0.0); (487727.0, 3626664.5, 19.9, 123.3, 0.0);
(487747.0, 3626664.5, 20.2, 123.3, 0.0); (487767.0, 3626664.5, 20.8, 123.3, 0.0);
(487787.0, 3626664.5, 20.9, 123.3, 0.0); (487807.0, 3626664.5, 20.8, 123.3, 0.0);
(487827.0, 3626664.5, 20.9, 123.3, 0.0); (487847.0, 3626664.5, 20.8, 123.3, 0.0);
(487867.0, 3626664.5, 20.4, 123.3, 0.0); (487887.0, 3626664.5, 20.6, 123.4, 0.0);
(487907.0, 3626664.5, 20.3, 123.4, 0.0); (487927.0, 3626664.5, 19.7, 123.6, 0.0);
(487947.0, 3626664.5, 18.9, 123.6, 0.0); (487967.0, 3626664.5, 18.8, 123.6, 0.0);
(487987.0, 3626664.5, 18.8, 123.6, 0.0); (487387.0, 3626684.5, 24.8, 101.5, 0.0);
(487407.0, 3626684.5, 24.6, 101.5, 0.0); (487427.0, 3626684.5, 24.2, 101.5, 0.0);
(487447.0, 3626684.5, 23.8, 101.5, 0.0); (487467.0, 3626684.5, 23.4, 101.5, 0.0);
(487487.0, 3626684.5, 22.9, 101.5, 0.0); (487507.0, 3626684.5, 22.2, 101.5, 0.0);
(487527.0, 3626684.5, 21.1, 119.3, 0.0); (487547.0, 3626684.5, 21.0, 121.7, 0.0);
(487567.0, 3626684.5, 21.0, 122.2, 0.0); (487587.0, 3626684.5, 20.7, 122.2, 0.0);
(487607.0, 3626684.5, 20.1, 122.2, 0.0); (487627.0, 3626684.5, 19.5, 122.2, 0.0);
(487647.0, 3626684.5, 19.4, 122.2, 0.0); (487667.0, 3626684.5, 19.6, 122.4, 0.0);
(487687.0, 3626684.5, 20.1, 122.4, 0.0); (487707.0, 3626684.5, 20.2, 123.3, 0.0);
(487727.0, 3626684.5, 20.3, 123.3, 0.0); (487747.0, 3626684.5, 20.9, 123.3, 0.0);
(487767.0, 3626684.5, 21.4, 123.3, 0.0); (487787.0, 3626684.5, 21.2, 123.3, 0.0);
(487807.0, 3626684.5, 21.0, 123.3, 0.0); (487827.0, 3626684.5, 21.0, 123.3, 0.0);
(487847.0, 3626684.5, 21.0, 123.3, 0.0); (487867.0, 3626684.5, 21.0, 123.3, 0.0);
(487887.0, 3626684.5, 21.1, 123.3, 0.0); (487907.0, 3626684.5, 20.9, 123.4, 0.0);

(487927.0, 3626684.5, 20.2, 123.4, 0.0); (487947.0, 3626684.5, 19.3, 123.6, 0.0);
(487967.0, 3626684.5, 18.9, 123.6, 0.0); (487987.0, 3626684.5, 18.9, 123.6, 0.0);
(488007.0, 3626684.5, 19.0, 123.6, 0.0); (487367.0, 3626704.5, 25.6, 114.0, 0.0);
(487387.0, 3626704.5, 25.5, 112.6, 0.0); (487407.0, 3626704.5, 25.4, 101.5, 0.0);
(487427.0, 3626704.5, 25.1, 101.5, 0.0); (487447.0, 3626704.5, 24.1, 101.5, 0.0);
(487467.0, 3626704.5, 23.7, 101.5, 0.0); (487487.0, 3626704.5, 23.0, 101.5, 0.0);
(487507.0, 3626704.5, 22.4, 101.5, 0.0); (487527.0, 3626704.5, 21.9, 101.5, 0.0);
(487547.0, 3626704.5, 21.4, 101.5, 0.0); (487567.0, 3626704.5, 21.2, 121.7, 0.0);
(487587.0, 3626704.5, 21.2, 122.2, 0.0); (487607.0, 3626704.5, 21.2, 122.2, 0.0);
(487627.0, 3626704.5, 20.7, 122.2, 0.0); (487647.0, 3626704.5, 20.0, 122.2, 0.0);

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(487667.0, 3626704.5, 19.8, 122.2, 0.0); (487687.0, 3626704.5, 20.0, 122.2, 0.0);
(487707.0, 3626704.5, 20.3, 122.4, 0.0); (487727.0, 3626704.5, 21.0, 122.4, 0.0);
(487747.0, 3626704.5, 21.6, 122.4, 0.0); (487767.0, 3626704.5, 21.7, 122.4, 0.0);
(487787.0, 3626704.5, 21.4, 123.3, 0.0); (487807.0, 3626704.5, 21.1, 123.3, 0.0);
(487827.0, 3626704.5, 21.1, 123.3, 0.0); (487847.0, 3626704.5, 21.2, 123.3, 0.0);
(487867.0, 3626704.5, 21.4, 123.3, 0.0); (487887.0, 3626704.5, 21.4, 123.3, 0.0);
(487907.0, 3626704.5, 20.8, 123.3, 0.0); (487927.0, 3626704.5, 20.4, 123.4, 0.0);
(487947.0, 3626704.5, 20.1, 123.5, 0.0); (487967.0, 3626704.5, 19.2, 123.5, 0.0);
(487987.0, 3626704.5, 19.1, 123.5, 0.0); (488007.0, 3626704.5, 19.2, 123.5, 0.0);

(488027.0, 3626704.5, 19.3, 123.6, 0.0); (487387.0, 3626724.5, 26.1, 114.9, 0.0);
(487407.0, 3626724.5, 25.6, 114.0, 0.0); (487427.0, 3626724.5, 25.0, 114.0, 0.0);
(487447.0, 3626724.5, 24.5, 114.0, 0.0); (487467.0, 3626724.5, 24.2, 112.6, 0.0);
(487487.0, 3626724.5, 23.8, 101.5, 0.0); (487507.0, 3626724.5, 23.2, 101.5, 0.0);
(487527.0, 3626724.5, 22.5, 101.5, 0.0); (487547.0, 3626724.5, 22.2, 101.5, 0.0);
(487567.0, 3626724.5, 21.9, 101.5, 0.0); (487587.0, 3626724.5, 21.5, 121.7, 0.0);
(487607.0, 3626724.5, 20.9, 122.2, 0.0); (487627.0, 3626724.5, 20.8, 122.2, 0.0);
(487647.0, 3626724.5, 20.4, 122.2, 0.0); (487667.0, 3626724.5, 20.2, 122.2, 0.0);
(487687.0, 3626724.5, 20.3, 122.2, 0.0); (487707.0, 3626724.5, 20.5, 122.2, 0.0);
(487727.0, 3626724.5, 21.4, 122.2, 0.0); (487747.0, 3626724.5, 21.8, 122.2, 0.0);
(487767.0, 3626724.5, 21.8, 122.2, 0.0); (487787.0, 3626724.5, 21.8, 122.4, 0.0);
(487807.0, 3626724.5, 21.9, 122.4, 0.0); (487827.0, 3626724.5, 21.4, 123.3, 0.0);
(487847.0, 3626724.5, 21.0, 123.3, 0.0); (487867.0, 3626724.5, 21.3, 123.3, 0.0);
(487887.0, 3626724.5, 21.4, 123.3, 0.0); (487907.0, 3626724.5, 20.7, 123.3, 0.0);
(487927.0, 3626724.5, 20.2, 123.4, 0.0); (487947.0, 3626724.5, 19.8, 123.4, 0.0);
(487967.0, 3626724.5, 19.4, 123.5, 0.0); (487987.0, 3626724.5, 19.2, 123.5, 0.0);
(488007.0, 3626724.5, 19.2, 123.5, 0.0); (488027.0, 3626724.5, 19.3, 123.5, 0.0);
(488047.0, 3626724.5, 19.4, 123.5, 0.0); (487407.0, 3626744.5, 26.0, 114.9, 0.0);
(487427.0, 3626744.5, 25.1, 114.9, 0.0); (487447.0, 3626744.5, 25.0, 114.9, 0.0);
(487467.0, 3626744.5, 24.7, 114.9, 0.0); (487487.0, 3626744.5, 24.3, 114.0, 0.0);
(487507.0, 3626744.5, 23.8, 114.0, 0.0); (487527.0, 3626744.5, 23.0, 114.0, 0.0);
(487547.0, 3626744.5, 22.9, 101.5, 0.0); (487567.0, 3626744.5, 22.6, 101.5, 0.0);
(487587.0, 3626744.5, 21.9, 101.5, 0.0); (487607.0, 3626744.5, 20.9, 121.7, 0.0);
(487627.0, 3626744.5, 21.0, 122.2, 0.0); (487647.0, 3626744.5, 20.9, 122.2, 0.0);
(487667.0, 3626744.5, 20.8, 122.2, 0.0); (487687.0, 3626744.5, 20.7, 122.2, 0.0);

(487707.0, 3626744.5, 20.7, 122.2, 0.0); (487727.0, 3626744.5, 21.5, 122.2, 0.0);
(487747.0, 3626744.5, 21.8, 122.2, 0.0); (487767.0, 3626744.5, 21.9, 122.2, 0.0);
(487787.0, 3626744.5, 22.1, 122.2, 0.0); (487807.0, 3626744.5, 22.4, 122.2, 0.0);
(487827.0, 3626744.5, 21.8, 122.4, 0.0); (487847.0, 3626744.5, 21.2, 122.4, 0.0);
(487867.0, 3626744.5, 21.2, 123.3, 0.0); (487887.0, 3626744.5, 21.2, 123.3, 0.0);
(487907.0, 3626744.5, 20.6, 123.3, 0.0); (487927.0, 3626744.5, 20.1, 123.3, 0.0);
(487947.0, 3626744.5, 19.8, 123.4, 0.0); (487967.0, 3626744.5, 19.7, 123.5, 0.0);
(487987.0, 3626744.5, 19.5, 123.5, 0.0); (488007.0, 3626744.5, 19.4, 123.5, 0.0);
(488027.0, 3626744.5, 19.4, 123.5, 0.0); (488047.0, 3626744.5, 19.6, 123.5, 0.0);
(488067.0, 3626744.5, 19.6, 123.5, 0.0); (487447.0, 3626764.5, 25.5, 115.4, 0.0);
(487467.0, 3626764.5, 25.4, 115.4, 0.0); (487487.0, 3626764.5, 24.6, 115.4, 0.0);

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(487507.0, 3626764.5, 23.7, 115.4, 0.0); (487527.0, 3626764.5, 23.3, 114.9, 0.0);
(487547.0, 3626764.5, 23.4, 114.9, 0.0); (487567.0, 3626764.5, 23.0, 101.5, 0.0);
(487587.0, 3626764.5, 22.4, 101.5, 0.0); (487607.0, 3626764.5, 21.9, 101.5, 0.0);
(487627.0, 3626764.5, 21.4, 101.5, 0.0); (487647.0, 3626764.5, 21.4, 121.7, 0.0);
(487667.0, 3626764.5, 21.4, 122.2, 0.0); (487687.0, 3626764.5, 21.3, 122.2, 0.0);
(487707.0, 3626764.5, 21.0, 122.2, 0.0); (487727.0, 3626764.5, 21.2, 122.2, 0.0);
(487747.0, 3626764.5, 21.6, 122.2, 0.0); (487767.0, 3626764.5, 22.0, 122.2, 0.0);
(487787.0, 3626764.5, 22.4, 122.2, 0.0); (487807.0, 3626764.5, 22.4, 122.2, 0.0);

(487827.0, 3626764.5, 22.3, 122.2, 0.0); (487847.0,
3626764.5, 21.9, 122.2, 0.0);
(487867.0, 3626764.5, 21.1, 122.4, 0.0); (487887.0,
3626764.5, 20.9, 122.4, 0.0);
(487907.0, 3626764.5, 20.6, 123.3, 0.0); (487927.0,
3626764.5, 20.2, 123.3, 0.0);
(487947.0, 3626764.5, 19.9, 123.4, 0.0); (487967.0,
3626764.5, 20.1, 123.4, 0.0);
(487987.0, 3626764.5, 20.2, 123.5, 0.0); (488007.0,
3626764.5, 20.2, 123.5, 0.0);
(488027.0, 3626764.5, 19.9, 123.5, 0.0); (488047.0,
3626764.5, 19.4, 123.5, 0.0);
(488067.0, 3626764.5, 19.6, 123.5, 0.0); (488087.0,
3626764.5, 19.6, 123.5, 0.0);
(487467.0, 3626784.5, 25.1, 115.4, 0.0); (487487.0,
3626784.5, 24.4, 115.4, 0.0);
(487507.0, 3626784.5, 24.0, 115.4, 0.0); (487527.0,
3626784.5, 24.1, 115.4, 0.0);
(487547.0, 3626784.5, 23.7, 115.4, 0.0); (487567.0,
3626784.5, 23.3, 114.9, 0.0);
(487587.0, 3626784.5, 22.9, 114.9, 0.0); (487607.0,
3626784.5, 22.7, 101.5, 0.0);
(487627.0, 3626784.5, 22.5, 101.5, 0.0); (487647.0,
3626784.5, 22.2, 101.5, 0.0);
(487667.0, 3626784.5, 22.0, 101.5, 0.0); (487687.0,
3626784.5, 21.9, 121.7, 0.0);
(487707.0, 3626784.5, 21.9, 122.2, 0.0); (487727.0,
3626784.5, 21.6, 122.2, 0.0);
(487747.0, 3626784.5, 21.6, 122.2, 0.0); (487767.0,
3626784.5, 22.0, 122.2, 0.0);
(487787.0, 3626784.5, 22.5, 122.2, 0.0); (487807.0,
3626784.5, 22.4, 122.2, 0.0);
(487827.0, 3626784.5, 22.3, 122.2, 0.0); (487847.0,
3626784.5, 22.1, 122.2, 0.0);
(487867.0, 3626784.5, 21.8, 122.2, 0.0); (487887.0,
3626784.5, 21.2, 122.2, 0.0);
(487907.0, 3626784.5, 20.8, 122.2, 0.0); (487927.0,
3626784.5, 20.6, 122.4, 0.0);
(487947.0, 3626784.5, 20.5, 123.3, 0.0); (487967.0,
3626784.5, 20.4, 123.4, 0.0);
(487987.0, 3626784.5, 20.4, 123.4, 0.0); (488007.0,
3626784.5, 20.3, 123.5, 0.0);
(488027.0, 3626784.5, 20.2, 123.5, 0.0); (488047.0,
3626784.5, 19.9, 123.5, 0.0);
(487507.0, 3626804.5, 24.4, 115.4, 0.0); (487527.0,
3626804.5, 24.6, 115.4, 0.0);
(487547.0, 3626804.5, 24.0, 115.4, 0.0); (487567.0,
3626804.5, 23.7, 115.4, 0.0);
(487587.0, 3626804.5, 23.4, 115.4, 0.0); (487607.0,
3626804.5, 23.2, 114.9, 0.0);

```
  (    487627.0, 3626804.5,      23.4,     101.5,       0.0);       (    487647.0,
3626804.5,      22.9,     101.5,       0.0);
  (    487667.0, 3626804.5,      22.4,     101.5,       0.0);       (    487687.0,
3626804.5,      22.4,     101.5,       0.0);
  (    487707.0, 3626804.5,      22.6,     101.4,       0.0);       (    487727.0,
3626804.5,      22.2,     121.7,       0.0);
  (    487747.0, 3626804.5,      22.0,     122.2,       0.0);       (    487767.0,
3626804.5,      22.2,     122.2,       0.0);
  (    487787.0, 3626804.5,      22.4,     122.2,       0.0);       (    487807.0,
3626804.5,      22.4,     122.2,       0.0);
  (    487827.0, 3626804.5,      22.3,     122.2,       0.0);       (    487847.0,
3626804.5,      22.3,     122.2,       0.0);
  (    487867.0, 3626804.5,      22.3,     122.2,       0.0);       (    487887.0,
3626804.5,      21.6,     122.2,       0.0);
  (    487907.0, 3626804.5,      21.1,     122.2,       0.0);       (    487927.0,
3626804.5,      20.9,     122.2,       0.0);
  (    487947.0, 3626804.5,      20.9,     122.8,       0.0);       (    487967.0,
3626804.5,      20.8,     123.3,       0.0);
  (    487987.0, 3626804.5,      20.6,     123.4,       0.0);       (    487527.0,
3626824.5,      24.5,     115.4,       0.0);
  (    487547.0, 3626824.5,      24.5,     115.4,       0.0);       (    487567.0,
3626824.5,      24.3,     115.4,       0.0);
  (    487587.0, 3626824.5,      23.8,     115.4,       0.0);       (    487607.0,
3626824.5,      23.2,     115.4,       0.0);
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*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

```
  (    487627.0, 3626824.5,      23.3,     115.4,       0.0);       (    487647.0,
3626824.5,      23.0,     114.9,       0.0);
  (    487667.0, 3626824.5,      22.7,     101.5,       0.0);       (    487687.0,
3626824.5,      22.6,     101.5,       0.0);
  (    487707.0, 3626824.5,      22.6,     101.5,       0.0);       (    487727.0,
3626824.5,      22.9,     101.4,       0.0);
  (    487747.0, 3626824.5,      23.0,     101.2,       0.0);       (    487767.0,
3626824.5,      22.8,     101.2,       0.0);
  (    487787.0, 3626824.5,      22.3,     122.2,       0.0);       (    487807.0,
3626824.5,      22.4,     122.2,       0.0);
  (    487827.0, 3626824.5,      22.4,     122.2,       0.0);       (    487847.0,
3626824.5,      22.4,     122.2,       0.0);
  (    487867.0, 3626824.5,      22.4,     122.2,       0.0);       (    487887.0,
3626824.5,      22.4,     122.2,       0.0);
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```
   (    487547.0, 3626844.5,       24.7,      115.4,        0.0);        (    487567.0,
3626844.5,       24.4,      115.4,        0.0);
  (    487587.0, 3626844.5,       23.9,      115.4,        0.0);        (    487607.0,
3626844.5,       23.5,      115.4,        0.0);
  (    487627.0, 3626844.5,       23.4,      115.4,        0.0);        (    487647.0,
3626844.5,       23.1,      115.4,        0.0);
  (    487667.0, 3626844.5,       23.0,      115.4,        0.0);        (    487687.0,
3626844.5,       23.0,      101.5,        0.0);
  (    487707.0, 3626844.5,       22.8,      101.5,        0.0);        (    487727.0,
3626844.5,       23.1,      101.5,        0.0);
  (    487747.0, 3626844.5,       23.0,      101.4,        0.0);        (    487767.0,
3626844.5,       22.8,      101.2,        0.0);
  (    487787.0, 3626844.5,       22.6,      101.2,        0.0);        (    487807.0,
3626844.5,       22.5,      100.7,        0.0);
  (    487827.0, 3626844.5,       22.5,      122.2,        0.0);        (    487847.0,
3626844.5,       22.4,      122.2,        0.0);
  (    487547.0, 3626864.5,       25.0,      115.8,        0.0);        (    487567.0,
3626864.5,       24.4,      115.8,        0.0);
  (    487587.0, 3626864.5,       24.1,      115.8,        0.0);        (    487607.0,
3626864.5,       23.8,      115.4,        0.0);
  (    487627.0, 3626864.5,       23.7,      115.4,        0.0);        (    487647.0,
3626864.5,       23.4,      115.4,        0.0);
  (    487667.0, 3626864.5,       23.3,      115.4,        0.0);        (    487687.0,
3626864.5,       23.4,      115.4,        0.0);
  (    487707.0, 3626864.5,       23.1,      111.4,        0.0);        (    487727.0,
3626864.5,       23.1,      109.4,        0.0);
  (    487747.0, 3626864.5,       22.9,      101.5,        0.0);        (    487767.0,
3626864.5,       22.8,      101.4,        0.0);
  (    487787.0, 3626864.5,       22.9,      101.2,        0.0);        (    487807.0,
3626864.5,       22.7,      100.7,        0.0);
  (    487567.0, 3626884.5,       25.0,      115.8,        0.0);        (    487587.0,
3626884.5,       24.3,      115.8,        0.0);
  (    487607.0, 3626884.5,       24.1,      115.8,        0.0);        (    487627.0,
3626884.5,       24.5,      115.4,        0.0);
  (    487647.0, 3626884.5,       23.9,      115.4,        0.0);        (    487667.0,
3626884.5,       23.5,      115.4,        0.0);
  (    487687.0, 3626884.5,       23.4,      115.4,        0.0);        (    487707.0,
3626884.5,       23.1,      115.4,        0.0);
  (    487727.0, 3626884.5,       23.1,      114.0,        0.0);        (    487747.0,
3626884.5,       23.1,      109.4,        0.0);
  (    487767.0, 3626884.5,       23.1,      109.4,        0.0);        (    487787.0,
3626884.5,       23.2,      101.4,        0.0);
  (    487587.0, 3626904.5,       24.7,      115.8,        0.0);        (    487607.0,
3626904.5,       24.3,      115.8,        0.0);
  (    487627.0, 3626904.5,       24.7,      115.8,        0.0);        (    487647.0,
3626904.5,       24.4,      115.4,        0.0);
  (    487667.0, 3626904.5,       24.1,      115.4,        0.0);        (    487687.0,
3626904.5,       23.9,      115.4,        0.0);
  (    487707.0, 3626904.5,       23.5,      115.4,        0.0);        (    487727.0,
3626904.5,       23.4,      115.4,        0.0);
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(487747.0, 3626904.5, 23.4, 114.0, 0.0); (487767.0, 3626904.5, 23.3, 109.4, 0.0);
(487627.0, 3626924.5, 24.6, 115.8, 0.0); (487647.0, 3626924.5, 24.7, 115.8, 0.0);
(487667.0, 3626924.5, 24.7, 115.5, 0.0); (487687.0, 3626924.5, 24.5, 115.4, 0.0);
(487707.0, 3626924.5, 24.1, 115.4, 0.0); (487727.0, 3626924.5, 23.9, 115.4, 0.0);
(487747.0, 3626924.5, 23.7, 115.4, 0.0); (487647.0, 3626944.5, 24.7, 115.8, 0.0);
(487667.0, 3626944.5, 24.6, 115.8, 0.0); (487687.0, 3626944.5, 24.5, 115.8, 0.0);
(487707.0, 3626944.5, 24.5, 115.4, 0.0); (487727.0, 3626944.5, 24.4, 115.4, 0.0);
(487667.0, 3626964.5, 24.7, 115.8, 0.0); (487687.0, 3626964.5, 24.6, 115.8, 0.0);
(487707.0, 3626964.5, 24.7, 115.5, 0.0); (487687.0, 3626984.5, 24.9, 115.8, 0.0);
(488242.2, 3625436.4, 122.1, 122.1, 0.0); (488262.2, 3625436.4, 122.5, 122.5, 0.0);
(488242.2, 3625456.4, 122.1, 122.1, 0.0); (488262.2, 3625456.4, 122.5, 122.5, 0.0);
(488282.2, 3625456.4, 122.7, 122.7, 0.0); (488302.2, 3625456.4, 123.5, 123.5, 0.0);
(488322.2, 3625456.4, 123.5, 123.5, 0.0); (488242.2, 3625476.4, 122.1, 122.1, 0.0);

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(488262.2, 3625476.4, 122.6, 122.6, 0.0); (488282.2, 3625476.4, 122.8, 122.8, 0.0);
(488302.2, 3625476.4, 123.5, 123.5, 0.0); (488322.2, 3625476.4, 123.5, 123.5, 0.0);
(488342.2, 3625476.4, 123.3, 123.3, 0.0); (488362.2, 3625476.4, 123.1, 123.1, 0.0);
(488242.2, 3625496.4, 122.1, 122.1, 0.0); (488262.2, 3625496.4, 122.6, 122.6, 0.0);
(488282.2, 3625496.4, 122.8, 122.8, 0.0); (488302.2, 3625496.4, 123.1, 123.1, 0.0);
(488322.2, 3625496.4, 123.0, 123.0, 0.0); (488342.2, 3625496.4, 122.9, 122.9, 0.0);

(488362.2, 3625496.4, 122.8, 122.8, 0.0); (488382.2, 3625496.4, 122.8, 122.8, 0.0);
(488402.2, 3625496.4, 122.7, 122.7, 0.0); (488422.2, 3625496.4, 122.6, 122.6, 0.0);
(488242.2, 3625516.4, 122.3, 122.3, 0.0); (488262.2, 3625516.4, 122.8, 122.8, 0.0);
(488282.2, 3625516.4, 123.1, 123.1, 0.0); (488302.2, 3625516.4, 123.2, 123.2, 0.0);
(488322.2, 3625516.4, 123.1, 123.1, 0.0); (488342.2, 3625516.4, 123.0, 123.0, 0.0);
(488362.2, 3625516.4, 123.0, 123.0, 0.0); (488382.2, 3625516.4, 123.0, 123.0, 0.0);
(488402.2, 3625516.4, 122.9, 122.9, 0.0); (488422.2, 3625516.4, 122.6, 122.6, 0.0);
(488442.2, 3625516.4, 122.4, 122.4, 0.0); (488462.2, 3625516.4, 122.2, 122.2, 0.0);
(488482.2, 3625516.4, 122.2, 122.2, 0.0); (488222.2, 3625536.4, 120.7, 122.1, 0.0);
(488242.2, 3625536.4, 122.5, 122.5, 0.0); (488262.2, 3625536.4, 123.0, 123.0, 0.0);
(488282.2, 3625536.4, 123.6, 123.6, 0.0); (488302.2, 3625536.4, 123.7, 123.7, 0.0);
(488322.2, 3625536.4, 123.5, 123.5, 0.0); (488342.2, 3625536.4, 123.4, 123.4, 0.0);
(488362.2, 3625536.4, 123.4, 123.4, 0.0); (488382.2, 3625536.4, 123.3, 123.3, 0.0);
(488402.2, 3625536.4, 123.1, 123.1, 0.0); (488422.2, 3625536.4, 122.7, 122.7, 0.0);
(488442.2, 3625536.4, 122.3, 122.3, 0.0); (488462.2, 3625536.4, 122.2, 122.2, 0.0);
(488482.2, 3625536.4, 122.2, 122.2, 0.0); (488502.2, 3625536.4, 122.5, 122.5, 0.0);
(488522.2, 3625536.4, 122.7, 122.7, 0.0); (488542.2, 3625536.4, 122.7, 122.7, 0.0);
(488222.2, 3625556.4, 121.7, 121.7, 0.0); (488242.2, 3625556.4, 122.7, 122.7, 0.0);
(488262.2, 3625556.4, 123.2, 123.2, 0.0); (488282.2, 3625556.4, 123.7, 123.7, 0.0);
(488302.2, 3625556.4, 123.6, 123.6, 0.0); (488322.2, 3625556.4, 123.4, 123.4, 0.0);
(488342.2, 3625556.4, 123.3, 123.3, 0.0); (488362.2, 3625556.4, 123.1, 123.1, 0.0);
(488382.2, 3625556.4, 122.6, 122.6, 0.0); (488402.2, 3625556.4, 122.3, 122.3, 0.0);
(488422.2, 3625556.4, 122.0, 122.0, 0.0); (488442.2, 3625556.4, 121.9, 121.9, 0.0);
(488462.2, 3625556.4, 122.0, 122.0, 0.0); (488482.2, 3625556.4, 122.0, 122.0, 0.0);
(488502.2, 3625556.4, 122.1, 122.1, 0.0); (488522.2, 3625556.4, 122.2, 122.2, 0.0);

```
  (    488542.2, 3625556.4,     122.2,     122.2,       0.0);       (    488562.2,
3625556.4,     122.4,     122.4,       0.0);
  (    488202.2, 3625576.4,     121.6,     121.6,       0.0);       (    488222.2,
3625576.4,     122.5,     122.5,       0.0);
  (    488242.2, 3625576.4,     123.0,     123.0,       0.0);       (    488262.2,
3625576.4,     123.4,     123.4,       0.0);
  (    488282.2, 3625576.4,     123.7,     123.7,       0.0);       (    488302.2,
3625576.4,     123.5,     123.5,       0.0);
  (    488322.2, 3625576.4,     123.2,     123.2,       0.0);       (    488342.2,
3625576.4,     123.0,     123.0,       0.0);
  (    488362.2, 3625576.4,     122.6,     122.6,       0.0);       (    488382.2,
3625576.4,     122.0,     122.0,       0.0);
  (    488402.2, 3625576.4,     121.8,     121.8,       0.0);       (    488422.2,
3625576.4,     121.7,     121.7,       0.0);
  (    488442.2, 3625576.4,     121.6,     121.6,       0.0);       (    488462.2,
3625576.4,     121.6,     121.6,       0.0);
  (    488482.2, 3625576.4,     121.6,     121.6,       0.0);       (    488502.2,
3625576.4,     121.7,     121.7,       0.0);
  (    488522.2, 3625576.4,     121.9,     121.9,       0.0);       (    488542.2,
3625576.4,     122.1,     122.1,       0.0);
  (    488562.2, 3625576.4,     122.2,     122.2,       0.0);       (    488582.2,
3625576.4,     122.5,     122.5,       0.0);
  (    488122.2, 3625596.4,     122.6,     122.6,       0.0);       (    488142.2,
3625596.4,     122.6,     122.6,       0.0);
  (    488162.2, 3625596.4,     122.6,     122.6,       0.0);       (    488182.2,
3625596.4,     122.8,     122.8,       0.0);
  (    488202.2, 3625596.4,     122.9,     122.9,       0.0);       (    488222.2,
3625596.4,     123.0,     123.0,       0.0);
```


*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

```
  (    488242.2, 3625596.4,     123.4,     123.4,       0.0);       (    488262.2,
3625596.4,     123.6,     123.6,       0.0);
  (    488282.2, 3625596.4,     123.6,     123.6,       0.0);       (    488302.2,
3625596.4,     123.6,     123.6,       0.0);
  (    488322.2, 3625596.4,     123.1,     123.1,       0.0);       (    488342.2,
3625596.4,     122.5,     122.5,       0.0);
  (    488362.2, 3625596.4,     121.8,     121.8,       0.0);       (    488382.2,
3625596.4,     121.5,     121.5,       0.0);
  (    488402.2, 3625596.4,     121.6,     121.6,       0.0);       (    488422.2,
3625596.4,     121.6,     121.6,       0.0);
```

(488522.2, 3625596.4, 121.9, 121.9, 0.0); (488542.2, 3625596.4, 122.2, 122.2, 0.0);
(488562.2, 3625596.4, 122.1, 122.1, 0.0); (488582.2, 3625596.4, 122.2, 122.2, 0.0);
(488602.2, 3625596.4, 122.6, 122.6, 0.0); (488062.2, 3625616.4, 122.6, 122.6, 0.0);
(488082.2, 3625616.4, 122.8, 122.8, 0.0); (488102.2, 3625616.4, 122.8, 122.8, 0.0);
(488122.2, 3625616.4, 122.7, 122.7, 0.0); (488142.2, 3625616.4, 122.7, 122.7, 0.0);
(488162.2, 3625616.4, 122.9, 122.9, 0.0); (488182.2, 3625616.4, 123.1, 123.1, 0.0);
(488202.2, 3625616.4, 123.4, 123.4, 0.0); (488222.2, 3625616.4, 123.5, 123.5, 0.0);
(488242.2, 3625616.4, 123.6, 123.6, 0.0); (488262.2, 3625616.4, 123.6, 123.6, 0.0);
(488282.2, 3625616.4, 123.4, 123.4, 0.0); (488302.2, 3625616.4, 123.2, 123.2, 0.0);
(488322.2, 3625616.4, 122.9, 122.9, 0.0); (488342.2, 3625616.4, 122.3, 122.3, 0.0);
(488362.2, 3625616.4, 121.6, 121.6, 0.0); (488382.2, 3625616.4, 121.3, 121.3, 0.0);
(488402.2, 3625616.4, 118.5, 121.7, 0.0); (488522.2, 3625616.4, 121.9, 121.9, 0.0);
(488542.2, 3625616.4, 122.1, 122.1, 0.0); (488562.2, 3625616.4, 122.3, 122.3, 0.0);
(488582.2, 3625616.4, 122.3, 122.3, 0.0); (488602.2, 3625616.4, 122.6, 122.6, 0.0);
(488062.2, 3625636.4, 122.2, 122.2, 0.0); (488082.2, 3625636.4, 122.9, 122.9, 0.0);
(488102.2, 3625636.4, 122.9, 122.9, 0.0); (488122.2, 3625636.4, 122.9, 122.9, 0.0);
(488142.2, 3625636.4, 123.0, 123.0, 0.0); (488162.2, 3625636.4, 123.1, 123.1, 0.0);
(488182.2, 3625636.4, 123.4, 123.4, 0.0); (488202.2, 3625636.4, 123.6, 123.6, 0.0);
(488222.2, 3625636.4, 123.6, 123.6, 0.0); (488242.2, 3625636.4, 123.6, 123.6, 0.0);
(488262.2, 3625636.4, 123.4, 123.4, 0.0); (488282.2, 3625636.4, 123.3, 123.3, 0.0);
(488302.2, 3625636.4, 123.0, 123.0, 0.0); (488322.2, 3625636.4, 122.6, 122.6, 0.0);
(488342.2, 3625636.4, 122.0, 122.0, 0.0); (488362.2, 3625636.4, 121.4, 121.4, 0.0);
(488382.2, 3625636.4, 121.1, 121.1, 0.0); (488522.2, 3625636.4, 121.9, 121.9, 0.0);
(488542.2, 3625636.4, 122.1, 122.1, 0.0); (488562.2, 3625636.4, 122.4, 122.4, 0.0);
(488582.2, 3625636.4, 122.4, 122.4, 0.0); (488602.2, 3625636.4, 122.5, 122.5, 0.0);

(488622.2, 3625636.4, 122.8, 122.8, 0.0); (488062.2, 3625656.4, 121.0, 122.9, 0.0);
(488082.2, 3625656.4, 123.0, 123.0, 0.0); (488102.2, 3625656.4, 123.2, 123.2, 0.0);
(488122.2, 3625656.4, 123.2, 123.2, 0.0); (488142.2, 3625656.4, 123.3, 123.3, 0.0);
(488162.2, 3625656.4, 123.3, 123.3, 0.0); (488182.2, 3625656.4, 123.4, 123.4, 0.0);
(488202.2, 3625656.4, 123.4, 123.4, 0.0); (488222.2, 3625656.4, 123.5, 123.5, 0.0);
(488242.2, 3625656.4, 123.3, 123.3, 0.0); (488262.2, 3625656.4, 123.2, 123.2, 0.0);
(488282.2, 3625656.4, 123.2, 123.2, 0.0); (488302.2, 3625656.4, 122.9, 122.9, 0.0);
(488322.2, 3625656.4, 122.3, 122.3, 0.0); (488342.2, 3625656.4, 121.7, 121.7, 0.0);
(488362.2, 3625656.4, 121.2, 121.2, 0.0); (488382.2, 3625656.4, 121.0, 121.0, 0.0);
(488522.2, 3625656.4, 121.9, 121.9, 0.0); (488542.2, 3625656.4, 122.2, 122.2, 0.0);
(488582.2, 3625656.4, 122.5, 122.5, 0.0); (488602.2, 3625656.4, 122.5, 122.5, 0.0);
(488622.2, 3625656.4, 122.8, 122.8, 0.0); (488642.2, 3625656.4, 123.0, 123.0, 0.0);
(488062.2, 3625676.4, 122.1, 122.1, 0.0); (488082.2, 3625676.4, 123.0, 123.0, 0.0);
(488102.2, 3625676.4, 123.0, 123.0, 0.0); (488122.2, 3625676.4, 123.0, 123.0, 0.0);
(488142.2, 3625676.4, 123.1, 123.1, 0.0); (488162.2, 3625676.4, 123.1, 123.1, 0.0);

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(488182.2, 3625676.4, 123.2, 123.2, 0.0); (488202.2, 3625676.4, 123.4, 123.4, 0.0);
(488222.2, 3625676.4, 123.5, 123.5, 0.0); (488242.2, 3625676.4, 123.5, 123.5, 0.0);
(488262.2, 3625676.4, 123.3, 123.3, 0.0); (488282.2, 3625676.4, 123.2, 123.2, 0.0);
(488302.2, 3625676.4, 122.9, 122.9, 0.0); (488322.2, 3625676.4, 122.2, 122.2, 0.0);

(488342.2, 3625676.4, 121.5, 121.5, 0.0); (488362.2, 3625676.4, 121.3, 121.3, 0.0);
(488382.2, 3625676.4, 121.6, 121.6, 0.0); (488582.2, 3625676.4, 122.5, 122.5, 0.0);
(488602.2, 3625676.4, 122.5, 122.5, 0.0); (488622.2, 3625676.4, 122.5, 122.5, 0.0);
(488642.2, 3625676.4, 122.7, 122.7, 0.0); (488062.2, 3625696.4, 122.7, 122.7, 0.0);
(488082.2, 3625696.4, 122.6, 122.6, 0.0); (488102.2, 3625696.4, 122.4, 122.4, 0.0);
(488122.2, 3625696.4, 122.5, 122.5, 0.0); (488142.2, 3625696.4, 122.8, 122.8, 0.0);
(488162.2, 3625696.4, 123.0, 123.0, 0.0); (488182.2, 3625696.4, 123.0, 123.0, 0.0);
(488202.2, 3625696.4, 123.3, 123.3, 0.0); (488222.2, 3625696.4, 123.3, 123.3, 0.0);
(488242.2, 3625696.4, 123.4, 123.4, 0.0); (488262.2, 3625696.4, 123.3, 123.3, 0.0);
(488282.2, 3625696.4, 122.9, 122.9, 0.0); (488302.2, 3625696.4, 122.7, 122.7, 0.0);
(488322.2, 3625696.4, 122.1, 122.1, 0.0); (488342.2, 3625696.4, 121.6, 121.6, 0.0);
(488362.2, 3625696.4, 121.4, 121.4, 0.0); (488382.2, 3625696.4, 121.7, 121.7, 0.0);
(488582.2, 3625696.4, 122.3, 122.3, 0.0); (488602.2, 3625696.4, 122.6, 122.6, 0.0);
(488622.2, 3625696.4, 122.4, 122.4, 0.0); (488642.2, 3625696.4, 122.6, 122.6, 0.0);
(488662.2, 3625696.4, 122.7, 122.7, 0.0); (488042.2, 3625716.4, 121.5, 122.0, 0.0);
(488142.2, 3625716.4, 122.5, 122.5, 0.0); (488162.2, 3625716.4, 122.9, 122.9, 0.0);
(488182.2, 3625716.4, 123.0, 123.0, 0.0); (488202.2, 3625716.4, 123.0, 123.0, 0.0);
(488222.2, 3625716.4, 122.9, 122.9, 0.0); (488242.2, 3625716.4, 123.0, 123.0, 0.0);
(488262.2, 3625716.4, 122.8, 122.8, 0.0); (488282.2, 3625716.4, 122.4, 122.4, 0.0);
(488302.2, 3625716.4, 122.3, 122.3, 0.0); (488322.2, 3625716.4, 122.0, 122.0, 0.0);
(488342.2, 3625716.4, 121.9, 121.9, 0.0); (488362.2, 3625716.4, 121.7, 121.7, 0.0);
(488382.2, 3625716.4, 121.0, 121.0, 0.0); (488602.2, 3625716.4, 122.8, 122.8, 0.0);
(488622.2, 3625716.4, 122.6, 122.6, 0.0); (488642.2, 3625716.4, 123.2, 123.2, 0.0);
(488662.2, 3625716.4, 123.1, 123.1, 0.0); (488682.2, 3625716.4, 123.1, 123.1, 0.0);
(488022.2, 3625736.4, 119.8, 121.2, 0.0); (488042.2, 3625736.4, 118.3, 122.0, 0.0);

```
  (    488182.2, 3625736.4,     123.0,     123.0,       0.0);       (    488202.2,
3625736.4,     123.1,     123.1,       0.0);
  (    488222.2, 3625736.4,     123.0,     123.0,       0.0);       (    488242.2,
3625736.4,     123.1,     123.1,       0.0);
  (    488262.2, 3625736.4,     123.0,     123.0,       0.0);       (    488282.2,
3625736.4,     122.7,     122.7,       0.0);
  (    488302.2, 3625736.4,     122.5,     122.5,       0.0);       (    488322.2,
3625736.4,     122.0,     122.0,       0.0);
  (    488362.2, 3625736.4,     118.9,     121.9,       0.0);       (    488382.2,
3625736.4,     120.7,     120.7,       0.0);
  (    488402.2, 3625736.4,     120.9,     120.9,       0.0);       (    488602.2,
3625736.4,     122.8,     122.8,       0.0);
  (    488622.2, 3625736.4,     122.7,     122.7,       0.0);       (    488642.2,
3625736.4,     123.2,     123.2,       0.0);
  (    488662.2, 3625736.4,     123.3,     123.3,       0.0);       (    488682.2,
3625736.4,     123.2,     123.2,       0.0);
  (    488702.2, 3625736.4,     123.3,     123.3,       0.0);       (    488002.2,
3625756.4,     120.3,     120.3,       0.0);
  (    488022.2, 3625756.4,     119.9,     121.2,       0.0);       (    488182.2,
3625756.4,     123.1,     123.1,       0.0);
  (    488202.2, 3625756.4,     123.3,     123.3,       0.0);       (    488222.2,
3625756.4,     123.1,     123.1,       0.0);
  (    488242.2, 3625756.4,     123.1,     123.1,       0.0);       (    488262.2,
3625756.4,     123.1,     123.1,       0.0);
  (    488282.2, 3625756.4,     122.8,     122.8,       0.0);       (    488382.2,
3625756.4,     119.8,     120.8,       0.0);
  (    488602.2, 3625756.4,     122.8,     122.8,       0.0);       (    488622.2,
3625756.4,     122.8,     122.8,       0.0);
  (    488642.2, 3625756.4,     123.1,     123.1,       0.0);       (    488662.2,
3625756.4,     123.4,     123.4,       0.0);
  (    488682.2, 3625756.4,     123.3,     123.3,       0.0);       (    488702.2,
3625756.4,     123.3,     123.3,       0.0);
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                                            ***  DISCRETE CARTESIAN RECEPTORS ***
                                           (X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
                                                           (METERS)

  (    487982.2, 3625776.4,     117.8,     119.9,       0.0);       (    488002.2,
3625776.4,     119.4,     119.4,       0.0);
  (    488222.2, 3625776.4,     122.7,     122.7,       0.0);       (    488242.2,
3625776.4,     122.8,     122.8,       0.0);
  (    488262.2, 3625776.4,     122.8,     122.8,       0.0);       (    488622.2,
3625776.4,     122.9,     122.9,       0.0);
```

(488642.2, 3625776.4, 122.9, 122.9, 0.0); (488662.2, 3625776.4, 123.3, 123.3, 0.0);
(488682.2, 3625776.4, 123.4, 123.4, 0.0); (488702.2, 3625776.4, 123.4, 123.4, 0.0);
(488722.2, 3625776.4, 123.6, 123.6, 0.0); (487982.2, 3625796.4, 117.1, 119.9, 0.0);
(488222.2, 3625796.4, 122.3, 122.3, 0.0); (488242.2, 3625796.4, 122.5, 122.5, 0.0);
(488262.2, 3625796.4, 122.4, 122.4, 0.0); (488622.2, 3625796.4, 119.7, 122.9, 0.0);
(488642.2, 3625796.4, 122.5, 122.5, 0.0); (488662.2, 3625796.4, 123.1, 123.1, 0.0);
(488682.2, 3625796.4, 123.4, 123.4, 0.0); (488702.2, 3625796.4, 123.5, 123.5, 0.0);
(488722.2, 3625796.4, 123.5, 123.5, 0.0); (488742.2, 3625796.4, 123.5, 123.5, 0.0);
(488222.2, 3625816.4, 121.9, 121.9, 0.0); (488242.2, 3625816.4, 122.1, 122.1, 0.0);
(488262.2, 3625816.4, 121.6, 121.6, 0.0); (488642.2, 3625816.4, 122.3, 122.3, 0.0);
(488662.2, 3625816.4, 123.0, 123.0, 0.0); (488682.2, 3625816.4, 123.3, 123.3, 0.0);
(488702.2, 3625816.4, 123.5, 123.5, 0.0); (488722.2, 3625816.4, 123.4, 123.4, 0.0);
(488742.2, 3625816.4, 123.4, 123.4, 0.0); (488762.2, 3625816.4, 123.4, 123.4, 0.0);
(488202.2, 3625836.4, 119.2, 122.4, 0.0); (488222.2, 3625836.4, 121.1, 121.1, 0.0);
(488242.2, 3625836.4, 121.5, 121.5, 0.0); (488662.2, 3625836.4, 123.0, 123.0, 0.0);
(488682.2, 3625836.4, 123.1, 123.1, 0.0); (488702.2, 3625836.4, 123.3, 123.3, 0.0);
(488722.2, 3625836.4, 123.4, 123.4, 0.0); (488742.2, 3625836.4, 123.3, 123.3, 0.0);
(488762.2, 3625836.4, 123.3, 123.3, 0.0); (488782.2, 3625836.4, 123.2, 123.2, 0.0);
(488202.2, 3625856.4, 118.3, 121.6, 0.0); (488222.2, 3625856.4, 120.9, 120.9, 0.0);
(488242.2, 3625856.4, 117.8, 122.5, 0.0); (488682.2, 3625856.4, 123.2, 123.2, 0.0);
(488702.2, 3625856.4, 123.1, 123.1, 0.0); (488722.2, 3625856.4, 123.2, 123.2, 0.0);
(488742.2, 3625856.4, 123.2, 123.2, 0.0); (488762.2, 3625856.4, 123.2, 123.2, 0.0);
(488782.2, 3625856.4, 123.2, 123.2, 0.0); (488802.2, 3625856.4, 123.0, 123.0, 0.0);
(488822.2, 3625856.4, 122.8, 122.8, 0.0); (488202.2, 3625876.4, 118.7, 122.2, 0.0);
(488222.2, 3625876.4, 121.0, 121.0, 0.0); (488662.2, 3625876.4, 123.5, 123.5, 0.0);

```
  (    488682.2, 3625876.4,     123.3,     123.3,       0.0);       (    488702.2,
3625876.4,     123.0,     123.0,       0.0);
  (    488722.2, 3625876.4,     123.0,     123.0,       0.0);       (    488742.2,
3625876.4,     123.1,     123.1,       0.0);
  (    488762.2, 3625876.4,     123.1,     123.1,       0.0);       (    488782.2,
3625876.4,     123.1,     123.1,       0.0);
  (    488802.2, 3625876.4,     122.9,     122.9,       0.0);       (    488822.2,
3625876.4,     122.8,     122.8,       0.0);
  (    488842.2, 3625876.4,     123.0,     123.0,       0.0);       (    488202.2,
3625896.4,     121.2,     122.2,       0.0);
  (    488222.2, 3625896.4,     121.6,     121.6,       0.0);       (    488642.2,
3625896.4,     123.4,     123.4,       0.0);
  (    488662.2, 3625896.4,     123.1,     123.1,       0.0);       (    488682.2,
3625896.4,     123.0,     123.0,       0.0);
  (    488702.2, 3625896.4,     123.1,     123.1,       0.0);       (    488722.2,
3625896.4,     122.8,     122.8,       0.0);
  (    488742.2, 3625896.4,     122.9,     122.9,       0.0);       (    488762.2,
3625896.4,     122.9,     122.9,       0.0);
  (    488782.2, 3625896.4,     122.9,     122.9,       0.0);       (    488802.2,
3625896.4,     122.8,     122.8,       0.0);
  (    488822.2, 3625896.4,     122.8,     122.8,       0.0);       (    488842.2,
3625896.4,     122.9,     122.9,       0.0);
  (    488862.2, 3625896.4,     123.1,     123.1,       0.0);       (    488882.2,
3625896.4,     123.2,     123.2,       0.0);
  (    488902.2, 3625896.4,     123.3,     123.3,       0.0);       (    488202.2,
3625916.4,     122.0,     122.0,       0.0);
  (    488222.2, 3625916.4,     121.9,     121.9,       0.0);       (    488642.2,
3625916.4,     123.0,     123.0,       0.0);
  (    488662.2, 3625916.4,     122.9,     122.9,       0.0);       (    488682.2,
3625916.4,     122.9,     122.9,       0.0);
  (    488702.2, 3625916.4,     122.9,     122.9,       0.0);       (    488762.2,
3625916.4,     122.0,     122.0,       0.0);
  (    488782.2, 3625916.4,     122.8,     122.8,       0.0);       (    488802.2,
3625916.4,     122.8,     122.8,       0.0);
```


*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

```
  (    488822.2, 3625916.4,     122.7,     122.7,       0.0);       (    488842.2,
3625916.4,     122.8,     122.8,       0.0);
  (    488862.2, 3625916.4,     123.0,     123.0,       0.0);       (    488882.2,
3625916.4,     123.0,     123.0,       0.0);
```

(488902.2, 3625916.4, 123.0, 123.0, 0.0); (488922.2,
3625916.4, 123.0, 123.0, 0.0);
(488942.2, 3625916.4, 123.1, 123.1, 0.0); (488222.2,
3625936.4, 121.7, 121.7, 0.0);
(488622.2, 3625936.4, 122.5, 122.5, 0.0); (488642.2,
3625936.4, 122.3, 122.3, 0.0);
(488662.2, 3625936.4, 122.6, 122.6, 0.0); (488682.2,
3625936.4, 122.6, 122.6, 0.0);
(488782.2, 3625936.4, 122.7, 122.7, 0.0); (488802.2,
3625936.4, 122.7, 122.7, 0.0);
(488822.2, 3625936.4, 122.7, 122.7, 0.0); (488842.2,
3625936.4, 122.7, 122.7, 0.0);
(488862.2, 3625936.4, 122.7, 122.7, 0.0); (488882.2,
3625936.4, 122.8, 122.8, 0.0);
(488902.2, 3625936.4, 122.8, 122.8, 0.0); (488922.2,
3625936.4, 122.9, 122.9, 0.0);
(488942.2, 3625936.4, 123.1, 123.1, 0.0); (488962.2,
3625936.4, 123.3, 123.3, 0.0);
(488982.2, 3625936.4, 123.6, 123.6, 0.0); (489002.2,
3625936.4, 123.4, 123.4, 0.0);
(488602.2, 3625956.4, 121.8, 121.8, 0.0); (488622.2,
3625956.4, 122.0, 122.0, 0.0);
(488642.2, 3625956.4, 122.0, 122.0, 0.0); (488662.2,
3625956.4, 122.1, 122.1, 0.0);
(488782.2, 3625956.4, 122.4, 122.4, 0.0); (488802.2,
3625956.4, 122.6, 122.6, 0.0);
(488822.2, 3625956.4, 122.6, 122.6, 0.0); (488842.2,
3625956.4, 122.6, 122.6, 0.0);
(488862.2, 3625956.4, 122.6, 122.6, 0.0); (488882.2,
3625956.4, 122.6, 122.6, 0.0);
(488902.2, 3625956.4, 122.6, 122.6, 0.0); (488922.2,
3625956.4, 122.8, 122.8, 0.0);
(488942.2, 3625956.4, 122.9, 122.9, 0.0); (488962.2,
3625956.4, 123.0, 123.0, 0.0);
(488982.2, 3625956.4, 123.2, 123.2, 0.0); (489002.2,
3625956.4, 123.2, 123.2, 0.0);
(489022.2, 3625956.4, 123.2, 123.2, 0.0); (489042.2,
3625956.4, 123.2, 123.2, 0.0);
(489062.2, 3625956.4, 123.1, 123.1, 0.0); (489082.2,
3625956.4, 123.2, 123.2, 0.0);
(488622.2, 3625976.4, 119.8, 121.7, 0.0); (488802.2,
3625976.4, 122.5, 122.5, 0.0);
(488822.2, 3625976.4, 122.5, 122.5, 0.0); (488842.2,
3625976.4, 122.3, 122.3, 0.0);
(488862.2, 3625976.4, 122.1, 122.1, 0.0); (488882.2,
3625976.4, 122.1, 122.1, 0.0);
(488902.2, 3625976.4, 122.1, 122.1, 0.0); (488922.2,
3625976.4, 122.4, 122.4, 0.0);
(488942.2, 3625976.4, 122.7, 122.7, 0.0); (488962.2,
3625976.4, 122.9, 122.9, 0.0);

```
  (    488982.2, 3625976.4,     123.0,     123.0,       0.0);       (    489002.2,
3625976.4,     123.0,     123.0,       0.0);
  (    489022.2, 3625976.4,     123.1,     123.1,       0.0);       (    489042.2,
3625976.4,     123.1,     123.1,       0.0);
  (    489062.2, 3625976.4,     123.1,     123.1,       0.0);       (    489082.2,
3625976.4,     123.2,     123.2,       0.0);
  (    489102.2, 3625976.4,     123.2,     123.2,       0.0);       (    489122.2,
3625976.4,     123.2,     123.2,       0.0);
  (    488802.2, 3625996.4,     122.6,     122.6,       0.0);       (    488822.2,
3625996.4,     122.4,     122.4,       0.0);
  (    488842.2, 3625996.4,     121.7,     121.7,       0.0);       (    488922.2,
3625996.4,     121.8,     121.8,       0.0);
  (    488942.2, 3625996.4,     122.4,     122.4,       0.0);       (    488962.2,
3625996.4,     122.8,     122.8,       0.0);
  (    488982.2, 3625996.4,     123.0,     123.0,       0.0);       (    489002.2,
3625996.4,     123.0,     123.0,       0.0);
  (    489022.2, 3625996.4,     122.9,     122.9,       0.0);       (    489042.2,
3625996.4,     122.9,     122.9,       0.0);
  (    489062.2, 3625996.4,     123.1,     123.1,       0.0);       (    489082.2,
3625996.4,     123.1,     123.1,       0.0);
  (    489102.2, 3625996.4,     123.1,     123.1,       0.0);       (    489122.2,
3625996.4,     123.1,     123.1,       0.0);
  (    489142.2, 3625996.4,     122.9,     122.9,       0.0);       (    488802.2,
3626016.4,     122.5,     122.5,       0.0);
  (    488822.2, 3626016.4,     122.4,     122.4,       0.0);       (    488842.2,
3626016.4,     121.5,     121.5,       0.0);
  (    488982.2, 3626016.4,     122.4,     122.4,       0.0);       (    489002.2,
3626016.4,     122.4,     122.4,       0.0);
  (    489022.2, 3626016.4,     122.5,     122.5,       0.0);       (    489042.2,
3626016.4,     122.6,     122.6,       0.0);
  (    489062.2, 3626016.4,     122.8,     122.8,       0.0);       (    489082.2,
3626016.4,     122.8,     122.8,       0.0);
  (    489102.2, 3626016.4,     122.9,     122.9,       0.0);       (    489122.2,
3626016.4,     122.8,     122.8,       0.0);
  (    489142.2, 3626016.4,     122.6,     122.6,       0.0);       (    488782.2,
3626036.4,     122.3,     122.3,       0.0);
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*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

```
  (    488802.2, 3626036.4,     122.5,     122.5,       0.0);       (    488822.2,
3626036.4,     122.4,     122.4,       0.0);
```

(488842.2, 3626036.4, 121.3, 121.3, 0.0); (489042.2, 3626036.4, 122.4, 122.4, 0.0);
(489062.2, 3626036.4, 122.7, 122.7, 0.0); (489082.2, 3626036.4, 122.6, 122.6, 0.0);
(489102.2, 3626036.4, 122.7, 122.7, 0.0); (489122.2, 3626036.4, 122.7, 122.7, 0.0);
(489142.2, 3626036.4, 122.5, 122.5, 0.0); (488782.2, 3626056.4, 122.1, 122.1, 0.0);
(488802.2, 3626056.4, 122.5, 122.5, 0.0); (488822.2, 3626056.4, 122.4, 122.4, 0.0);
(488842.2, 3626056.4, 121.3, 121.3, 0.0); (489042.2, 3626056.4, 122.3, 122.3, 0.0);
(489062.2, 3626056.4, 122.8, 122.8, 0.0); (489082.2, 3626056.4, 122.7, 122.7, 0.0);
(489102.2, 3626056.4, 122.6, 122.6, 0.0); (489122.2, 3626056.4, 122.6, 122.6, 0.0);
(489142.2, 3626056.4, 122.6, 122.6, 0.0); (489162.2, 3626056.4, 122.3, 122.3, 0.0);
(488782.2, 3626076.4, 120.1, 122.5, 0.0); (488802.2, 3626076.4, 122.5, 122.5, 0.0);
(488822.2, 3626076.4, 122.4, 122.4, 0.0); (488842.2, 3626076.4, 121.7, 121.7, 0.0);
(488862.2, 3626076.4, 120.4, 120.4, 0.0); (489062.2, 3626076.4, 122.7, 122.7, 0.0);
(489082.2, 3626076.4, 122.7, 122.7, 0.0); (489102.2, 3626076.4, 122.4, 122.4, 0.0);
(489122.2, 3626076.4, 122.4, 122.4, 0.0); (489142.2, 3626076.4, 122.5, 122.5, 0.0);
(489162.2, 3626076.4, 122.0, 122.0, 0.0); (488782.2, 3626096.4, 119.7, 122.6, 0.0);
(488802.2, 3626096.4, 122.5, 122.5, 0.0); (488822.2, 3626096.4, 122.4, 122.4, 0.0);
(488842.2, 3626096.4, 122.1, 122.1, 0.0); (488862.2, 3626096.4, 121.6, 121.6, 0.0);
(489062.2, 3626096.4, 122.5, 122.5, 0.0); (489082.2, 3626096.4, 122.7, 122.7, 0.0);
(489102.2, 3626096.4, 122.4, 122.4, 0.0); (489122.2, 3626096.4, 122.3, 122.3, 0.0);
(489142.2, 3626096.4, 122.2, 122.2, 0.0); (489162.2, 3626096.4, 121.9, 121.9, 0.0);
(488782.2, 3626116.4, 121.9, 121.9, 0.0); (488802.2, 3626116.4, 122.6, 122.6, 0.0);
(488822.2, 3626116.4, 122.4, 122.4, 0.0); (488842.2, 3626116.4, 122.3, 122.3, 0.0);
(488862.2, 3626116.4, 121.9, 121.9, 0.0); (489062.2, 3626116.4, 122.3, 122.3, 0.0);
(489082.2, 3626116.4, 122.6, 122.6, 0.0); (489102.2, 3626116.4, 122.7, 122.7, 0.0);
(489122.2, 3626116.4, 122.4, 122.4, 0.0); (489142.2, 3626116.4, 122.0, 122.0, 0.0);

(489162.2, 3626116.4, 122.0, 122.0, 0.0); (489182.2, 3626116.4, 121.4, 121.4, 0.0);
(488782.2, 3626136.4, 122.8, 122.8, 0.0); (488802.2, 3626136.4, 122.9, 122.9, 0.0);
(488822.2, 3626136.4, 122.4, 122.4, 0.0); (488842.2, 3626136.4, 122.4, 122.4, 0.0);
(488862.2, 3626136.4, 122.3, 122.3, 0.0); (489082.2, 3626136.4, 122.1, 122.1, 0.0);
(489102.2, 3626136.4, 122.5, 122.5, 0.0); (489122.2, 3626136.4, 122.3, 122.3, 0.0);
(489142.2, 3626136.4, 121.7, 121.7, 0.0); (489162.2, 3626136.4, 121.9, 121.9, 0.0);
(489182.2, 3626136.4, 121.3, 121.3, 0.0); (488782.2, 3626156.4, 123.3, 123.3, 0.0);
(488802.2, 3626156.4, 123.2, 123.2, 0.0); (488822.2, 3626156.4, 122.4, 122.4, 0.0);
(488842.2, 3626156.4, 122.5, 122.5, 0.0); (488862.2, 3626156.4, 122.6, 122.6, 0.0);
(488882.2, 3626156.4, 122.4, 122.4, 0.0); (489102.2, 3626156.4, 121.9, 121.9, 0.0);
(489122.2, 3626156.4, 122.1, 122.1, 0.0); (489142.2, 3626156.4, 121.6, 121.6, 0.0);
(489162.2, 3626156.4, 121.7, 121.7, 0.0); (489182.2, 3626156.4, 121.2, 121.2, 0.0);
(488782.2, 3626176.4, 123.3, 123.3, 0.0); (488802.2, 3626176.4, 123.3, 123.3, 0.0);
(488822.2, 3626176.4, 122.4, 122.4, 0.0); (488842.2, 3626176.4, 122.7, 122.7, 0.0);
(488862.2, 3626176.4, 122.9, 122.9, 0.0); (488882.2, 3626176.4, 122.4, 122.4, 0.0);
(489122.2, 3626176.4, 121.9, 121.9, 0.0); (489142.2, 3626176.4, 121.6, 121.6, 0.0);
(489162.2, 3626176.4, 121.3, 121.3, 0.0); (489182.2, 3626176.4, 121.0, 121.0, 0.0);
(488782.2, 3626196.4, 123.1, 123.1, 0.0); (488802.2, 3626196.4, 123.3, 123.3, 0.0);
(488822.2, 3626196.4, 122.4, 122.4, 0.0); (488842.2, 3626196.4, 122.9, 122.9, 0.0);

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

```
   (    488862.2, 3626196.4,     123.1,     123.1,        0.0);        (    488882.2,
3626196.4,     122.8,     122.8,        0.0);
  (    488902.2, 3626196.4,     122.4,     122.4,        0.0);        (    489142.2,
3626196.4,     121.3,     121.3,        0.0);
  (    489162.2, 3626196.4,     121.1,     121.1,        0.0);        (    489182.2,
3626196.4,     120.9,     120.9,        0.0);
  (    489202.2, 3626196.4,     120.6,     120.6,        0.0);        (    488782.2,
3626216.4,     122.8,     122.8,        0.0);
  (    488802.2, 3626216.4,     123.0,     123.0,        0.0);        (    488822.2,
3626216.4,     122.3,     122.3,        0.0);
  (    488842.2, 3626216.4,     122.8,     122.8,        0.0);        (    488862.2,
3626216.4,     123.2,     123.2,        0.0);
  (    488882.2, 3626216.4,     122.9,     122.9,        0.0);        (    488902.2,
3626216.4,     122.6,     122.6,        0.0);
  (    489142.2, 3626216.4,     121.0,     121.0,        0.0);        (    489162.2,
3626216.4,     120.9,     120.9,        0.0);
  (    489182.2, 3626216.4,     120.6,     120.6,        0.0);        (    489202.2,
3626216.4,     120.4,     120.4,        0.0);
  (    489222.2, 3626216.4,     120.4,     120.4,        0.0);        (    489242.2,
3626216.4,     120.8,     120.8,        0.0);
  (    489262.2, 3626216.4,     120.7,     120.7,        0.0);        (    488782.2,
3626236.4,     122.2,     122.2,        0.0);
  (    488802.2, 3626236.4,     122.2,     122.2,        0.0);        (    488822.2,
3626236.4,     122.1,     122.1,        0.0);
  (    488842.2, 3626236.4,     122.3,     122.3,        0.0);        (    488862.2,
3626236.4,     122.4,     122.4,        0.0);
  (    488882.2, 3626236.4,     122.3,     122.3,        0.0);        (    488902.2,
3626236.4,     122.3,     122.3,        0.0);
  (    489142.2, 3626236.4,     120.6,     120.6,        0.0);        (    489162.2,
3626236.4,     120.5,     120.5,        0.0);
  (    489182.2, 3626236.4,     120.1,     120.1,        0.0);        (    489202.2,
3626236.4,     120.1,     120.1,        0.0);
  (    489222.2, 3626236.4,     120.4,     120.4,        0.0);        (    489242.2,
3626236.4,     120.9,     120.9,        0.0);
  (    489262.2, 3626236.4,     120.2,     120.2,        0.0);        (    488782.2,
3626256.4,     121.4,     121.4,        0.0);
  (    488802.2, 3626256.4,     120.2,     121.9,        0.0);        (    488822.2,
3626256.4,     120.5,     122.1,        0.0);
  (    488842.2, 3626256.4,     121.5,     121.5,        0.0);        (    488862.2,
3626256.4,     122.2,     122.2,        0.0);
  (    488882.2, 3626256.4,     122.3,     122.3,        0.0);        (    488902.2,
3626256.4,     122.0,     122.0,        0.0);
  (    488922.2, 3626256.4,     121.9,     121.9,        0.0);        (    489142.2,
3626256.4,     120.0,     120.0,        0.0);
  (    489162.2, 3626256.4,     117.0,     120.5,        0.0);        (    489222.2,
3626256.4,     120.2,     120.2,        0.0);
  (    489242.2, 3626256.4,     120.9,     120.9,        0.0);        (    489262.2,
3626256.4,     120.5,     120.5,        0.0);
  (    488882.2, 3626276.4,     122.4,     122.4,        0.0);        (    488902.2,
3626276.4,     121.8,     121.8,        0.0);
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  (    488922.2, 3626276.4,     120.5,     120.5,       0.0);       (    489142.2,
3626276.4,     118.5,     120.5,       0.0);
  (    489162.2, 3626276.4,     112.4,     121.0,       0.0);       (    489242.2,
3626276.4,     120.2,     120.9,       0.0);
  (    489262.2, 3626276.4,     120.7,     120.7,       0.0);       (    488882.2,
3626296.4,     122.0,     122.0,       0.0);
  (    488902.2, 3626296.4,     121.6,     121.6,       0.0);       (    489262.2,
3626296.4,     119.8,     119.8,       0.0);
  (    489282.2, 3626296.4,     119.8,     119.8,       0.0);       (    488902.2,
3626316.4,     121.2,     121.2,       0.0);
  (    489282.2, 3626316.4,     119.0,     119.0,       0.0);       (    489302.2,
3626316.4,     118.7,     118.7,       0.0);
  (    488902.2, 3626336.4,     120.8,     121.6,       0.0);       (    488922.2,
3626336.4,     119.7,     121.6,       0.0);
  (    489302.2, 3626336.4,     118.6,     118.6,       0.0);       (    489322.2,
3626336.4,     118.5,     118.9,       0.0);
  (    488922.2, 3626356.4,     120.1,     120.1,       0.0);       (    488942.2,
3626356.4,     118.2,     120.6,       0.0);
  (    489322.2, 3626356.4,     118.5,     118.5,       0.0);       (    488942.2,
3626376.4,     118.0,     120.6,       0.0);
  (    488962.2, 3626376.4,     118.1,     119.4,       0.0);       (    489322.2,
3626376.4,     119.2,     119.2,       0.0);
  (    489342.2, 3626376.4,     117.2,     120.5,       0.0);       (    488962.2,
3626396.4,     117.8,     118.3,       0.0);
  (    489322.2, 3626396.4,     120.4,     120.4,       0.0);       (    489342.2,
3626396.4,     120.1,     120.1,       0.0);
  (    489342.2, 3626416.4,     120.6,     120.6,       0.0);       (    489342.2,
3626436.4,     119.8,     119.8,       0.0);
  (    486721.8, 3628652.6,     123.6,     123.6,       0.0);       (    486669.5,
3628628.5,     123.7,     123.7,       0.0);
  (    486698.8, 3628698.6,     123.9,     123.9,       0.0);       (    486713.4,
3628699.7,     123.9,     123.9,       0.0);
  (    486757.4, 3628723.7,     123.8,     123.8,       0.0);       (    486803.4,
3628721.6,     123.5,     123.5,       0.0);
  (    486732.3, 3628704.9,     123.8,     123.8,       0.0);       (    486505.5,
3627649.4,     120.5,     120.5,       0.0);
  (    486498.7, 3627624.5,     119.4,     119.4,       0.0);       (    486467.7,
3627650.1,     120.8,     120.8,       0.0);
  (    486460.2, 3627619.2,     119.4,     119.4,       0.0);       (    488395.1,
3627250.2,      16.7,     121.6,       0.0);
```


*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)

(METERS)

(488707.7, 3626756.7, 19.2, 123.9, 0.0); (488748.3,
3626767.8, 19.1, 123.9, 0.0);
(488796.3, 3626745.7, 20.6, 124.0, 0.0); (488284.7,
3628205.5, 116.4, 116.4, 0.0);
(488310.0, 3628227.6, 116.5, 116.5, 0.0); (488291.3,
3628261.8, 116.4, 116.4, 0.0);
(488257.1, 3628245.2, 116.4, 116.4, 0.0); (488310.0,
3628201.1, 116.4, 116.4, 0.0);
(488301.2, 3628169.1, 115.6, 115.6, 0.0); (488343.1,
3628192.3, 115.4, 115.4, 0.0);
(487535.3, 3626865.6, 25.6, 115.8, 0.0); (487693.8,
3626992.8, 24.9, 115.8, 0.0);
(487795.0, 3626883.9, 23.1, 101.2, 0.0); (487871.5,
3626830.1, 22.5, 122.2, 0.0);
(487958.8, 3626811.7, 20.9, 122.8, 0.0); (488041.8,
3626794.5, 20.2, 123.5, 0.0);
(488094.6, 3626765.4, 19.6, 123.5, 0.0); (488046.1,
3626714.8, 19.3, 123.5, 0.0);
(488007.3, 3626665.2, 18.2, 123.6, 0.0); (487941.6,
3626599.5, 18.7, 123.7, 0.0);
(487911.4, 3626574.7, 18.9, 123.7, 0.0); (487815.5,
3626540.2, 18.7, 123.7, 0.0);
(487709.9, 3626504.6, 17.1, 123.7, 0.0); (487555.8,
3626440.0, 18.9, 123.6, 0.0);
(487490.1, 3626487.4, 20.5, 123.3, 0.0); (487428.7,
3626556.4, 22.0, 121.7, 0.0);
(487358.6, 3626713.7, 26.3, 114.0, 0.0); (487522.4,
3626827.9, 24.5, 115.4, 0.0);
(488235.5, 3625424.5, 122.1, 122.1, 0.0); (488562.1,
3625540.8, 122.7, 122.7, 0.0);
(488747.0, 3625794.4, 123.5, 123.5, 0.0); (488857.4,
3625879.4, 123.1, 123.1, 0.0);
(489054.3, 3625949.5, 123.1, 123.1, 0.0); (489134.8,
3625964.4, 123.2, 123.2, 0.0);
(489178.1, 3626085.2, 121.5, 121.5, 0.0); (489203.4,
3626198.6, 120.6, 120.6, 0.0);
(489260.1, 3626203.1, 120.7, 120.7, 0.0); (489276.5,
3626218.0, 120.0, 120.0, 0.0);
(489267.6, 3626265.7, 120.6, 120.6, 0.0); (489336.2,
3626346.3, 115.2, 120.5, 0.0);
(489361.5, 3626432.8, 117.2, 120.8, 0.0); (489331.7,
3626449.2, 117.5, 120.8, 0.0);
(489309.3, 3626361.2, 116.0, 120.5, 0.0); (489258.6,
3626298.5, 119.1, 120.6, 0.0);
(489190.0, 3626228.4, 120.2, 120.2, 0.0); (489149.7,
3626317.9, 107.9, 121.7, 0.0);
(489130.3, 3626250.8, 118.1, 120.5, 0.0); (489137.8,
3626216.5, 120.8, 120.8, 0.0);

(489054.3, 3626106.1, 122.1, 122.1, 0.0); (489036.4, 3626036.0, 122.3, 122.3, 0.0);
(488921.5, 3625997.2, 121.6, 121.6, 0.0); (488847.0, 3625983.8, 121.9, 121.9, 0.0);
(488872.3, 3626110.6, 121.5, 121.5, 0.0); (488902.1, 3626194.1, 122.4, 122.4, 0.0);
(488932.0, 3626270.2, 121.2, 121.2, 0.0); (488908.8, 3626298.8, 119.8, 121.4, 0.0);
(488936.8, 3626348.3, 117.9, 121.6, 0.0); (488971.4, 3626378.0, 116.7, 119.4, 0.0);
(488968.1, 3626409.7, 112.1, 120.6, 0.0); (488903.1, 3626355.2, 119.8, 119.8, 0.0);
(488864.9, 3626256.5, 122.3, 122.3, 0.0); (488763.3, 3626259.3, 119.9, 122.1, 0.0);
(488787.9, 3625962.9, 122.3, 122.3, 0.0); (488735.7, 3625906.3, 122.6, 122.6, 0.0);
(488620.8, 3625988.3, 118.1, 121.9, 0.0); (488588.0, 3625957.0, 120.0, 121.8, 0.0);
(488671.5, 3625861.5, 123.3, 123.3, 0.0); (488629.8, 3625813.8, 118.9, 123.2, 0.0);
(488588.0, 3625746.7, 122.8, 122.8, 0.0); (488571.6, 3625648.2, 122.5, 122.5, 0.0);
(488516.4, 3625666.1, 119.6, 122.1, 0.0); (488522.4, 3625581.1, 121.9, 121.9, 0.0);
(488431.4, 3625576.6, 121.6, 121.6, 0.0); (488447.8, 3625615.4, 118.9, 121.6, 0.0);
(488388.1, 3625616.9, 120.6, 120.6, 0.0); (488398.6, 3625706.4, 121.1, 121.1, 0.0);
(488406.0, 3625745.2, 120.5, 120.5, 0.0); (488392.6, 3625776.5, 118.8, 118.8, 0.0);
(488350.8, 3625722.8, 121.4, 121.4, 0.0); (488279.2, 3625769.0, 122.8, 122.8, 0.0);
(488282.2, 3625807.8, 120.5, 121.1, 0.0); (488246.4, 3625851.1, 118.5, 122.5, 0.0);
(488230.0, 3625946.5, 118.4, 122.2, 0.0); (488188.3, 3625924.2, 118.2, 122.2, 0.0);
(488213.6, 3625757.1, 123.2, 123.2, 0.0); (488170.4, 3625779.5, 120.8, 122.7, 0.0);
(488170.4, 3625733.2, 122.5, 122.5, 0.0); (488077.9, 3625697.4, 122.6, 122.6, 0.0);
(487973.5, 3625822.7, 115.5, 119.3, 0.0); (487955.6, 3625809.3, 115.2, 119.3, 0.0);

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(488058.5, 3625678.1, 122.0, 122.0, 0.0); (488057.0, 3625618.4, 122.5, 122.5, 0.0);
(488107.7, 3625596.0, 122.6, 122.6, 0.0); (488185.3, 3625576.6, 121.5, 121.5, 0.0);
(488228.5, 3625528.9, 122.0, 122.0, 0.0); (488233.0, 3625482.7, 121.7, 121.7, 0.0);

*** METEOROLOGICAL DAYS SELECTED FOR PROCESSING ***
(1=YES; 0=NO)

1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1

NOTE: METEOROLOGICAL DATA ACTUALLY PROCESSED WILL ALSO DEPEND ON WHAT IS INCLUDED IN THE DATA FILE.

*** UPPER BOUND OF FIRST THROUGH FIFTH WIND SPEED CATEGORIES ***
(METERS/SEC)

1.54, 3.09, 5.14, 8.23, 10.80,

```
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                                    *** UP TO THE FIRST 24 HOURS OF METEOROLOGICAL
DATA ***

   Surface file:   SDAPCD Kearny MetData\KVR_2019-2021_v22112.SFC
                 Met Version:  22112
   Profile file:   SDAPCD Kearny MetData\KVR_2019-2021_v22112.PFL

   Surface format: FREE

   Profile format: FREE

   Surface station no.:    93107                  Upper air station no.:     3190
                  Name: UNKNOWN                                 Name: UNKNOWN

                  Year:  2019                                  Year:   2019

 First 24 hours of scalar data
 YR MO DY JDY HR    H0     U*       W*  DT/DZ ZICNV ZIMCH  M-O LEN   Z0   BOWEN
ALBEDO  REF  WS   WD     HT  REF TA   HT
- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - -
 19 01 01   1 01 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0 0.08   1.21
1.00   1.34   41.    10.0  282.9   10.0
 19 01 01   1 02 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0 0.10   1.21
1.00   1.70   14.    10.0  281.6   10.0
 19 01 01   1 03 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0 0.15   1.21
1.00   1.21   355.   10.0  281.3   10.0
 19 01 01   1 04 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0 0.10   1.21
1.00   1.34   23.    10.0  281.5   10.0
 19 01 01   1 05 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0 0.10   1.21
1.00   2.28    9.    10.0  281.0   10.0
 19 01 01   1 06 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0 0.10   1.21
1.00   2.24   27.    10.0  279.5   10.0
 19 01 01   1 07 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0 0.08   1.21
1.00   2.82   31.    10.0  279.4   10.0
 19 01 01   1 08 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0 0.15   1.21
0.50   2.32   356.   10.0  279.8   10.0
 19 01 01   1 09 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0 0.08   1.21
0.30   2.24   40.    10.0  283.0   10.0
 19 01 01   1 10 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0 0.10   1.21
0.23   3.49   65.    10.0  285.2   10.0
 19 01 01   1 11 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0 0.08   1.21
0.21   4.51   59.    10.0  286.8   10.0
```

```
 19 01 01   1 12 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.20   7.24   52.    10.0  287.3   10.0
 19 01 01   1 13 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.20   7.60   51.    10.0  287.1   10.0
 19 01 01   1 14 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.21   6.79   54.    10.0  287.1   10.0
 19 01 01   1 15 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.24   7.06   52.    10.0  287.1   10.0
 19 01 01   1 16 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.33   5.72   55.    10.0  286.4   10.0
 19 01 01   1 17 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.61   2.64   53.    10.0  285.2   10.0
 19 01 01   1 18 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   5.50   50.    10.0  283.4   10.0
 19 01 01   1 19 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   4.38   59.    10.0  281.6   10.0
 19 01 01   1 20 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   4.29   62.    10.0  280.9   10.0
 19 01 01   1 21 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   4.34   60.    10.0  281.0   10.0
 19 01 01   1 22 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   2.64   72.    10.0  280.1   10.0
 19 01 01   1 23 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   3.49   58.    10.0  279.4   10.0
 19 01 01   1 24 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   2.73   77.    10.0  279.3   10.0


 First hour of profile data
 YR MO DY HR HEIGHT F  WDIR    WSPD  AMB_TMP sigmaA  sigmaW  sigmaV
 19 01 01 01   10.0 1   41.    1.34    283.0   18.0  -99.00   0.40

 F indicates top of profile (=1) or below (=0)
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                              *** THE PERIOD ( 26304 HRS) AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: ALL      ***
                                  INCLUDING SOURCE(S):     L0000001    , L0000002
, L0000003    , L0000004   ,   L0000005    ,
                 L0000006    , L0000007    , L0000008    , L0000009    , L0000010
, L0000011    , L0000012   ,   L0000013    ,
                 L0000014    , L0000015    , L0000016    , L0000017    , L0000018
, L0000019    , L0000020   ,   L0000021    ,
                 L0000022    , L0000023    , L0000024    , L0000025    , L0000026
```

, L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487526.96	3626464.52	3.58691	487546.96	3626464.52	3.69635
487566.96	3626464.52	3.86256	487586.96	3626464.52	4.07445
487606.96	3626464.52	4.28105	487506.96	3626484.52	3.52220
487526.96	3626484.52	3.64022	487546.96	3626484.52	3.68644
487566.96	3626484.52	3.83888	487586.96	3626484.52	4.02135
487606.96	3626484.52	4.21988	487626.96	3626484.52	4.44861
487646.96	3626484.52	4.72085	487486.96	3626504.52	3.26062
487506.96	3626504.52	3.44790	487526.96	3626504.52	3.64325
487546.96	3626504.52	3.60608	487566.96	3626504.52	3.76180
487586.96	3626504.52	3.94065	487606.96	3626504.52	4.15303
487626.96	3626504.52	4.38699	487646.96	3626504.52	4.67135
487666.96	3626504.52	4.97305	487686.96	3626504.52	5.28065
487706.96	3626504.52	5.60455	487466.96	3626524.52	3.00801
487486.96	3626524.52	3.17150	487506.96	3626524.52	3.35672
487526.96	3626524.52	3.54557	487546.96	3626524.52	3.52617
487566.96	3626524.52	3.67836	487586.96	3626524.52	3.86836
487606.96	3626524.52	4.09183	487626.96	3626524.52	4.33339
487646.96	3626524.52	4.60277	487666.96	3626524.52	4.90363
487686.96	3626524.52	5.20719	487706.96	3626524.52	5.58139

487726.96   3626524.52   5.99688   487746.96
3626524.52   6.50546
487766.96   3626524.52   7.06214   487446.96
3626544.52   2.80952
487466.96   3626544.52   2.94584   487486.96
3626544.52   3.10066
487506.96   3626544.52   3.25933   487526.96
3626544.52   3.38204
487546.96   3626544.52   3.51721   487566.96
3626544.52   3.61232
487586.96   3626544.52   3.82728   487606.96
3626544.52   4.08963
487626.96   3626544.52   4.28726   487646.96
3626544.52   4.55587
487666.96   3626544.52   4.83667   487686.96
3626544.52   5.16252
487706.96   3626544.52   5.54467   487726.96
3626544.52   5.97556
487746.96   3626544.52   6.44652   487766.96
3626544.52   6.99919
487786.96   3626544.52   7.61531   487806.96
3626544.52   8.31243
487826.96   3626544.52   9.03301   487426.96
3626564.52   2.60791
487446.96   3626564.52   2.73232   487466.96
3626564.52   2.86815
487486.96   3626564.52   3.01204   487506.96
3626564.52   3.16597
487526.96   3626564.52   3.32167   487546.96
3626564.52   3.37917
487566.96   3626564.52   3.53989   487586.96
3626564.52   3.75000
487606.96   3626564.52   4.15930   487626.96
3626564.52   4.21342
487646.96   3626564.52   4.47826   487666.96
3626564.52   4.76582
487686.96   3626564.52   5.10034   487706.96
3626564.52   5.46257
487726.96   3626564.52   5.89030   487746.96
3626564.52   6.35736
487766.96   3626564.52   6.88305   487786.96
3626564.52   7.52346

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***

INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 , L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 , L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 , L0000025 , L0000026 , L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487806.96	3626564.52	8.20533	487826.96	3626564.52	8.96915
487846.96	3626564.52	9.83382	487866.96	3626564.52	10.86820
487426.96	3626584.52	2.54022	487446.96	3626584.52	2.65777
487466.96	3626584.52	2.78729	487486.96	3626584.52	2.92410
487506.96	3626584.52	3.07133	487526.96	3626584.52	3.24369
487546.96	3626584.52	3.28798	487566.96	3626584.52	3.46291
487586.96	3626584.52	3.67098	487606.96	3626584.52	4.00496
487626.96	3626584.52	4.12731	487646.96	3626584.52	4.39279
487666.96	3626584.52	4.69066	487686.96	3626584.52	5.01918
487706.96	3626584.52	5.37335	487726.96	3626584.52	5.79537
487746.96	3626584.52	6.25565	487766.96	3626584.52	6.76906
487786.96	3626584.52	7.36491	487806.96	3626584.52	8.03565
487826.96	3626584.52	8.80374	487846.96	3626584.52	9.68606
487866.96	3626584.52	10.77552	487886.96	3626584.52	11.93011
487906.96	3626584.52	13.25522	487426.96		

3626604.52 2.46989
487446.96 3626604.52 2.58586 487466.96
3626604.52 2.71028
487486.96 3626604.52 2.84428 487506.96
3626604.52 2.98609
487526.96 3626604.52 3.14431 487546.96
3626604.52 3.24542
487566.96 3626604.52 3.40785 487586.96
3626604.52 3.60710
487606.96 3626604.52 3.81839 487626.96
3626604.52 4.05374
487646.96 3626604.52 4.31062 487666.96
3626604.52 4.60543
487686.96 3626604.52 4.91641 487706.96
3626604.52 5.27533
487726.96 3626604.52 5.67202 487746.96
3626604.52 6.11669
487766.96 3626604.52 6.62388 487786.96
3626604.52 7.19976
487806.96 3626604.52 7.88914 487826.96
3626604.52 8.64799
487846.96 3626604.52 9.52729 487866.96
3626604.52 10.54973
487886.96 3626604.52 11.67355 487906.96
3626604.52 13.04223
487926.96 3626604.52 14.69096 487406.96
3626624.52 2.30043
487426.96 3626624.52 2.40246 487446.96
3626624.52 2.51670
487466.96 3626624.52 2.63508 487486.96
3626624.52 2.76279
487506.96 3626624.52 2.90410 487526.96
3626624.52 3.05378
487546.96 3626624.52 3.18765 487566.96
3626624.52 3.36276
487586.96 3626624.52 3.55813 487606.96
3626624.52 3.76559
487626.96 3626624.52 3.99241 487646.96
3626624.52 4.23214
487666.96 3626624.52 4.51472 487686.96
3626624.52 4.82485
487706.96 3626624.52 5.16863 487726.96
3626624.52 5.55682
487746.96 3626624.52 5.99146 487766.96
3626624.52 6.48275
487786.96 3626624.52 7.04033 487806.96
3626624.52 7.87641
487826.96 3626624.52 8.77000 487846.96
3626624.52 9.49535
487866.96 3626624.52 10.25349 487886.96

3626624.52 11.38154

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026 , L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487906.96	3626624.52	12.76191	487926.96	3626624.52	14.42008
487946.96	3626624.52	16.39355	487406.96	3626644.52	2.23843
487426.96	3626644.52	2.33759	487446.96	3626644.52	2.44671
487466.96	3626644.52	2.56335	487486.96	3626644.52	2.68706
487506.96	3626644.52	2.82111	487526.96	3626644.52	2.96870
487546.96	3626644.52	3.12574	487566.96	3626644.52	3.32189
487586.96	3626644.52	3.51613	487606.96	3626644.52	3.71989
487626.96	3626644.52	3.93900	487646.96	3626644.52	4.16840
487666.96	3626644.52	4.42893	487686.96	3626644.52	4.72608
487706.96	3626644.52	5.06224	487726.96	3626644.52	5.43691

487746.96 3626644.52 5.85207 487766.96
3626644.52 6.32442
487786.96 3626644.52 6.97865 487806.96
3626644.52 7.62205
487826.96 3626644.52 8.36327 487846.96
3626644.52 9.22995
487866.96 3626644.52 9.95088 487886.96
3626644.52 11.07318
487906.96 3626644.52 12.43469 487926.96
3626644.52 14.08599
487946.96 3626644.52 16.03299 487966.96
3626644.52 18.46134
487386.96 3626664.52 2.08916 487406.96
3626664.52 2.18114
487426.96 3626664.52 2.27658 487446.96
3626664.52 2.38201
487466.96 3626664.52 2.49247 487486.96
3626664.52 2.61502
487506.96 3626664.52 2.74393 487526.96
3626664.52 2.88783
487546.96 3626664.52 3.04640 487566.96
3626664.52 3.22447
487586.96 3626664.52 3.43083 487606.96
3626664.52 3.64673
487626.96 3626664.52 3.88398 487646.96
3626664.52 4.11340
487666.96 3626664.52 4.35158 487686.96
3626664.52 4.62493
487706.96 3626664.52 4.93686 487726.96
3626664.52 5.30827
487746.96 3626664.52 5.70199 487766.96
3626664.52 6.15062
487786.96 3626664.52 6.65599 487806.96
3626664.52 7.26848
487826.96 3626664.52 7.93800 487846.96
3626664.52 8.75601
487866.96 3626664.52 9.71104 487886.96
3626664.52 10.81209
487906.96 3626664.52 12.14761 487926.96
3626664.52 13.56800
487946.96 3626664.52 15.62067 487966.96
3626664.52 18.00016
487986.96 3626664.52 20.99912 487386.96
3626684.52 2.03227
487406.96 3626684.52 2.11801 487426.96
3626684.52 2.21359
487446.96 3626684.52 2.31647 487466.96
3626684.52 2.42656
487486.96 3626684.52 2.54595 487506.96
3626684.52 2.67226

487526.96   3626684.52   2.81562   487546.96
3626684.52   2.96138
487566.96   3626684.52   3.11962   487586.96
3626684.52   3.30317
487606.96   3626684.52   3.53025   487626.96
3626684.52   3.79802
487646.96   3626684.52   4.04184   487666.96
3626684.52   4.27537
487686.96   3626684.52   4.51700   487706.96
3626684.52   4.78746

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S):   L0000001   , L0000002 , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010 , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018 , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   , L0000025   , L0000026 , L0000027   , L0000028   ,   . . .   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)   Y-COORD (M)   CONC   X-COORD (M) Y-COORD (M)   CONC
- -
487726.96   3626684.52   5.12927   487746.96
3626684.52   5.46464
487766.96   3626684.52   5.87476   487786.96
3626684.52   6.36685
487806.96   3626684.52   6.92810   487826.96
3626684.52   7.56480
487846.96   3626684.52   8.29896   487866.96
3626684.52   9.15682
487886.96   3626684.52   10.15211   487906.96
3626684.52   11.36708
487926.96   3626684.52   12.95469   487946.96

3626684.52 15.06608
487966.96 3626684.52 17.44486 487986.96
3626684.52 20.32933
488006.96 3626684.52 24.01183 487366.96
3626704.52 1.88917
487386.96 3626704.52 1.96533 487406.96
3626704.52 2.04595
487426.96 3626704.52 2.14762 487446.96
3626704.52 2.25622
487466.96 3626704.52 2.35986 487486.96
3626704.52 2.47722
487506.96 3626704.52 2.60484 487526.96
3626704.52 2.74095
487546.96 3626704.52 2.88587 487566.96
3626704.52 3.03884
487586.96 3626704.52 3.20271 487606.96
3626704.52 3.38220
487626.96 3626704.52 3.60171 487646.96
3626704.52 3.92745
487666.96 3626704.52 4.20148 487686.96
3626704.52 4.43234
487706.96 3626704.52 4.65251 487726.96
3626704.52 4.90639
487746.96 3626704.52 5.24412 487766.96
3626704.52 5.63665
487786.96 3626704.52 6.10327 487806.96
3626704.52 6.63946
487826.96 3626704.52 7.23177 487846.96
3626704.52 7.89963
487866.96 3626704.52 8.66840 487886.96
3626704.52 9.58866
487906.96 3626704.52 10.79850 487926.96
3626704.52 12.21053
487946.96 3626704.52 14.11908 487966.96
3626704.52 16.78093
487986.96 3626704.52 19.57137 488006.96
3626704.52 22.97395
488026.96 3626704.52 27.58691 487386.96
3626724.52 1.91078
487406.96 3626724.52 1.99283 487426.96
3626724.52 2.09487
487446.96 3626724.52 2.19292 487466.96
3626724.52 2.29298
487486.96 3626724.52 2.40516 487506.96
3626724.52 2.52783
487526.96 3626724.52 2.66362 487546.96
3626724.52 2.80158
487566.96 3626724.52 2.95352 487586.96
3626724.52 3.11812
487606.96 3626724.52 3.31325 487626.96

3626724.52 3.50969
487646.96 3626724.52 3.73331 487666.96
3626724.52 3.99863
487686.96 3626724.52 4.23725 487706.96
3626724.52 4.49543
487726.96 3626724.52 4.73801 487746.96
3626724.52 5.05637
487766.96 3626724.52 5.43120 487786.96
3626724.52 5.86036
487806.96 3626724.52 6.32999 487826.96
3626724.52 6.92086
487846.96 3626724.52 7.59000 487866.96
3626724.52 8.29551
487886.96 3626724.52 9.13430 487906.96
3626724.52 10.30212
487926.96 3626724.52 11.84137 487946.96
3626724.52 13.88940
487966.96 3626724.52 16.20122 487986.96
3626724.52 18.79648

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026 , L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC X-COORD (M) Y-COORD (M) CONC
- -
488006.96 3626724.52 22.08838 488026.96
3626724.52 26.39171

488046.96 3626724.52 32.15553 487406.96
3626744.52 1.94009
487426.96 3626744.52 2.04449 487446.96
3626744.52 2.13104
487466.96 3626744.52 2.22706 487486.96
3626744.52 2.33567
487506.96 3626744.52 2.45579 487526.96
3626744.52 2.58967
487546.96 3626744.52 2.72330 487566.96
3626744.52 2.86666
487586.96 3626744.52 3.03650 487606.96
3626744.52 3.22660
487626.96 3626744.52 3.40555 487646.96
3626744.52 3.61338
487666.96 3626744.52 3.84921 487686.96
3626744.52 4.09398
487706.96 3626744.52 4.36198 487726.96
3626744.52 4.59555
487746.96 3626744.52 4.89810 487766.96
3626744.52 5.25015
487786.96 3626744.52 5.63107 487806.96
3626744.52 6.05612
487826.96 3626744.52 6.63264 487846.96
3626744.52 7.28977
487866.96 3626744.52 7.98447 487886.96
3626744.52 8.77259
487906.96 3626744.52 9.88600 487926.96
3626744.52 11.62961
487946.96 3626744.52 13.51330 487966.96
3626744.52 15.41407
487986.96 3626744.52 17.96466 488006.96
3626744.52 21.07461
488026.96 3626744.52 24.96293 488046.96
3626744.52 29.95372
488066.96 3626744.52 36.98559 487446.96
3626764.52 2.06074
487466.96 3626764.52 2.15105 487486.96
3626764.52 2.27420
487506.96 3626764.52 2.40189 487526.96
3626764.52 2.52658
487546.96 3626764.52 2.64611 487566.96
3626764.52 2.78729
487586.96 3626764.52 2.95088 487606.96
3626764.52 3.12807
487626.96 3626764.52 3.31617 487646.96
3626764.52 3.50718
487666.96 3626764.52 3.71524 487686.96
3626764.52 3.94933
487706.96 3626764.52 4.22032 487726.96
3626764.52 4.48950

487746.96 3626764.52 4.77711 487766.96
3626764.52 5.08261
487786.96 3626764.52 5.43047 487806.96
3626764.52 5.86178
487826.96 3626764.52 6.35085 487846.96
3626764.52 6.95960
487866.96 3626764.52 7.71652 487886.96
3626764.52 8.49879
487906.96 3626764.52 9.55421 487926.96
3626764.52 10.98201
487946.96 3626764.52 12.84578 487966.96
3626764.52 14.32033
487986.96 3626764.52 15.85611 488006.96
3626764.52 18.42801
488026.96 3626764.52 22.69795 488046.96
3626764.52 28.07331
488066.96 3626764.52 33.89666 488086.96
3626764.52 42.11659
487466.96 3626784.52 2.12333 487486.96
3626784.52 2.23335
487506.96 3626784.52 2.34451 487526.96
3626784.52 2.45214
487546.96 3626784.52 2.57738 487566.96
3626784.52 2.71932
487586.96 3626784.52 2.87278 487606.96
3626784.52 3.03154
487626.96 3626784.52 3.20078 487646.96
3626784.52 3.39319

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026 , L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487666.96	3626784.52	3.60158	487686.96	3626784.52	3.83042
487706.96	3626784.52	4.07063	487726.96	3626784.52	4.35678
487746.96	3626784.52	4.65200	487766.96	3626784.52	4.95013
487786.96	3626784.52	5.27668	487806.96	3626784.52	5.69312
487826.96	3626784.52	6.16276	487846.96	3626784.52	6.70885
487866.96	3626784.52	7.37441	487886.96	3626784.52	8.18495
487906.96	3626784.52	9.15663	487926.96	3626784.52	10.20549
487946.96	3626784.52	11.45606	487966.96	3626784.52	12.91729
487986.96	3626784.52	14.65981	488006.96	3626784.52	16.95549
488026.96	3626784.52	20.21689	488046.96	3626784.52	24.98059
487506.96	3626804.52	2.28780	487526.96	3626804.52	2.38171
487546.96	3626804.52	2.51718	487566.96	3626804.52	2.64924
487586.96	3626804.52	2.79509	487606.96	3626804.52	2.94744
487626.96	3626804.52	3.09857	487646.96	3626804.52	3.29688
487666.96	3626804.52	3.50493	487686.96	3626804.52	3.71847
487706.96	3626804.52	3.93556	487726.96	3626804.52	4.21628
487746.96	3626804.52	4.51006	487766.96	3626804.52	4.81612
487786.96	3626804.52	5.14745	487806.96	3626804.52	5.54347
487826.96	3626804.52	5.99819	487846.96	3626804.52	6.50314
487866.96	3626804.52	7.06942	487886.96	3626804.52	7.85981
487906.96	3626804.52	8.73268	487926.96	3626804.52	9.73816
487946.96	3626804.52	10.84309	487966.96		

```
3626804.52        12.21330
         487986.96    3626804.52       13.82496                      487526.96
3626824.52         2.34464
         487546.96    3626824.52        2.45382                      487566.96
3626824.52         2.57773
         487586.96    3626824.52        2.72501                      487606.96
3626824.52         2.89135
         487626.96    3626824.52        3.03998                      487646.96
3626824.52         3.22131
         487666.96    3626824.52        3.42399                      487686.96
3626824.52         3.63200
         487706.96    3626824.52        3.85658                      487726.96
3626824.52         4.08139
         487746.96    3626824.52        4.33745                      487766.96
3626824.52         4.65830
         487786.96    3626824.52        5.03747                      487806.96
3626824.52         5.40829
         487826.96    3626824.52        5.83420                      487846.96
3626824.52         6.31581
         487866.96    3626824.52        6.85627                      487886.96
3626824.52         7.49479
         487546.96    3626844.52        2.40176                      487566.96
3626844.52         2.53118
         487586.96    3626844.52        2.67339                      487606.96
3626844.52         2.83068
         487626.96    3626844.52        2.98125                      487646.96
3626844.52         3.15632
         487666.96    3626844.52        3.34049                      487686.96
3626844.52         3.53427
         487706.96    3626844.52        3.76505                      487726.96
3626844.52         3.98362
         487746.96    3626844.52        4.24608                      487766.96
3626844.52         4.55743
         487786.96    3626844.52        4.90195                      487806.96
3626844.52         5.26868
         487826.96    3626844.52        5.68157                      487846.96
3626844.52         6.14609
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 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                              *** THE PERIOD ( 26304 HRS) AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: ALL      ***
                                  INCLUDING SOURCE(S):     L0000001    , L0000002
, L0000003    , L0000004   ,   L0000005    ,
                 L0000006    , L0000007    , L0000008    , L0000009    , L0000010
```

, L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018
, L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026
, L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487546.96	3626864.52	2.35482	487566.96	3626864.52	2.48835
487586.96	3626864.52	2.62651	487606.96	3626864.52	2.76758
487626.96	3626864.52	2.91500	487646.96	3626864.52	3.09114
487666.96	3626864.52	3.26742	487686.96	3626864.52	3.45070
487706.96	3626864.52	3.67450	487726.96	3626864.52	3.90620
487746.96	3626864.52	4.17596	487766.96	3626864.52	4.46703
487786.96	3626864.52	4.76583	487806.96	3626864.52	5.13086
487566.96	3626884.52	2.42913	487586.96	3626884.52	2.57353
487606.96	3626884.52	2.71376	487626.96	3626884.52	2.83450
487646.96	3626884.52	3.01344	487666.96	3626884.52	3.19800
487686.96	3626884.52	3.39047	487706.96	3626884.52	3.61269
487726.96	3626884.52	3.83264	487746.96	3626884.52	4.07779
487766.96	3626884.52	4.34695	487786.96	3626884.52	4.63349
487586.96	3626904.52	2.52113	487606.96	3626904.52	2.66364
487626.96	3626904.52	2.78109	487646.96	3626904.52	2.94320
487666.96	3626904.52	3.11983	487686.96	3626904.52	3.30500
487706.96	3626904.52	3.52682	487726.96	3626904.52	3.74209

```
         487746.96    3626904.52        3.98167                              487766.96
3626904.52        4.24487
         487626.96    3626924.52        2.74139                              487646.96
3626924.52        2.88037
         487666.96    3626924.52        3.03674                              487686.96
3626924.52        3.21892
         487706.96    3626924.52        3.43017                              487726.96
3626924.52        3.64126
         487746.96    3626924.52        3.88005                              487646.96
3626944.52        2.83653
         487666.96    3626944.52        2.99493                              487686.96
3626944.52        3.16789
         487706.96    3626944.52        3.34325                              487726.96
3626944.52        3.54310
         487666.96    3626964.52        2.94290                              487686.96
3626964.52        3.10481
         487706.96    3626964.52        3.27012                              487686.96
3626984.52        3.03967
         488242.19    3625436.42        0.51989                              488262.19
3625436.42        0.51569
         488242.19    3625456.42        0.53337                              488262.19
3625456.42        0.52899
         488282.19    3625456.42        0.52434                              488302.19
3625456.42        0.51959
         488322.19    3625456.42        0.51546                              488242.19
3625476.42        0.54742
         488262.19    3625476.42        0.54284                              488282.19
3625476.42        0.53804
         488302.19    3625476.42        0.53314                              488322.19
3625476.42        0.52889
         488342.19    3625476.42        0.52532                              488362.19
3625476.42        0.52245
         488242.19    3625496.42        0.56209                              488262.19
3625496.42        0.55732
         488282.19    3625496.42        0.55235                              488302.19
3625496.42        0.54744
         488322.19    3625496.42        0.54308                              488342.19
3625496.42        0.53940
         488362.19    3625496.42        0.53640                              488382.19
3625496.42        0.53397
         488402.19    3625496.42        0.53203                              488422.19
3625496.42        0.53046
         488242.19    3625516.42        0.57738                              488262.19
3625516.42        0.57243
         488282.19    3625516.42        0.56722                              488302.19
3625516.42        0.56220
```

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026 , L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488322.19	3625516.42	0.55773	488342.19	3625516.42	0.55394
488362.19	3625516.42	0.55085	488382.19	3625516.42	0.54836
488402.19	3625516.42	0.54638	488422.19	3625516.42	0.54485
488442.19	3625516.42	0.54374	488462.19	3625516.42	0.54309
488482.19	3625516.42	0.54298	488222.19	3625536.42	0.59816
488242.19	3625536.42	0.59338	488262.19	3625536.42	0.58823
488282.19	3625536.42	0.58276	488302.19	3625536.42	0.57757
488322.19	3625536.42	0.57299	488342.19	3625536.42	0.56910
488362.19	3625536.42	0.56591	488382.19	3625536.42	0.56338
488402.19	3625536.42	0.56137	488422.19	3625536.42	0.55989
488442.19	3625536.42	0.55888	488462.19	3625536.42	0.55834
488482.19	3625536.42	0.55838	488502.19	3625536.42	0.55900
488522.19	3625536.42	0.56034	488542.19		

3625536.42 0.56242
488222.19 3625556.42 0.61491 488242.19
3625556.42 0.61015
488262.19 3625556.42 0.60480 488282.19
3625556.42 0.59913
488302.19 3625556.42 0.59384 488322.19
3625556.42 0.58912
488342.19 3625556.42 0.58512 488362.19
3625556.42 0.58188
488382.19 3625556.42 0.57942 488402.19
3625556.42 0.57742
488422.19 3625556.42 0.57591 488442.19
3625556.42 0.57490
488462.19 3625556.42 0.57442 488482.19
3625556.42 0.57466
488502.19 3625556.42 0.57560 488522.19
3625556.42 0.57727
488542.19 3625556.42 0.57960 488562.19
3625556.42 0.58247
488202.19 3625576.42 0.63640 488222.19
3625576.42 0.63250
488242.19 3625576.42 0.62770 488262.19
3625576.42 0.62216
488282.19 3625576.42 0.61633 488302.19
3625576.42 0.61086
488322.19 3625576.42 0.60602 488342.19
3625576.42 0.60196
488362.19 3625576.42 0.59870 488382.19
3625576.42 0.59620
488402.19 3625576.42 0.59414 488422.19
3625576.42 0.59261
488442.19 3625576.42 0.59167 488462.19
3625576.42 0.59138
488482.19 3625576.42 0.59186 488502.19
3625576.42 0.59307
488522.19 3625576.42 0.59500 488542.19
3625576.42 0.59760
488562.19 3625576.42 0.60077 488582.19
3625576.42 0.60428
488122.19 3625596.42 0.66269 488142.19
3625596.42 0.66120
488162.19 3625596.42 0.65961 488182.19
3625596.42 0.65763
488202.19 3625596.42 0.65488 488222.19
3625596.42 0.65105
488242.19 3625596.42 0.64608 488262.19
3625596.42 0.64035
488282.19 3625596.42 0.63441 488302.19
3625596.42 0.62870
488322.19 3625596.42 0.62373 488342.19

```
3625596.42        0.61966
         488362.19    3625596.42        0.61642                            488382.19
3625596.42        0.61379
         488402.19    3625596.42        0.61162                            488422.19
3625596.42        0.61009
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***       11:15:09

                                 PAGE  32
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                                       *** THE PERIOD ( 26304 HRS) AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: ALL      ***
                                   INCLUDING SOURCE(S):     L0000001    , L0000002
, L0000003    , L0000004   ,   L0000005    ,
                 L0000006    , L0000007    , L0000008    , L0000009    , L0000010
, L0000011    , L0000012   ,   L0000013    ,
                 L0000014    , L0000015    , L0000016    , L0000017    , L0000018
, L0000019    , L0000020   ,   L0000021    ,
                 L0000022    , L0000023    , L0000024    , L0000025    , L0000026
, L0000027    , L0000028   ,    . . .      ,

                                                     ***   DISCRETE CARTESIAN RECEPTOR POINTS
***

                                                **   CONC OF PM_10    IN MICROGRAMS/M**3
                   **

       X-COORD (M)   Y-COORD (M)        CONC                          X-COORD (M)
Y-COORD (M)       CONC
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - - - -
         488522.19    3625596.42        0.61364                            488542.19
3625596.42        0.61650
         488562.19    3625596.42        0.62001                            488582.19
3625596.42        0.62386
         488602.19    3625596.42        0.62788                            488062.19
3625616.42        0.68600
         488082.19    3625616.42        0.68563                            488102.19
3625616.42        0.68445
         488122.19    3625616.42        0.68296                            488142.19
3625616.42        0.68137
         488162.19    3625616.42        0.67966                            488182.19
3625616.42        0.67752
         488202.19    3625616.42        0.67459                            488222.19
3625616.42        0.67059
         488242.19    3625616.42        0.66547                            488262.19
3625616.42        0.65957
```

488282.19 3625616.42 0.65342 488302.19
3625616.42 0.64755
488322.19 3625616.42 0.64238 488342.19
3625616.42 0.63816
488362.19 3625616.42 0.63483 488382.19
3625616.42 0.63214
488402.19 3625616.42 0.63086 488522.19
3625616.42 0.63331
488542.19 3625616.42 0.63651 488562.19
3625616.42 0.64026
488582.19 3625616.42 0.64441 488602.19
3625616.42 0.64871
488062.19 3625636.42 0.70711 488082.19
3625636.42 0.70684
488102.19 3625636.42 0.70576 488122.19
3625636.42 0.70423
488142.19 3625636.42 0.70258 488162.19
3625636.42 0.70076
488182.19 3625636.42 0.69851 488202.19
3625636.42 0.69542
488222.19 3625636.42 0.69123 488242.19
3625636.42 0.68592
488262.19 3625636.42 0.67979 488282.19
3625636.42 0.67338
488302.19 3625636.42 0.66730 488322.19
3625636.42 0.66197
488342.19 3625636.42 0.65762 488362.19
3625636.42 0.65418
488382.19 3625636.42 0.65142 488522.19
3625636.42 0.65411
488542.19 3625636.42 0.65764 488562.19
3625636.42 0.66166
488582.19 3625636.42 0.66612 488602.19
3625636.42 0.67071
488622.19 3625636.42 0.67533 488062.19
3625656.42 0.72940
488082.19 3625656.42 0.72910 488102.19
3625656.42 0.72812
488122.19 3625656.42 0.72659 488142.19
3625656.42 0.72488
488162.19 3625656.42 0.72300 488182.19
3625656.42 0.72067
488202.19 3625656.42 0.71747 488222.19
3625656.42 0.71304
488242.19 3625656.42 0.70749 488262.19
3625656.42 0.70108
488282.19 3625656.42 0.69434 488302.19
3625656.42 0.68803
488322.19 3625656.42 0.68259 488342.19
3625656.42 0.67811

488362.19   3625656.42   0.67453   488382.19
3625656.42   0.67170
488522.19   3625656.42   0.67611   488542.19
3625656.42   0.68000
488582.19   3625656.42   0.68908   488602.19
3625656.42   0.69397
488622.19   3625656.42   0.69886   488642.19
3625656.42   0.70374
488062.19   3625676.42   0.75218   488082.19
3625676.42   0.75254
488102.19   3625676.42   0.75179   488122.19
3625676.42   0.75031
488142.19   3625676.42   0.74854   488162.19
3625676.42   0.74656

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002
, L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010
, L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018
, L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   , L0000025   , L0000026
, L0000027   , L0000028   ,   . . .   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)   Y-COORD (M)   CONC   X-COORD (M)
Y-COORD (M)   CONC
- -
488182.19   3625676.42   0.74409   488202.19
3625676.42   0.74065
488222.19   3625676.42   0.73600   488242.19
3625676.42   0.73012
488262.19   3625676.42   0.72338   488282.19
3625676.42   0.71641
488302.19   3625676.42   0.70984   488322.19

3625676.42 0.70423
488342.19 3625676.42 0.69961 488362.19
3625676.42 0.69589
488382.19 3625676.42 0.69288 488582.19
3625676.42 0.71341
488602.19 3625676.42 0.71860 488622.19
3625676.42 0.72383
488642.19 3625676.42 0.72902 488062.19
3625696.42 0.77624
488082.19 3625696.42 0.77732 488102.19
3625696.42 0.77687
488122.19 3625696.42 0.77544 488142.19
3625696.42 0.77352
488162.19 3625696.42 0.77140 488182.19
3625696.42 0.76878
488202.19 3625696.42 0.76513 488222.19
3625696.42 0.76024
488242.19 3625696.42 0.75403 488262.19
3625696.42 0.74696
488282.19 3625696.42 0.73973 488302.19
3625696.42 0.73287
488322.19 3625696.42 0.72703 488342.19
3625696.42 0.72223
488362.19 3625696.42 0.71839 488382.19
3625696.42 0.71539
488582.19 3625696.42 0.73924 488602.19
3625696.42 0.74467
488622.19 3625696.42 0.75024 488642.19
3625696.42 0.75570
488662.19 3625696.42 0.76118 488042.19
3625716.42 0.79829
488142.19 3625716.42 0.79993 488162.19
3625716.42 0.79760
488182.19 3625716.42 0.79482 488202.19
3625716.42 0.79103
488222.19 3625716.42 0.78589 488242.19
3625716.42 0.77937
488262.19 3625716.42 0.77197 488282.19
3625716.42 0.76441
488302.19 3625716.42 0.75726 488322.19
3625716.42 0.75109
488342.19 3625716.42 0.74603 488362.19
3625716.42 0.74212
488382.19 3625716.42 0.73944 488602.19
3625716.42 0.77230
488622.19 3625716.42 0.77819 488642.19
3625716.42 0.78385
488662.19 3625716.42 0.78965 488682.19
3625716.42 0.79529
488022.19 3625736.42 0.81791 488042.19

3625736.42   0.82539
        488182.19   3625736.42   0.82232   488202.19
3625736.42   0.81827
        488222.19   3625736.42   0.81285   488242.19
3625736.42   0.80598
        488262.19   3625736.42   0.79819   488282.19
3625736.42   0.79025
        488302.19   3625736.42   0.78280   488322.19
3625736.42   0.77649
        488362.19   3625736.42   0.76804   488382.19
3625736.42   0.76478
        488402.19   3625736.42   0.76308   488602.19
3625736.42   0.80173
        488622.19   3625736.42   0.80795   488642.19
3625736.42   0.81392
        488662.19   3625736.42   0.81994   488682.19
3625736.42   0.82570
        488702.19   3625736.42   0.83086   488002.19
3625756.42   0.83457
        488022.19   3625756.42   0.84460   488182.19
3625756.42   0.85144
        488202.19   3625756.42   0.84711   488222.19
3625756.42   0.84142

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   , L0000025   , L0000026   , L0000027   , L0000028   ,   . . .   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)   Y-COORD (M)   CONC   X-COORD (M)   Y-COORD (M)   CONC

- -

488242.19 3625756.42 0.83416 488262.19
3625756.42 0.82595
488282.19 3625756.42 0.81763 488382.19
3625756.42 0.79177
488602.19 3625756.42 0.83308 488622.19
3625756.42 0.83962
488642.19 3625756.42 0.84594 488662.19
3625756.42 0.85209
488682.19 3625756.42 0.85783 488702.19
3625756.42 0.86269
487982.19 3625776.42 0.85115 488002.19
3625776.42 0.86231
488222.19 3625776.42 0.87180 488242.19
3625776.42 0.86414
488262.19 3625776.42 0.85547 488622.19
3625776.42 0.87332
488642.19 3625776.42 0.88003 488662.19
3625776.42 0.88620
488682.19 3625776.42 0.89169 488702.19
3625776.42 0.89593
488722.19 3625776.42 0.89822 487982.19
3625796.42 0.87988
488222.19 3625796.42 0.90403 488242.19
3625796.42 0.89591
488262.19 3625796.42 0.88681 488622.19
3625796.42 0.91013
488642.19 3625796.42 0.91628 488662.19
3625796.42 0.92229
488682.19 3625796.42 0.92725 488702.19
3625796.42 0.93048
488722.19 3625796.42 0.93133 488742.19
3625796.42 0.92928
488222.19 3625816.42 0.93829 488242.19
3625816.42 0.92966
488262.19 3625816.42 0.92021 488642.19
3625816.42 0.95467
488662.19 3625816.42 0.96032 488682.19
3625816.42 0.96443
488702.19 3625816.42 0.96622 488722.19
3625816.42 0.96518
488742.19 3625816.42 0.96081 488762.19
3625816.42 0.95307
488202.19 3625836.42 0.98252 488222.19
3625836.42 0.97485
488242.19 3625836.42 0.96565 488662.19
3625836.42 1.00022
488682.19 3625836.42 1.00311 488702.19
3625836.42 1.00303

488722.19 3625836.42 0.99955 488742.19
3625836.42 0.99254
488762.19 3625836.42 0.98214 488782.19
3625836.42 0.96893
488202.19 3625856.42 1.02194 488222.19
3625856.42 1.01361
488242.19 3625856.42 1.00461 488682.19
3625856.42 1.04298
488702.19 3625856.42 1.04061 488722.19
3625856.42 1.03438
488742.19 3625856.42 1.02445 488762.19
3625856.42 1.01131
488782.19 3625856.42 0.99580 488802.19
3625856.42 0.97893
488822.19 3625856.42 0.96164 488202.19
3625876.42 1.06357
488222.19 3625876.42 1.05486 488662.19
3625876.42 1.08503
488682.19 3625876.42 1.08391 488702.19
3625876.42 1.07878
488722.19 3625876.42 1.06950 488742.19
3625876.42 1.05655
488762.19 3625876.42 1.04078 488782.19
3625876.42 1.02326
488802.19 3625876.42 1.00510 488822.19
3625876.42 0.98713
488842.19 3625876.42 0.97009 488202.19
3625896.42 1.10765
488222.19 3625896.42 1.09882 488642.19
3625896.42 1.12969
488662.19 3625896.42 1.12989 488682.19
3625896.42 1.12581

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002
, L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010
, L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018
, L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026
, L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488702.19	3625896.42	1.11732	488722.19	3625896.42	1.10485
488742.19	3625896.42	1.08899	488762.19	3625896.42	1.07090
488782.19	3625896.42	1.05177	488802.19	3625896.42	1.03270
488822.19	3625896.42	1.01452	488842.19	3625896.42	0.99771
488862.19	3625896.42	0.98259	488882.19	3625896.42	0.96915
488902.19	3625896.42	0.95718	488202.19	3625916.42	1.15537
488222.19	3625916.42	1.14600	488642.19	3625916.42	1.17863
488662.19	3625916.42	1.17587	488682.19	3625916.42	1.16836
488702.19	3625916.42	1.15634	488762.19	3625916.42	1.10227
488782.19	3625916.42	1.08174	488802.19	3625916.42	1.06226
488822.19	3625916.42	1.04422	488842.19	3625916.42	1.02787
488862.19	3625916.42	1.01328	488882.19	3625916.42	1.00024
488902.19	3625916.42	0.98845	488922.19	3625916.42	0.97748
488942.19	3625916.42	0.96688	488222.19	3625936.42	1.19681
488622.19	3625936.42	1.23053	488642.19	3625936.42	1.22925
488662.19	3625936.42	1.22281	488682.19	3625936.42	1.21153
488782.19	3625936.42	1.11373	488802.19	3625936.42	1.09425
488822.19	3625936.42	1.07661	488842.19	3625936.42	1.06080
488862.19	3625936.42	1.04665	488882.19	3625936.42	1.03380
488902.19	3625936.42	1.02187	488922.19		

3625936.42 1.01041
488942.19 3625936.42 0.99913 488962.19
3625936.42 0.98784
488982.19 3625936.42 0.97641 489002.19
3625936.42 0.96514
488602.19 3625956.42 1.28576 488622.19
3625956.42 1.28604
488642.19 3625956.42 1.28109 488662.19
3625956.42 1.27069
488782.19 3625956.42 1.14846 488802.19
3625956.42 1.12921
488822.19 3625956.42 1.11200 488842.19
3625956.42 1.09657
488862.19 3625956.42 1.08261 488882.19
3625956.42 1.06968
488902.19 3625956.42 1.05729 488922.19
3625956.42 1.04514
488942.19 3625956.42 1.03305 488962.19
3625956.42 1.02090
488982.19 3625956.42 1.00872 489002.19
3625956.42 0.99671
489022.19 3625956.42 0.98493 489042.19
3625956.42 0.97358
489062.19 3625956.42 0.96282 489082.19
3625956.42 0.95271
488622.19 3625976.42 1.34381 488802.19
3625976.42 1.16733
488822.19 3625976.42 1.15054 488842.19
3625976.42 1.13542
488862.19 3625976.42 1.12139 488882.19
3625976.42 1.10799
488902.19 3625976.42 1.09492 488922.19
3625976.42 1.08181
488942.19 3625976.42 1.06873 488962.19
3625976.42 1.05572
488982.19 3625976.42 1.04288 489002.19
3625976.42 1.03040
489022.19 3625976.42 1.01841 489042.19
3625976.42 1.00708
489062.19 3625976.42 0.99655 489082.19
3625976.42 0.98686

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION

VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026 , L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
489102.19	3625976.42	0.97813	489122.19	3625976.42	0.97034
488802.19	3625996.42	1.20889	488822.19	3625996.42	1.19231
488842.19	3625996.42	1.17730	488922.19	3625996.42	1.12066
488942.19	3625996.42	1.10655	488962.19	3625996.42	1.09277
488982.19	3625996.42	1.07946	489002.19	3625996.42	1.06683
489022.19	3625996.42	1.05495	489042.19	3625996.42	1.04390
489062.19	3625996.42	1.03374	489082.19	3625996.42	1.02459
489102.19	3625996.42	1.01639	489122.19	3625996.42	1.00910
489142.19	3625996.42	1.00258	488802.19	3626016.42	1.25411
488822.19	3626016.42	1.23734	488842.19	3626016.42	1.22197
488982.19	3626016.42	1.11946	489002.19	3626016.42	1.10693
489022.19	3626016.42	1.09530	489042.19	3626016.42	1.08463
489062.19	3626016.42	1.07495	489082.19	3626016.42	1.06634
489102.19	3626016.42	1.05850	489122.19	3626016.42	1.05147
489142.19	3626016.42	1.04507	488782.19	3626036.42	1.32149

488802.19 3626036.42 1.30297 488822.19
3626036.42 1.28568
488842.19 3626036.42 1.26960 489042.19
3626036.42 1.12955
489062.19 3626036.42 1.12023 489082.19
3626036.42 1.11195
489102.19 3626036.42 1.10424 489122.19
3626036.42 1.09707
489142.19 3626036.42 1.09025 488782.19
3626056.42 1.37472
488802.19 3626056.42 1.35556 488822.19
3626056.42 1.33744
488842.19 3626056.42 1.32042 489042.19
3626056.42 1.17885
489062.19 3626056.42 1.16955 489082.19
3626056.42 1.16122
489102.19 3626056.42 1.15328 489122.19
3626056.42 1.14544
489142.19 3626056.42 1.13752 489162.19
3626056.42 1.12960
488782.19 3626076.42 1.43321 488802.19
3626076.42 1.41210
488822.19 3626076.42 1.39296 488842.19
3626076.42 1.37465
488862.19 3626076.42 1.35729 489062.19
3626076.42 1.22282
489082.19 3626076.42 1.21382 489102.19
3626076.42 1.20505
489122.19 3626076.42 1.19598 489142.19
3626076.42 1.18643
489162.19 3626076.42 1.17672 488782.19
3626096.42 1.49557
488802.19 3626096.42 1.47301 488822.19
3626096.42 1.45282
488842.19 3626096.42 1.43336 488862.19
3626096.42 1.41475
489062.19 3626096.42 1.27942 489082.19
3626096.42 1.26902
489102.19 3626096.42 1.25858 489122.19
3626096.42 1.24758
489142.19 3626096.42 1.23584 489162.19
3626096.42 1.22355
488782.19 3626116.42 1.56150 488802.19
3626116.42 1.53899
488822.19 3626116.42 1.51787 488842.19
3626116.42 1.49756
488862.19 3626116.42 1.47842 489062.19
3626116.42 1.33844
489082.19 3626116.42 1.32582 489102.19
3626116.42 1.31273

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026 , L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
489122.19	3626116.42	1.29906	489142.19	3626116.42	1.28461
489162.19	3626116.42	1.26895	489182.19	3626116.42	1.25274
488782.19	3626136.42	1.63388	488802.19	3626136.42	1.61082
488822.19	3626136.42	1.58920	488842.19	3626136.42	1.56830
488862.19	3626136.42	1.54867	489082.19	3626136.42	1.38320
489102.19	3626136.42	1.36663	489122.19	3626136.42	1.34949
489142.19	3626136.42	1.33155	489162.19	3626136.42	1.31214
489182.19	3626136.42	1.29226	488782.19	3626156.42	1.71361
488802.19	3626156.42	1.68985	488822.19	3626156.42	1.66786
488842.19	3626156.42	1.64638	488862.19	3626156.42	1.62624
488882.19	3626156.42	1.60764	489102.19		

3626156.42 1.41892
489122.19 3626156.42 1.39744 489142.19
3626156.42 1.37540
489162.19 3626156.42 1.35201 489182.19
3626156.42 1.32814
488782.19 3626176.42 1.80199 488802.19
3626176.42 1.77733
488822.19 3626176.42 1.75474 488842.19
3626176.42 1.73237
488862.19 3626176.42 1.71145 488882.19
3626176.42 1.69213
489122.19 3626176.42 1.44167 489142.19
3626176.42 1.41502
489162.19 3626176.42 1.38763 489182.19
3626176.42 1.35959
488782.19 3626196.42 1.89995 488802.19
3626196.42 1.87398
488822.19 3626196.42 1.85034 488842.19
3626196.42 1.82657
488862.19 3626196.42 1.80400 488882.19
3626196.42 1.78279
488902.19 3626196.42 1.76191 489142.19
3626196.42 1.44972
489162.19 3626196.42 1.41791 489182.19
3626196.42 1.38581
489202.19 3626196.42 1.35353 488782.19
3626216.42 2.00808
488802.19 3626216.42 1.98025 488822.19
3626216.42 1.95457
488842.19 3626216.42 1.92851 488862.19
3626216.42 1.90319
488882.19 3626216.42 1.87864 488902.19
3626216.42 1.85403
489142.19 3626216.42 1.47856 489162.19
3626216.42 1.44236
489182.19 3626216.42 1.40637 489202.19
3626216.42 1.37050
489222.19 3626216.42 1.33479 489242.19
3626216.42 1.29926
489262.19 3626216.42 1.26449 488782.19
3626236.42 2.12655
488802.19 3626236.42 2.09617 488822.19
3626236.42 2.06662
488842.19 3626236.42 2.03719 488862.19
3626236.42 2.00783
488882.19 3626236.42 1.97820 488902.19
3626236.42 1.94787
489142.19 3626236.42 1.50085 489162.19
3626236.42 1.46065
489182.19 3626236.42 1.42101 489202.19

3626236.42   1.38166
         489222.19   3626236.42   1.34272   489242.19
3626236.42   1.30441
         489262.19   3626236.42   1.26757   488782.19
3626256.42   2.25450
         488802.19   3626256.42   2.22090   488822.19
3626256.42   2.18589
         488842.19   3626256.42   2.14998   488862.19
3626256.42   2.11367

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002
, L0000003   , L0000004 ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010
, L0000011   , L0000012 ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018
, L0000019   , L0000020 ,   L0000021   ,
L0000022   , L0000023   , L0000024   , L0000025   , L0000026
, L0000027   , L0000028 ,   . . .   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)   Y-COORD (M)   CONC   X-COORD (M)
Y-COORD (M)   CONC
- -
         488882.19   3626256.42   2.07723   488902.19
3626256.42   2.03997
         488922.19   3626256.42   2.00113   489142.19
3626256.42   1.51635
         489162.19   3626256.42   1.47404   489222.19
3626256.42   1.34506
         489242.19   3626256.42   1.30425   489262.19
3626256.42   1.26517
         488882.19   3626276.42   2.17263   488902.19
3626276.42   2.12697
         488922.19   3626276.42   2.08049   489142.19
3626276.42   1.52506

489162.19 3626276.42 1.48193 489242.19
3626276.42 1.29919
489262.19 3626276.42 1.25795 488882.19
3626296.42 2.26141
488902.19 3626296.42 2.20542 489262.19
3626296.42 1.24699
489282.19 3626296.42 1.20626 488902.19
3626316.42 2.27237
489282.19 3626316.42 1.19088 489302.19
3626316.42 1.15153
488902.19 3626336.42 2.32522 488922.19
3626336.42 2.24853
489302.19 3626336.42 1.13297 489322.19
3626336.42 1.09528
488922.19 3626356.42 2.27561 488942.19
3626356.42 2.19230
489322.19 3626356.42 1.07530 488942.19
3626376.42 2.19710
488962.19 3626376.42 2.10829 489322.19
3626376.42 1.05389
489342.19 3626376.42 1.02025 488962.19
3626396.42 2.09461
489322.19 3626396.42 1.03167 489342.19
3626396.42 0.99796
489342.19 3626416.42 0.97707 489342.19
3626436.42 0.95707
486721.80 3628652.61 0.16270 486669.50
3628628.55 0.16407
486698.79 3628698.63 0.15734 486713.43
3628699.68 0.15731
486757.36 3628723.73 0.15440 486803.39
3628721.64 0.15403
486732.26 3628704.91 0.15675 486505.52
3627649.40 0.21766
486498.72 3627624.46 0.21974 486467.73
3627650.15 0.21254
486460.18 3627619.17 0.21507 488395.14
3627250.20 3.65403
488707.71 3626756.74 5.14880 488748.32
3626767.81 4.50138
488796.31 3626745.66 3.89443 488284.66
3628205.50 0.20659
488310.04 3628227.57 0.20067 488291.28
3628261.78 0.19527
488257.07 3628245.23 0.20118 488310.04
3628201.09 0.20594
488301.21 3628169.09 0.21337 488343.14
3628192.26 0.20703
487535.35 3626865.62 2.26083 487693.75
3626992.77 3.06885

487795.04	3626883.94	4.77482	487871.55	3626830.06	6.93367
487958.83	3626811.74	11.35644	488041.80	3626794.50	21.78633
488094.61	3626765.41	45.71644	488046.12	3626714.76	32.86078
488007.32	3626665.19	25.04973	487941.59	3626599.46	16.08640
487911.42	3626574.68	13.63968	487815.52	3626540.19	8.60700
487709.91	3626504.63	5.66191	487555.82	3626439.98	3.76770
487490.09	3626487.39	3.37151	487428.67	3626556.36	2.64600
487358.63	3626713.68	1.83245	487522.42	3626827.90	2.31459
488235.45	3625424.52	0.51337	488562.08	3625540.85	0.56881

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026 , L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488747.03	3625794.41	0.92522	488857.40	3625879.42	0.96212
489054.28	3625949.52	0.95610	489134.82		

3625964.44 0.94415
489178.07 3626085.25 1.18843 489203.43
3626198.60 1.35363
489260.10 3626203.08 1.26327 489276.51
3626217.99 1.24061
489267.56 3626265.72 1.25178 489336.17
3626346.26 1.06240
489361.53 3626432.77 0.93268 489331.70
3626449.18 0.96142
489309.32 3626361.18 1.09552 489258.61
3626298.53 1.25329
489190.00 3626228.43 1.40109 489149.73
3626317.92 1.50697
489130.34 3626250.81 1.53972 489137.80
3626216.50 1.48668
489054.28 3626106.13 1.31245 489036.38
3626036.03 1.13153
488921.53 3625997.25 1.12290 488846.96
3625983.83 1.14718
488872.31 3626110.61 1.45014 488902.14
3626194.13 1.75162
488931.97 3626270.20 2.03393 488908.77
3626298.76 2.19637
488936.81 3626348.34 2.20834 488971.36
3626378.01 2.06931
488968.11 3626409.72 2.05722 488903.08
3626355.25 2.35763
488864.87 3626256.49 2.10920 488763.27
3626259.34 2.30949
488787.87 3625962.95 1.15481 488735.67
3625906.27 1.11111
488620.82 3625988.31 1.37964 488588.00
3625956.98 1.28492
488671.53 3625861.52 1.05339 488629.77
3625813.79 0.94617
488588.00 3625746.67 0.81303 488571.59
3625648.23 0.67702
488516.41 3625666.13 0.68685 488522.37
3625581.11 0.59930
488431.39 3625576.63 0.59229 488447.79
3625615.41 0.62760
488388.13 3625616.90 0.63212 488398.57
3625706.40 0.72570
488406.03 3625745.18 0.77466 488392.60
3625776.50 0.81989
488350.84 3625722.81 0.75222 488279.24
3625769.05 0.83704
488282.23 3625807.83 0.89649 488246.43
3625851.08 0.99182
488230.02 3625946.54 1.21983 488188.26

3625924.17 1.18092
488213.62 3625757.11 0.84507 488170.36
3625779.49 0.88991
488170.36 3625733.25 0.81984 488077.88
3625697.45 0.77855
487973.47 3625822.74 0.91530 487955.57
3625809.32 0.88455
488058.49 3625678.06 0.75385 488057.00
3625618.40 0.68791
488107.71 3625596.02 0.66340 488185.27
3625576.63 0.63885
488228.53 3625528.90 0.59035 488233.01
3625482.66 0.55389

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026 , L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC (YYMMDDHH) X-COORD (M) Y-COORD (M) CONC (YYMMDDHH)
- -
487526.96 3626464.52 50.21491 (19021102) 487546.96
3626464.52 49.09224 (19021102)
487566.96 3626464.52 49.33438 (19021102) 487586.96
3626464.52 50.29889 (19021102)
487606.96 3626464.52 50.36125 (19021102) 487506.96
3626484.52 62.02136 (20121705)
487526.96 3626484.52 56.03091 (20121705) 487546.96
3626484.52 50.36549 (19021102)

487566.96   3626484.52   50.36940 (19021102)   487586.96
3626484.52   50.74745 (19021102)
487606.96   3626484.52   50.77916 (19021102)   487626.96
3626484.52   51.25157 (19021102)
487646.96   3626484.52   52.61489 (19021102)   487486.96
3626504.52   58.68866 (20122123)
487506.96   3626504.52   60.30173 (20121705)   487526.96
3626504.52   63.52918 (20121705)
487546.96   3626504.52   51.60606 (19040823)   487566.96
3626504.52   51.39993 (19040823)
487586.96   3626504.52   51.09292 (19040823)   487606.96
3626504.52   50.97038 (19040823)
487626.96   3626504.52   51.11243 (19040823)   487646.96
3626504.52   53.04686 (19021102)
487666.96   3626504.52   54.92179 (19021102)   487686.96
3626504.52   55.38552 (19021102)
487706.96   3626504.52   54.59335 (19021102)   487466.96
3626524.52   65.34501 (20122123)
487486.96   3626524.52   66.28976 (20122123)   487506.96
3626524.52   68.12772 (20122123)
487526.96   3626524.52   68.11291 (20122123)   487546.96
3626524.52   51.58865 (19040823)
487566.96   3626524.52   51.04235 (19040823)   487586.96
3626524.52   51.35356 (19040823)
487606.96   3626524.52   52.14276 (19040823)   487626.96
3626524.52   53.06977 (19040823)
487646.96   3626524.52   54.14223 (19040823)   487666.96
3626524.52   55.54514 (19040823)
487686.96   3626524.52   54.40762 (19040823)   487706.96
3626524.52   56.87444 (19021102)
487726.96   3626524.52   59.62357 (19021102)   487746.96
3626524.52   64.83511 (19021102)
487766.96   3626524.52   69.26726 (19021102)   487446.96
3626544.52   74.68074 (20122123)
487466.96   3626544.52   74.33996 (20122123)   487486.96
3626544.52   75.38117 (20122123)
487506.96   3626544.52   75.09338 (20122123)   487526.96
3626544.52   65.42945 (20122123)
487546.96   3626544.52   58.52987 (20122123)   487566.96
3626544.52   50.02380 (19040823)
487586.96   3626544.52   52.29666 (19040823)   487606.96
3626544.52   55.95583 (19040823)
487626.96   3626544.52   54.92642 (19040823)   487646.96
3626544.52   56.12100 (19040823)
487666.96   3626544.52   56.50579 (19040823)   487686.96
3626544.52   57.63310 (19040823)
487706.96   3626544.52   60.96887 (19040823)   487726.96
3626544.52   64.24474 (19040823)
487746.96   3626544.52   66.96390 (19040823)   487766.96
3626544.52   70.80212 (19040823)

487786.96   3626544.52   75.00849 (19021102)   487806.96
3626544.52   79.61521 (19021102)
487826.96   3626544.52   82.19134 (19021102)   487426.96
3626564.52   75.61694 (20122123)
487446.96   3626564.52   76.81341 (20122123)   487466.96
3626564.52   77.65694 (20122123)
487486.96   3626564.52   78.19215 (20122123)   487506.96
3626564.52   78.04787 (20122123)
487526.96   3626564.52   73.90614 (20122123)   487546.96
3626564.52   47.43526 (20122123)
487566.96   3626564.52   47.05537 (19040823)   487586.96
3626564.52   49.58096 (19040823)
487606.96   3626564.52   75.75551 (20122123)   487626.96
3626564.52   53.55122 (19040823)
487646.96   3626564.52   54.84058 (19040823)   487666.96
3626564.52   56.20833 (19040823)
487686.96   3626564.52   59.06955 (19040823)   487706.96
3626564.52   61.08186 (19040823)
487726.96   3626564.52   65.47674 (19040823)   487746.96
3626564.52   68.80071 (19040823)
487766.96   3626564.52   72.22793 (19040823)   487786.96
3626564.52   78.54838 (19040823)

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002
, L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010
, L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018
, L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   , L0000025   , L0000026
, L0000027   , L0000028   ,   . . .   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M)
Y-COORD (M)   CONC   (YYMMDDHH)
- -

- -
487806.96 3626564.52 82.23433 (19040823) 487826.96
3626564.52 84.88516 (19040823)
487846.96 3626564.52 88.46575 (19021102) 487866.96
3626564.52 94.32938 (19021102)
487426.96 3626584.52 73.30098 (20122123) 487446.96
3626584.52 74.38258 (20122123)
487466.96 3626584.52 76.36042 (20122123) 487486.96
3626584.52 76.05748 (20122123)
487506.96 3626584.52 76.22971 (20122123) 487526.96
3626584.52 80.64185 (20122123)
487546.96 3626584.52 44.94865 (21012122) 487566.96
3626584.52 43.72959 (21012122)
487586.96 3626584.52 46.82596 (21012122) 487606.96
3626584.52 70.12386 (20122123)
487626.96 3626584.52 48.92199 (19040823) 487646.96
3626584.52 51.40397 (19040823)
487666.96 3626584.52 54.86834 (19040823) 487686.96
3626584.52 58.14682 (19040823)
487706.96 3626584.52 59.56474 (19040823) 487726.96
3626584.52 65.30024 (19040823)
487746.96 3626584.52 68.63657 (19040823) 487766.96
3626584.52 72.07085 (19040823)
487786.96 3626584.52 77.72806 (19040823) 487806.96
3626584.52 82.30775 (19040823)
487826.96 3626584.52 87.02358 (19040823) 487846.96
3626584.52 91.89195 (19040823)
487866.96 3626584.52 98.32487 (19040823) 487886.96
3626584.52 102.75588 (19040823)
487906.96 3626584.52 106.35082 (19021102) 487426.96
3626604.52 64.76510 (20122123)
487446.96 3626604.52 67.64413 (20122123) 487466.96
3626604.52 70.22384 (20122123)
487486.96 3626604.52 71.23239 (20122123) 487506.96
3626604.52 71.88821 (20122123)
487526.96 3626604.52 74.41929 (20122123) 487546.96
3626604.52 50.76109 (21012122)
487566.96 3626604.52 45.60990 (21012122) 487586.96
3626604.52 45.45687 (19050803)
487606.96 3626604.52 48.39358 (21012122) 487626.96
3626604.52 51.08058 (21012122)
487646.96 3626604.52 54.14122 (21012122) 487666.96
3626604.52 57.15062 (21012122)
487686.96 3626604.52 58.58969 (21012122) 487706.96
3626604.52 59.62525 (21012122)
487726.96 3626604.52 62.38121 (21012122) 487746.96
3626604.52 66.11198 (21012122)
487766.96 3626604.52 69.07940 (19040823) 487786.96
3626604.52 73.85444 (19040823)
487806.96 3626604.52 82.26980 (19040823) 487826.96

```
3626604.52       87.90055  (19040823)
        487846.96   3626604.52       93.81872  (19040823)                487866.96
3626604.52      100.01616  (19040823)
        487886.96   3626604.52      103.64191  (19040823)                487906.96
3626604.52      108.45449  (19040823)
        487926.96   3626604.52      114.20921  (19040823)                487406.96
3626624.52       64.43667  (19021223)
        487426.96   3626624.52       65.03448  (19021223)                487446.96
3626624.52       66.26288  (19021223)
        487466.96   3626624.52       66.48130  (19021223)                487486.96
3626624.52       66.34623  (19021223)
        487506.96   3626624.52       65.81811  (19021223)                487526.96
3626624.52       65.41900  (21012122)
        487546.96   3626624.52       54.59996  (21012122)                487566.96
3626624.52       44.43586  (19050803)
        487586.96   3626624.52       44.31567  (19020205)                487606.96
3626624.52       46.57369  (19020205)
        487626.96   3626624.52       50.07676  (19050803)                487646.96
3626624.52       55.19425  (21012122)
        487666.96   3626624.52       60.00828  (21012122)                487686.96
3626624.52       62.59611  (21012122)
        487706.96   3626624.52       64.80524  (21012122)                487726.96
3626624.52       68.35425  (21012122)
        487746.96   3626624.52       71.51722  (21012122)                487766.96
3626624.52       74.87615  (21012122)
        487786.96   3626624.52       78.53637  (21012122)                487806.96
3626624.52      109.29873  (20122123)
        487826.96   3626624.52      132.83087  (20122123)                487846.96
3626624.52      113.05414  (20122123)
        487866.96   3626624.52       95.41120  (19040823)                487886.96
3626624.52      100.60248  (19040823)
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                      ***        11:15:09

                                  PAGE  42
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                              *** THE   1ST HIGHEST  1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: ALL       ***
                                  INCLUDING SOURCE(S):     L0000001    , L0000002
, L0000003    , L0000004  ,   L0000005    ,
                 L0000006    , L0000007    , L0000008    , L0000009    , L0000010
, L0000011    , L0000012  ,   L0000013    ,
                 L0000014    , L0000015    , L0000016    , L0000017    , L0000018
, L0000019    , L0000020  ,   L0000021    ,
                 L0000022    , L0000023    , L0000024    , L0000025    , L0000026
, L0000027    , L0000028  ,   . . .       ,
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*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
487906.96	3626624.52	106.45945	(19040823)	487926.96	3626624.52	114.32983	(19040823)
487946.96	3626624.52	123.28889	(19040823)	487406.96	3626644.52	64.68065	(19021223)
487426.96	3626644.52	66.53321	(19021223)	487446.96	3626644.52	67.77794	(19021223)
487466.96	3626644.52	66.82496	(19021223)	487486.96	3626644.52	67.68330	(19021223)
487506.96	3626644.52	69.01724	(19021223)	487526.96	3626644.52	67.62999	(21012122)
487546.96	3626644.52	50.31496	(21012122)	487566.96	3626644.52	43.27404	(19020205)
487586.96	3626644.52	43.74909	(19020205)	487606.96	3626644.52	45.64026	(19020205)
487626.96	3626644.52	48.58140	(19020205)	487646.96	3626644.52	53.32628	(19020205)
487666.96	3626644.52	57.95118	(21012122)	487686.96	3626644.52	62.14699	(21012122)
487706.96	3626644.52	69.34629	(21012122)	487726.96	3626644.52	72.64244	(21012122)
487746.96	3626644.52	71.66584	(21012122)	487766.96	3626644.52	75.42331	(21012122)
487786.96	3626644.52	117.98224	(20122123)	487806.96	3626644.52	127.07999	(20122123)
487826.96	3626644.52	142.18361	(20122123)	487846.96	3626644.52	147.04740	(20122123)
487866.96	3626644.52	99.11651	(21012122)	487886.96	3626644.52	105.18360	(21012122)
487906.96	3626644.52	105.85771	(19050803)	487926.96	3626644.52	109.60464	(19050803)
487946.96	3626644.52	119.51492	(19040823)	487966.96	3626644.52	129.71740	(19040823)
487386.96	3626664.52	59.47264	(19021223)	487406.96	3626664.52	61.43603	(19021223)
487426.96	3626664.52	63.25825	(19021223)	487446.96	3626664.52	65.05464	(19021223)
487466.96	3626664.52	65.69724	(19021223)	487486.96	3626664.52	66.32983	(19021223)
487506.96	3626664.52	65.38510	(19021223)	487526.96	3626664.52	64.48781	(21012122)

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        487546.96   3626664.52       64.26661  (21012122)                487566.96
3626664.52       59.04399  (21012122)
        487586.96   3626664.52       50.05335  (21102401)                487606.96
3626664.52       49.56558  (21102401)
        487626.96   3626664.52       49.36469  (21102401)                487646.96
3626664.52       53.01350  (21102401)
        487666.96   3626664.52       57.87812  (21102401)                487686.96
3626664.52       64.00259  (21102401)
        487706.96   3626664.52       75.52280  (21012122)                487726.96
3626664.52       69.95871  (21102401)
        487746.96   3626664.52       91.73730  (21012122)                487766.96
3626664.52      103.79650  (21012122)
        487786.96   3626664.52      110.76028  (21012122)                487806.96
3626664.52      115.10304  (21012122)
        487826.96   3626664.52      125.98443  (20122123)                487846.96
3626664.52      134.99262  (20122123)
        487866.96   3626664.52      141.45727  (20122123)                487886.96
3626664.52      157.79683  (20122123)
        487906.96   3626664.52      163.72430  (20122123)                487926.96
3626664.52      119.12186  (19050803)
        487946.96   3626664.52      118.29616  (21102401)                487966.96
3626664.52      126.09490  (21102401)
        487986.96   3626664.52      136.79508  (19040823)                487386.96
3626684.52       58.20349  (20101601)
        487406.96   3626684.52       59.51899  (20101601)                487426.96
3626684.52       60.67568  (20101601)
        487446.96   3626684.52       61.68721  (20101601)                487466.96
3626684.52       62.84799  (20101601)
        487486.96   3626684.52       63.85662  (20101601)                487506.96
3626684.52       64.24534  (20101601)
        487526.96   3626684.52       63.17647  (20101601)                487546.96
3626684.52       65.27696  (20101601)
        487566.96   3626684.52       67.54370  (20101601)                487586.96
3626684.52       67.92209  (20101601)
        487606.96   3626684.52       59.11673  (21102401)                487626.96
3626684.52       54.78982  (21112423)
        487646.96   3626684.52       56.46447  (21112423)                487666.96
3626684.52       60.81680  (21112423)
        487686.96   3626684.52       67.33328  (21112423)                487706.96
3626684.52       80.22789  (20101601)
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                              *** THE   1ST HIGHEST  1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP:  ALL       ***
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INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026 , L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
487726.96	3626684.52	85.06290	(20101601)	487746.96	3626684.52	97.43846	(20101601)
487766.96	3626684.52	105.49216	(20101601)	487786.96	3626684.52	110.11103	(20101601)
487806.96	3626684.52	115.24699	(20101601)	487826.96	3626684.52	121.96495	(21012122)
487846.96	3626684.52	129.65000	(21012122)	487866.96	3626684.52	138.02993	(21012122)
487886.96	3626684.52	148.07689	(21012122)	487906.96	3626684.52	156.30980	(21012122)
487926.96	3626684.52	150.08056	(21012122)	487946.96	3626684.52	128.25299	(21112423)
487966.96	3626684.52	135.71056	(21112423)	487986.96	3626684.52	146.82893	(21112423)
488006.96	3626684.52	159.39652	(21112423)	487366.96	3626704.52	55.97733	(20013121)
487386.96	3626704.52	57.32599	(20013121)	487406.96	3626704.52	58.82542	(20013121)
487426.96	3626704.52	59.69789	(20013121)	487446.96	3626704.52	59.60570	(20013121)
487466.96	3626704.52	60.73561	(20013121)	487486.96	3626704.52	61.20088	(20013121)
487506.96	3626704.52	61.41505	(20013121)	487526.96	3626704.52	62.12848	(20013121)
487546.96	3626704.52	62.67658	(20013121)	487566.96	3626704.52	64.54710	(20101601)
487586.96	3626704.52	67.11019	(20101601)	487606.96	3626704.52	69.65873	(20101601)
487626.96	3626704.52	69.72940	(21112423)	487646.96	3626704.52	62.39680	(21112423)
487666.96	3626704.52	62.62536	(21112423)	487686.96			

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3626704.52       69.22775  (21112423)
        487706.96   3626704.52       79.86037  (21112423)                487726.96
3626704.52       89.19696  (20101601)
        487746.96   3626704.52       95.66654  (20101601)                487766.96
3626704.52      101.17224  (20101601)
        487786.96   3626704.52      105.44930  (20101601)                487806.96
3626704.52      109.87621  (20101601)
        487826.96   3626704.52      116.25524  (20101601)                487846.96
3626704.52      124.08312  (20101601)
        487866.96   3626704.52      132.90753  (20101601)                487886.96
3626704.52      141.86468  (20101601)
        487906.96   3626704.52      146.42847  (20101601)                487926.96
3626704.52      154.27904  (20101601)
        487946.96   3626704.52      146.12724  (21112423)                487966.96
3626704.52      138.43201  (21112423)
        487986.96   3626704.52      149.77727  (21112423)                488006.96
3626704.52      164.85567  (21112423)
        488026.96   3626704.52      182.25126  (21112423)                487386.96
3626724.52       58.09835  (20012319)
        487406.96   3626724.52       59.22045  (20012319)                487426.96
3626724.52       59.62886  (20012319)
        487446.96   3626724.52       60.57405  (20012319)                487466.96
3626724.52       61.90734  (20012319)
        487486.96   3626724.52       62.99406  (20012319)                487506.96
3626724.52       63.82214  (20012319)
        487526.96   3626724.52       64.14951  (20012319)                487546.96
3626724.52       65.44124  (20012319)
        487566.96   3626724.52       67.11184  (21112423)                487586.96
3626724.52       68.98715  (21112423)
        487606.96   3626724.52       69.61983  (21112423)                487626.96
3626724.52       72.16028  (21112423)
        487646.96   3626724.52       73.84851  (21112423)                487666.96
3626724.52       74.15231  (21112423)
        487686.96   3626724.52       78.93513  (21112423)                487706.96
3626724.52       83.73763  (21112423)
        487726.96   3626724.52       90.87363  (21112423)                487746.96
3626724.52       96.20045  (20012319)
        487766.96   3626724.52      100.99408  (20012319)                487786.96
3626724.52      105.73441  (20012319)
        487806.96   3626724.52      111.78631  (20012319)                487826.96
3626724.52      115.64729  (20012319)
        487846.96   3626724.52      120.53741  (20012319)                487866.96
3626724.52      129.06601  (20012319)
        487886.96   3626724.52      137.67118  (20012319)                487906.96
3626724.52      140.92002  (21112423)
        487926.96   3626724.52      138.97986  (21112423)                487946.96
3626724.52      125.97555  (21112423)
        487966.96   3626724.52      127.83251  (21112423)                487986.96
3626724.52      140.57949  (21020701)
```

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   , L0000025   , L0000026   , L0000027   , L0000028   ,   . . .   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488006.96	3626724.52	155.70471	(21020701)	488026.96	3626724.52	174.38796	(21101502)
488046.96	3626724.52	199.74985	(21101502)	487406.96	3626744.52	59.20343	(20012319)
487426.96	3626744.52	59.29216	(20012319)	487446.96	3626744.52	60.85012	(20012319)
487466.96	3626744.52	62.15316	(20012319)	487486.96	3626744.52	63.24906	(20012319)
487506.96	3626744.52	64.00992	(20012319)	487526.96	3626744.52	64.29722	(21112423)
487546.96	3626744.52	66.14418	(21112423)	487566.96	3626744.52	67.93493	(21112423)
487586.96	3626744.52	69.17457	(21112423)	487606.96	3626744.52	69.83715	(21112423)
487626.96	3626744.52	72.50467	(21112423)	487646.96	3626744.52	74.40571	(21112423)
487666.96	3626744.52	76.42893	(21112423)	487686.96	3626744.52	79.18330	(21112423)
487706.96	3626744.52	82.23421	(21112423)	487726.96	3626744.52	88.08748	(21112423)
487746.96	3626744.52	92.16998	(21112423)	487766.96	3626744.52	96.02739	(21112423)

487786.96 3626744.52 100.10517 (21112423) 487806.96
3626744.52 105.77794 (19091906)
487826.96 3626744.52 109.51523 (19091906) 487846.96
3626744.52 113.44784 (19091906)
487866.96 3626744.52 121.23390 (21120107) 487886.96
3626744.52 131.79108 (21120107)
487906.96 3626744.52 138.01638 (21120107) 487926.96
3626744.52 127.65929 (21020701)
487946.96 3626744.52 125.72869 (21020701) 487966.96
3626744.52 136.19043 (21020701)
487986.96 3626744.52 147.44145 (21101502) 488006.96
3626744.52 161.89358 (21101502)
488026.96 3626744.52 180.85026 (21101502) 488046.96
3626744.52 213.80190 (19121406)
488066.96 3626744.52 256.64473 (19120716) 487446.96
3626764.52 58.94204 (19011621)
487466.96 3626764.52 60.48205 (19011621) 487486.96
3626764.52 60.24208 (20012319)
487506.96 3626764.52 60.97541 (21112423) 487526.96
3626764.52 62.18550 (21112423)
487546.96 3626764.52 63.95308 (21112423) 487566.96
3626764.52 65.29385 (21112423)
487586.96 3626764.52 66.43252 (21112423) 487606.96
3626764.52 67.61945 (21112423)
487626.96 3626764.52 68.88128 (21112423) 487646.96
3626764.52 70.91032 (21112423)
487666.96 3626764.52 73.20665 (19091906) 487686.96
3626764.52 75.80144 (19091906)
487706.96 3626764.52 77.75026 (19091906) 487726.96
3626764.52 81.71499 (19091906)
487746.96 3626764.52 86.80648 (21120107) 487766.96
3626764.52 94.52805 (21120107)
487786.96 3626764.52 102.19917 (21120107) 487806.96
3626764.52 109.27782 (21120107)
487826.96 3626764.52 116.84245 (21120107) 487846.96
3626764.52 123.61701 (21120107)
487866.96 3626764.52 129.10297 (21120107) 487886.96
3626764.52 137.61052 (21120107)
487906.96 3626764.52 141.15258 (21020701) 487926.96
3626764.52 141.22234 (21020701)
487946.96 3626764.52 133.21091 (21101502) 487966.96
3626764.52 150.72696 (21101502)
487986.96 3626764.52 180.44929 (21020701) 488006.96
3626764.52 194.34683 (20122119)
488026.96 3626764.52 206.34448 (19121406) 488046.96
3626764.52 221.64774 (19120405)
488066.96 3626764.52 284.88941 (19120716) 488086.96
3626764.52 362.48411 (19120716)
487466.96 3626784.52 58.82599 (19122507) 487486.96
3626784.52 59.08167 (19122507)

487506.96   3626784.52   59.96055 (19122507)   487526.96
3626784.52   61.86502 (19122507)
487546.96   3626784.52   62.96438 (19122507)   487566.96
3626784.52   63.88884 (19091906)
487586.96   3626784.52   65.04310 (19091906)   487606.96
3626784.52   66.53266 (19091906)
487626.96   3626784.52   68.31416 (19091906)   487646.96
3626784.52   70.94981 (21120107)

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   , L0000025   , L0000026   , L0000027   , L0000028   ,   . . .   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M)
Y-COORD (M)   CONC   (YYMMDDHH)
- -
487666.96   3626784.52   74.81470 (21120107)   487686.96
3626784.52   78.79562 (21120107)
487706.96   3626784.52   83.71500 (21120107)   487726.96
3626784.52   87.83583 (21120107)
487746.96   3626784.52   93.28858 (21120107)   487766.96
3626784.52   100.37788 (21120107)
487786.96   3626784.52   107.83530 (21120107)   487806.96
3626784.52   113.71016 (21120107)
487826.96   3626784.52   119.80094 (21120107)   487846.96
3626784.52   126.23192 (21020701)
487866.96   3626784.52   133.88956 (21020701)   487886.96
3626784.52   140.63669 (21020701)
487906.96   3626784.52   145.20765 (21020701)   487926.96

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3626784.52      152.98389  (21020701)
        487946.96   3626784.52      159.90298  (19050905)                487966.96
3626784.52      174.63239  (20122119)
        487986.96   3626784.52      193.23443  (20122119)                488006.96
3626784.52      211.65310  (19121406)
        488026.96   3626784.52      240.17496  (19120404)                488046.96
3626784.52      250.34642  (19120405)
        487506.96   3626804.52       58.37914  (19122507)                487526.96
3626804.52       61.06396  (20040823)
        487546.96   3626804.52       61.61945  (21120107)                487566.96
3626804.52       64.62336  (21120107)
        487586.96   3626804.52       67.42296  (21120107)                487606.96
3626804.52       70.74727  (21120107)
        487626.96   3626804.52       74.92054  (21120107)                487646.96
3626804.52       77.54013  (21120107)
        487666.96   3626804.52       80.58304  (21120107)                487686.96
3626804.52       84.50207  (21120107)
        487706.96   3626804.52       89.47828  (21120107)                487726.96
3626804.52       92.40671  (21120107)
        487746.96   3626804.52       96.21157  (21120107)                487766.96
3626804.52      101.30864  (21020701)
        487786.96   3626804.52      108.31899  (21020701)                487806.96
3626804.52      114.67499  (21020701)
        487826.96   3626804.52      120.78239  (21020701)                487846.96
3626804.52      127.02010  (21020701)
        487866.96   3626804.52      133.12880  (21020701)                487886.96
3626804.52      136.61039  (19050905)
        487906.96   3626804.52      144.75823  (21090905)                487926.96
3626804.52      154.71143  (20122119)
        487946.96   3626804.52      167.74737  (20122119)                487966.96
3626804.52      181.85808  (19121406)
        487986.96   3626804.52      205.64525  (19120404)                487526.96
3626824.52       64.22146  (21120107)
        487546.96   3626824.52       67.31988  (21120107)                487566.96
3626824.52       70.18663  (21120107)
        487586.96   3626824.52       72.34564  (21120107)                487606.96
3626824.52       74.03273  (21120107)
        487626.96   3626824.52       77.58065  (21120107)                487646.96
3626824.52       80.01130  (21120107)
        487666.96   3626824.52       82.23261  (21120107)                487686.96
3626824.52       85.08288  (21120107)
        487706.96   3626824.52       89.29131  (21020701)                487726.96
3626824.52       94.98139  (21020701)
        487746.96   3626824.52      100.25000  (21020701)                487766.96
3626824.52      104.28533  (21020701)
        487786.96   3626824.52      107.20871  (21020701)                487806.96
3626824.52      111.72502  (19050905)
        487826.96   3626824.52      116.25256  (19050905)                487846.96
3626824.52      123.07558  (21090905)
        487866.96   3626824.52      132.10720  (21090905)                487886.96
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3626824.52   141.73858 (20122119)
487546.96   3626844.52   70.07562 (21120107)   487566.96
3626844.52   71.86459 (21120107)
487586.96   3626844.52   73.41864 (21120107)   487606.96
3626844.52   74.65289 (21120107)
487626.96   3626844.52   77.01137 (21020701)   487646.96
3626844.52   80.28442 (21020701)
487666.96   3626844.52   83.79618 (21020701)   487686.96
3626844.52   87.57039 (21020701)
487706.96   3626844.52   90.47189 (21020701)   487726.96
3626844.52   94.44019 (21020701)
487746.96   3626844.52   97.60285 (19050905)   487766.96
3626844.52   100.25511 (19050905)
487786.96   3626844.52   103.50476 (21090905)   487806.96
3626844.52   110.52627 (21090905)
487826.96   3626844.52   117.07242 (21090905)   487846.96
3626844.52   125.31332 (20122119)

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002
, L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010
, L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018
, L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   , L0000025   , L0000026
, L0000027   , L0000028   ,   . . .   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M)
Y-COORD (M)   CONC   (YYMMDDHH)
- -
487546.96   3626864.52   69.78216 (21120107)   487566.96
3626864.52   71.18807 (21020701)
487586.96   3626864.52   73.53365 (21020701)   487606.96
3626864.52   76.19741 (21020701)

487626.96 3626864.52 78.99372 (21020701) 487646.96
3626864.52 80.86144 (21020701)
487666.96 3626864.52 83.22747 (21020701) 487686.96
3626864.52 86.04182 (19050905)
487706.96 3626864.52 87.91449 (19050905) 487726.96
3626864.52 89.96564 (19050905)
487746.96 3626864.52 94.93886 (21090905) 487766.96
3626864.52 100.19397 (21090905)
487786.96 3626864.52 106.15244 (20122119) 487806.96
3626864.52 112.44992 (20122119)
487566.96 3626884.52 72.92708 (21020701) 487586.96
3626884.52 73.94469 (21020701)
487606.96 3626884.52 75.41499 (21020701) 487626.96
3626884.52 78.39662 (19050905)
487646.96 3626884.52 79.30652 (19050905) 487666.96
3626884.52 80.23040 (19050905)
487686.96 3626884.52 83.42316 (21090905) 487706.96
3626884.52 87.36299 (21090905)
487726.96 3626884.52 91.96734 (21090905) 487746.96
3626884.52 96.78785 (20122119)
487766.96 3626884.52 102.34905 (20122119) 487786.96
3626884.52 107.52367 (20122119)
487586.96 3626904.52 72.21416 (19050905) 487606.96
3626904.52 72.85530 (19050905)
487626.96 3626904.52 76.72516 (21100321) 487646.96
3626904.52 79.73187 (21100321)
487666.96 3626904.52 82.82550 (21090905) 487686.96
3626904.52 86.12969 (21090905)
487706.96 3626904.52 89.09319 (20122119) 487726.96
3626904.52 93.61163 (20122119)
487746.96 3626904.52 97.27469 (20122119) 487766.96
3626904.52 101.58280 (19121406)
487626.96 3626924.52 77.97216 (21100321) 487646.96
3626924.52 81.12252 (21100321)
487666.96 3626924.52 84.88703 (20122119) 487686.96
3626924.52 88.16070 (20122119)
487706.96 3626924.52 90.25172 (20122119) 487726.96
3626924.52 93.23092 (19121406)
487746.96 3626924.52 99.22855 (19121406) 487646.96
3626944.52 81.66220 (20122119)
487666.96 3626944.52 83.96240 (20122119) 487686.96
3626944.52 85.93166 (19121406)
487706.96 3626944.52 91.66447 (19121406) 487726.96
3626944.52 98.35531 (20031323)
487666.96 3626964.52 84.41125 (19121406) 487686.96
3626964.52 88.67320 (19121406)
487706.96 3626964.52 98.25160 (20031323) 487686.96
3626984.52 96.81164 (20031323)
488242.19 3625436.42 36.41743 (19032623) 488262.19
3625436.42 38.59408 (19032623)

488242.19   3625456.42   37.24389 (19032623)   488262.19
3625456.42   39.36044 (19032623)
488282.19   3625456.42   38.49313 (19032623)   488302.19
3625456.42   36.97404 (21080305)
488322.19   3625456.42   37.33328 (19110723)   488242.19
3625476.42   38.09663 (19032623)
488262.19   3625476.42   40.14546 (19032623)   488282.19
3625476.42   39.08680 (19032623)
488302.19   3625476.42   37.81083 (21080305)   488322.19
3625476.42   38.19072 (19110723)
488342.19   3625476.42   37.57783 (20091122)   488362.19
3625476.42   38.22481 (19080704)
488242.19   3625496.42   38.97667 (19032623)   488262.19
3625496.42   40.94976 (19032623)
488282.19   3625496.42   39.68626 (19032623)   488302.19
3625496.42   38.65463 (21080305)
488322.19   3625496.42   39.04409 (19110723)   488342.19
3625496.42   38.44338 (20091122)
488362.19   3625496.42   39.59367 (19080704)   488382.19
3625496.42   42.10258 (19080704)
488402.19   3625496.42   41.09802 (19080704)   488422.19
3625496.42   37.55741 (20070402)
488242.19   3625516.42   39.88499 (19032623)   488262.19
3625516.42   41.77351 (19032623)
488282.19   3625516.42   40.29045 (19032623)   488302.19
3625516.42   39.52531 (21080305)

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002
, L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010
, L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018
, L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   , L0000025   , L0000026
, L0000027   , L0000028   ,   . . .   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488322.19	3625516.42	39.91108	(19110723)	488342.19	3625516.42	39.31689	(20091122)
488362.19	3625516.42	40.96055	(19080704)	488382.19	3625516.42	43.01718	(19080704)
488402.19	3625516.42	41.39786	(19080704)	488422.19	3625516.42	38.40823	(20070402)
488442.19	3625516.42	37.23616	(20070402)	488462.19	3625516.42	37.05504	(21091105)
488482.19	3625516.42	37.11054	(20021420)	488222.19	3625536.42	39.97376	(21011221)
488242.19	3625536.42	40.82288	(19032623)	488262.19	3625536.42	42.61725	(19032623)
488282.19	3625536.42	40.89908	(19032623)	488302.19	3625536.42	40.41676	(21080305)
488322.19	3625536.42	40.78081	(19110723)	488342.19	3625536.42	40.18566	(20091122)
488362.19	3625536.42	42.31860	(19080704)	488382.19	3625536.42	43.87080	(19080704)
488402.19	3625536.42	41.59881	(19080704)	488422.19	3625536.42	39.18113	(20070402)
488442.19	3625536.42	37.67923	(20072602)	488462.19	3625536.42	37.91134	(21091105)
488482.19	3625536.42	37.91025	(20021420)	488502.19	3625536.42	38.67700	(19100724)
488522.19	3625536.42	39.81333	(19052822)	488542.19	3625536.42	41.66305	(19052822)
488222.19	3625556.42	40.89038	(21011221)	488242.19	3625556.42	41.79177	(19032623)
488262.19	3625556.42	43.48157	(19032623)	488282.19	3625556.42	41.51250	(19032623)
488302.19	3625556.42	41.31032	(21080305)	488322.19	3625556.42	41.64178	(19110723)
488342.19	3625556.42	41.03460	(20091122)	488362.19	3625556.42	43.66164	(19080704)
488382.19	3625556.42	44.65595	(19080704)	488402.19	3625556.42	41.69519	(19080704)
488422.19	3625556.42	39.86663	(20070402)	488442.19	3625556.42	38.37548	(20072602)
488462.19	3625556.42	38.68442	(21091105)	488482.19	3625556.42	38.82487	(19100724)
488502.19	3625556.42	39.72372	(21110719)	488522.19	3625556.42	41.54619	(19052822)
488542.19	3625556.42	42.45603	(19052822)	488562.19	3625556.42	40.05809	(19052822)
488202.19	3625576.42	42.31519	(20050606)	488222.19			

```
3625576.42       41.82623  (21011221)
        488242.19   3625576.42       42.79258  (19032623)                488262.19
3625576.42       44.36662  (19032623)
        488282.19   3625576.42       42.12967  (19032623)                488302.19
3625576.42       42.21684  (21080305)
        488322.19   3625576.42       42.49950  (19110723)                488342.19
3625576.42       41.86560  (20091122)
        488362.19   3625576.42       44.97995  (19080704)                488382.19
3625576.42       45.35989  (19080704)
        488402.19   3625576.42       41.67640  (19080704)                488422.19
3625576.42       40.44914  (20070402)
        488442.19   3625576.42       39.52134  (21091105)                488462.19
3625576.42       39.45877  (19082401)
        488482.19   3625576.42       40.07610  (19100724)                488502.19
3625576.42       41.06560  (21110719)
        488522.19   3625576.42       43.07374  (19052822)                488542.19
3625576.42       42.94465  (19052822)
        488562.19   3625576.42       40.10263  (19032522)                488582.19
3625576.42       40.10640  (19101221)
        488122.19   3625596.42       42.61748  (21102122)                488142.19
3625596.42       42.61338  (20111220)
        488162.19   3625596.42       43.78888  (19100801)                488182.19
3625596.42       43.98995  (20113019)
        488202.19   3625596.42       43.27052  (20050606)                488222.19
3625596.42       42.78769  (21011221)
        488242.19   3625596.42       43.82666  (19032623)                488262.19
3625596.42       45.27281  (19032623)
        488282.19   3625596.42       42.74975  (19032623)                488302.19
3625596.42       43.13231  (21080305)
        488322.19   3625596.42       43.35116  (19110723)                488342.19
3625596.42       42.68697  (20011019)
        488362.19   3625596.42       46.26357  (19080704)                488382.19
3625596.42       45.97170  (19080704)
        488402.19   3625596.42       41.54392  (20070402)                488422.19
3625596.42       40.91627  (20070402)
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                      ***       11:15:09

                                  PAGE  48
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                              *** THE   1ST HIGHEST  1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: ALL       ***
                                  INCLUDING SOURCE(S):     L0000001    , L0000002
, L0000003    , L0000004   ,   L0000005    ,
                 L0000006    , L0000007    , L0000008    , L0000009    , L0000010
, L0000011    , L0000012   ,   L0000013    ,
                 L0000014    , L0000015    , L0000016    , L0000017    , L0000018
```

, L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026
, L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488522.19	3625596.42	44.34969	(19052822)	488542.19	3625596.42	43.09860	(19052822)
488562.19	3625596.42	41.30505	(19101221)	488582.19	3625596.42	40.82380	(20011720)
488602.19	3625596.42	40.47854	(21082504)	488062.19	3625616.42	43.08954	(20021423)
488082.19	3625616.42	43.13330	(20090823)	488102.19	3625616.42	43.38931	(20021323)
488122.19	3625616.42	43.39349	(21102122)	488142.19	3625616.42	43.48325	(20111220)
488162.19	3625616.42	44.71301	(19100801)	488182.19	3625616.42	44.93957	(20113019)
488202.19	3625616.42	44.24791	(20050606)	488222.19	3625616.42	43.78080	(21011221)
488242.19	3625616.42	44.89636	(19032623)	488262.19	3625616.42	46.20148	(19032623)
488282.19	3625616.42	43.68413	(21080305)	488302.19	3625616.42	44.11848	(19110723)
488322.19	3625616.42	44.19190	(19110723)	488342.19	3625616.42	44.05222	(19080704)
488362.19	3625616.42	47.49967	(19080704)	488382.19	3625616.42	46.47941	(19080704)
488402.19	3625616.42	42.58565	(20070402)	488522.19	3625616.42	45.32889	(19052822)
488542.19	3625616.42	42.89434	(19052822)	488562.19	3625616.42	42.24587	(19101221)
488582.19	3625616.42	41.75859	(20011720)	488602.19	3625616.42	41.45769	(21082504)
488062.19	3625636.42	44.06920	(20021423)	488082.19	3625636.42	44.13162	(20090823)
488102.19	3625636.42	44.41046	(20021323)	488122.19	3625636.42	44.17312	(21102122)
488142.19	3625636.42	44.37484	(21102122)	488162.19	3625636.42	45.66529	(19100801)
488182.19	3625636.42	45.92333	(20113019)	488202.19	3625636.42	45.25531	(20050606)

488222.19 3625636.42 44.80805 (21011221) 488242.19
3625636.42 46.00303 (19032623)
488262.19 3625636.42 47.15228 (19032623) 488282.19
3625636.42 44.87326 (21080305)
488302.19 3625636.42 45.29927 (19110723) 488322.19
3625636.42 45.01750 (19110723)
488342.19 3625636.42 45.77374 (19080704) 488362.19
3625636.42 48.67760 (19080704)
488382.19 3625636.42 46.87223 (19080704) 488522.19
3625636.42 45.96823 (19052822)
488542.19 3625636.42 42.94148 (19032522) 488562.19
3625636.42 42.85771 (19101221)
488582.19 3625636.42 42.31924 (20011720) 488602.19
3625636.42 42.05041 (21082504)
488622.19 3625636.42 40.85541 (21082623) 488062.19
3625656.42 45.01763 (20021423)
488082.19 3625656.42 45.11630 (20090823) 488102.19
3625656.42 45.43107 (20021323)
488122.19 3625656.42 44.95490 (21102122) 488142.19
3625656.42 45.43582 (21102122)
488162.19 3625656.42 46.64669 (19100801) 488182.19
3625656.42 46.94297 (20113019)
488202.19 3625656.42 46.29384 (20050606) 488222.19
3625656.42 45.87105 (21011221)
488242.19 3625656.42 47.14838 (19032623) 488262.19
3625656.42 48.12557 (19032623)
488282.19 3625656.42 46.09424 (21080305) 488302.19
3625656.42 46.49356 (19110723)
488322.19 3625656.42 46.09325 (20011019) 488342.19
3625656.42 47.49774 (19080704)
488362.19 3625656.42 49.78445 (19080704) 488382.19
3625656.42 47.13854 (19080704)
488522.19 3625656.42 46.22926 (19052822) 488542.19
3625656.42 44.26874 (19101221)
488582.19 3625656.42 43.44244 (21082504) 488602.19
3625656.42 42.21589 (21082504)
488622.19 3625656.42 42.16700 (21082623) 488642.19
3625656.42 42.81724 (19100803)
488062.19 3625676.42 45.93521 (20021423) 488082.19
3625676.42 46.08306 (20090823)
488102.19 3625676.42 46.45730 (19100222) 488122.19
3625676.42 45.73917 (21102122)
488142.19 3625676.42 46.52203 (21102122) 488162.19
3625676.42 47.65922 (19100801)

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026 , L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488182.19	3625676.42	48.00022	(20113019)	488202.19	3625676.42	47.36875	(20050606)
488222.19	3625676.42	46.97175	(21011221)	488242.19	3625676.42	48.33262	(19032623)
488262.19	3625676.42	49.12028	(19032623)	488282.19	3625676.42	47.34671	(21080305)
488302.19	3625676.42	47.70231	(19110723)	488322.19	3625676.42	47.28829	(20011019)
488342.19	3625676.42	49.21312	(19080704)	488362.19	3625676.42	50.80567	(19080704)
488382.19	3625676.42	47.26524	(19080704)	488582.19	3625676.42	44.35185	(21082504)
488602.19	3625676.42	42.61963	(21082623)	488622.19	3625676.42	43.33283	(19100803)
488642.19	3625676.42	45.05371	(20102522)	488062.19	3625696.42	46.80804	(20021423)
488082.19	3625696.42	47.02783	(20090823)	488102.19	3625696.42	47.54986	(19100222)
488122.19	3625696.42	46.52390	(21102122)	488142.19	3625696.42	47.63218	(21102122)
488162.19	3625696.42	48.70262	(19100801)	488182.19	3625696.42	49.09621	(20113019)
488202.19	3625696.42	48.48657	(20050606)	488222.19	3625696.42	48.11299	(21011221)
488242.19	3625696.42	49.55887	(19032623)	488262.19	3625696.42	50.13836	(19032623)
488282.19	3625696.42	48.62844	(21080305)	488302.19			

3625696.42 48.92534 (19110723)
488322.19 3625696.42 48.47784 (20011019) 488342.19
3625696.42 50.90838 (19080704)
488362.19 3625696.42 51.72688 (19080704) 488382.19
3625696.42 47.24382 (19080704)
488582.19 3625696.42 44.80903 (21082504) 488602.19
3625696.42 44.21997 (21082623)
488622.19 3625696.42 44.97916 (19100803) 488642.19
3625696.42 46.93231 (20102522)
488662.19 3625696.42 46.00126 (20102522) 488042.19
3625716.42 46.82417 (20112124)
488142.19 3625716.42 48.76588 (21102122) 488162.19
3625716.42 49.77756 (19100801)
488182.19 3625716.42 50.23257 (20113019) 488202.19
3625716.42 49.65071 (20050606)
488222.19 3625716.42 49.30168 (21011221) 488242.19
3625716.42 50.82953 (19032623)
488262.19 3625716.42 51.18057 (19032623) 488282.19
3625716.42 49.93902 (21080305)
488302.19 3625716.42 50.16041 (19110723) 488322.19
3625716.42 49.65427 (20011019)
488342.19 3625716.42 52.57010 (19080704) 488362.19
3625716.42 52.53232 (19080704)
488382.19 3625716.42 47.89912 (19101301) 488602.19
3625716.42 45.36270 (21082623)
488622.19 3625716.42 46.94889 (20102522) 488642.19
3625716.42 48.06071 (20102522)
488662.19 3625716.42 46.00904 (19082901) 488682.19
3625716.42 47.07704 (19082901)
488022.19 3625736.42 48.22306 (20021922) 488042.19
3625736.42 47.97249 (20112124)
488182.19 3625736.42 51.41131 (20113019) 488202.19
3625736.42 50.86308 (21090305)
488222.19 3625736.42 50.53850 (21011221) 488242.19
3625736.42 52.14386 (19032623)
488262.19 3625736.42 52.24381 (19032623) 488282.19
3625736.42 51.28148 (21080305)
488302.19 3625736.42 51.39996 (19110723) 488322.19
3625736.42 50.81500 (20011019)
488362.19 3625736.42 53.20617 (19080704) 488382.19
3625736.42 48.80411 (20070402)
488402.19 3625736.42 48.13614 (21091105) 488602.19
3625736.42 47.29252 (19100803)
488622.19 3625736.42 49.11043 (20102522) 488642.19
3625736.42 48.34188 (20102522)
488662.19 3625736.42 48.13171 (19082901) 488682.19
3625736.42 47.30965 (19082901)
488702.19 3625736.42 43.08293 (19082901) 488002.19
3625756.42 49.56933 (21120123)
488022.19 3625756.42 49.14086 (20021922) 488182.19

3625756.42   52.63502 (20113019)
        488202.19   3625756.42   52.14611 (21090305)   488222.19
3625756.42   51.82889 (21011221)

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   , L0000025   , L0000026   , L0000027   , L0000028   ,   . . .   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488242.19	3625756.42	53.50574	(19032623)	488262.19	3625756.42	53.33027	(19032623)
488282.19	3625756.42	52.64425	(21080305)	488382.19	3625756.42	49.86143	(20070402)
488602.19	3625756.42	48.96260	(20102522)	488622.19	3625756.42	50.46267	(20102522)
488642.19	3625756.42	48.26966	(19082901)	488662.19	3625756.42	49.34719	(19082901)
488682.19	3625756.42	46.55499	(19082901)	488702.19	3625756.42	43.85179	(21102121)
487982.19	3625776.42	49.20563	(21120123)	488002.19	3625776.42	50.87187	(21120123)
488222.19	3625776.42	53.17762	(21011221)	488242.19	3625776.42	54.91854	(19032623)
488262.19	3625776.42	54.44109	(19032623)	488622.19	3625776.42	50.88586	(20102522)
488642.19	3625776.42	50.54395	(19082901)	488662.19	3625776.42	49.53547	(19082901)

488682.19 3625776.42 45.17524 (21102121) 488702.19
3625776.42 44.62615 (19011021)
488722.19 3625776.42 43.79208 (19011021) 487982.19
3625796.42 49.66066 (20030603)
488222.19 3625796.42 54.58657 (21011221) 488242.19
3625796.42 56.38279 (19032623)
488262.19 3625796.42 55.57509 (19032623) 488622.19
3625796.42 50.73193 (19082901)
488642.19 3625796.42 51.81366 (19082901) 488662.19
3625796.42 48.63736 (19082901)
488682.19 3625796.42 46.25428 (21102121) 488702.19
3625796.42 45.63698 (19011021)
488722.19 3625796.42 44.84604 (21060824) 488742.19
3625796.42 45.14522 (21060824)
488222.19 3625816.42 56.06007 (21011221) 488242.19
3625816.42 57.90142 (19032623)
488262.19 3625816.42 56.73317 (19032623) 488642.19
3625816.42 51.94483 (19082901)
488662.19 3625816.42 47.82848 (21102121) 488682.19
3625816.42 47.16935 (19032622)
488702.19 3625816.42 46.23269 (19082503) 488722.19
3625816.42 46.56669 (21060824)
488742.19 3625816.42 46.61933 (21081502) 488762.19
3625816.42 45.29372 (21081502)
488202.19 3625836.42 57.88241 (21090305) 488222.19
3625836.42 57.60359 (21011221)
488242.19 3625836.42 59.47780 (19032623) 488662.19
3625836.42 48.83084 (21102121)
488682.19 3625836.42 48.09458 (19032622) 488702.19
3625836.42 47.67505 (21060824)
488722.19 3625836.42 47.58719 (21081502) 488742.19
3625836.42 47.26129 (21081502)
488762.19 3625836.42 45.50234 (20071101) 488782.19
3625836.42 45.28783 (20071101)
488202.19 3625856.42 59.48861 (21090305) 488222.19
3625856.42 59.21690 (21011221)
488242.19 3625856.42 61.10758 (19032623) 488682.19
3625856.42 48.99288 (19082503)
488702.19 3625856.42 49.10414 (21060824) 488722.19
3625856.42 48.99272 (21081502)
488742.19 3625856.42 46.77286 (19032804) 488762.19
3625856.42 46.88741 (20071101)
488782.19 3625856.42 46.14000 (20081023) 488802.19
3625856.42 45.22067 (20112119)
488822.19 3625856.42 44.01149 (19101422) 488202.19
3625876.42 61.16304 (21090305)
488222.19 3625876.42 60.90593 (21011221) 488662.19
3625876.42 50.78482 (19032622)
488682.19 3625876.42 50.61903 (21060824) 488702.19
3625876.42 50.42144 (21081502)

```
        488722.19   3625876.42       49.00551  (21081502)                488742.19
3625876.42       48.36805  (20071101)
        488762.19   3625876.42       47.48144  (20081023)                488782.19
3625876.42       46.63754  (20112119)
        488802.19   3625876.42       45.65205  (20112119)                488822.19
3625876.42       44.52526  (19101422)
        488842.19   3625876.42       43.01281  (20100520)                488202.19
3625896.42       62.92244  (21090305)
        488222.19   3625896.42       62.67494  (21011221)                488642.19
3625896.42       53.11731  (19032622)
        488662.19   3625896.42       51.90515  (19082503)                488682.19
3625896.42       51.66206  (21060824)
```



```
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                              *** THE   1ST HIGHEST  1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: ALL      ***
                                  INCLUDING SOURCE(S):     L0000001    , L0000002
, L0000003    , L0000004  ,   L0000005    ,
                 L0000006    , L0000007    , L0000008    , L0000009    , L0000010
, L0000011    , L0000012  ,   L0000013    ,
                 L0000014    , L0000015    , L0000016    , L0000017    , L0000018
, L0000019    , L0000020  ,   L0000021    ,
                 L0000022    , L0000023    , L0000024    , L0000025    , L0000026
, L0000027    , L0000028  ,   . . .       ,

                                          ***   DISCRETE CARTESIAN RECEPTOR POINTS
***

                                     **   CONC OF PM_10    IN MICROGRAMS/M**3
                   **

      X-COORD (M)  Y-COORD (M)       CONC      (YYMMDDHH)              X-COORD (M)
Y-COORD (M)       CONC      (YYMMDDHH)
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - - - -
        488702.19   3625896.42       51.23260  (21081502)                488722.19
3625896.42       49.69502  (20071101)
        488742.19   3625896.42       49.13872  (20071101)                488762.19
3625896.42       48.19823  (20081023)
        488782.19   3625896.42       47.48047  (20112119)                488802.19
3625896.42       46.15544  (19101422)
        488822.19   3625896.42       44.47559  (20100520)                488842.19
3625896.42       43.92573  (19050206)
        488862.19   3625896.42       43.78233  (20071102)                488882.19
```

3625896.42 43.45350 (20081323)
488902.19 3625896.42 42.41257 (20081323) 488202.19
3625916.42 64.77036 (21090305)
488222.19 3625916.42 64.53432 (21011221) 488642.19
3625916.42 53.94415 (19082503)
488662.19 3625916.42 53.65563 (21060824) 488682.19
3625916.42 53.18741 (21081502)
488702.19 3625916.42 50.89716 (21082922) 488762.19
3625916.42 49.29486 (20112119)
488782.19 3625916.42 47.79063 (19101422) 488802.19
3625916.42 45.95584 (20100520)
488822.19 3625916.42 45.44943 (19050206) 488842.19
3625916.42 45.07878 (20071102)
488862.19 3625916.42 44.75112 (20081323) 488882.19
3625916.42 43.81076 (20081323)
488902.19 3625916.42 42.83202 (19092021) 488922.19
3625916.42 42.14543 (19101420)
488942.19 3625916.42 42.42956 (19042003) 488222.19
3625936.42 66.49305 (21011221)
488622.19 3625936.42 56.40620 (19032622) 488642.19
3625936.42 55.32421 (19100804)
488662.19 3625936.42 54.78711 (21081502) 488682.19
3625936.42 53.26408 (21081502)
488782.19 3625936.42 47.71530 (19101422) 488802.19
3625936.42 47.01728 (19050206)
488822.19 3625936.42 46.44556 (19091122) 488842.19
3625936.42 46.09839 (20081323)
488862.19 3625936.42 45.27400 (20081323) 488882.19
3625936.42 44.18052 (19092021)
488902.19 3625936.42 43.41035 (19101420) 488922.19
3625936.42 43.73661 (19042003)
488942.19 3625936.42 44.35868 (19042003) 488962.19
3625936.42 43.52086 (19042003)
488982.19 3625936.42 41.37164 (19042003) 489002.19
3625936.42 39.56348 (20082723)
488602.19 3625956.42 58.80596 (19032622) 488622.19
3625956.42 57.49319 (19082503)
488642.19 3625956.42 56.87449 (19100804) 488662.19
3625956.42 55.81123 (21081502)
488782.19 3625956.42 48.62156 (19050206) 488802.19
3625956.42 47.88454 (19091122)
488822.19 3625956.42 47.49648 (20081323) 488842.19
3625956.42 46.80467 (20081323)
488862.19 3625956.42 45.59481 (19092021) 488882.19
3625956.42 44.73863 (19101420)
488902.19 3625956.42 45.10592 (19042003) 488922.19
3625956.42 45.70844 (19042003)
488942.19 3625956.42 44.77169 (19042003) 488962.19
3625956.42 42.45929 (19042003)
488982.19 3625956.42 40.73146 (20082723) 489002.19

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3625956.42       39.76998  (19082501)
        489022.19   3625956.42       39.34552  (21070304)                489042.19
3625956.42       39.20684  (21070304)
        489062.19   3625956.42       38.10005  (21070304)                489082.19
3625956.42       37.26091  (20101020)
        488622.19   3625976.42       59.22541  (19100804)                488802.19
3625976.42       48.94775  (20081323)
        488822.19   3625976.42       48.40769  (20081323)                488842.19
3625976.42       47.08062  (19092021)
        488862.19   3625976.42       46.13568  (19101420)                488882.19
3625976.42       46.54448  (19042003)
        488902.19   3625976.42       47.11993  (19042003)                488922.19
3625976.42       46.07366  (19042003)
        488942.19   3625976.42       43.58657  (19042003)                488962.19
3625976.42       41.93742  (20082723)
        488982.19   3625976.42       40.95881  (19082501)                489002.19
3625976.42       40.58514  (21070304)
        489022.19   3625976.42       40.23818  (21070304)                489042.19
3625976.42       38.98277  (20101020)
        489062.19   3625976.42       38.15014  (20101020)                489082.19
3625976.42       37.53592  (19030322)
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```
                               *** THE   1ST HIGHEST  1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP:  ALL      ***
                                  INCLUDING SOURCE(S):     L0000001    , L0000002
, L0000003    , L0000004   ,   L0000005    ,
                 L0000006    , L0000007    , L0000008    , L0000009    , L0000010
, L0000011    , L0000012   ,   L0000013    ,
                 L0000014    , L0000015    , L0000016    , L0000017    , L0000018
, L0000019    , L0000020   ,   L0000021    ,
                 L0000022    , L0000023    , L0000024    , L0000025    , L0000026
, L0000027    , L0000028   ,    . . .      ,

                                             ***   DISCRETE CARTESIAN RECEPTOR POINTS
***

                                        **   CONC OF PM_10    IN MICROGRAMS/M**3
                   **

      X-COORD (M)  Y-COORD (M)       CONC      (YYMMDDHH)              X-COORD (M)
Y-COORD (M)       CONC     (YYMMDDHH)
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - - - -
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489102.19 3625976.42 36.55134 (20071024) 489122.19
3625976.42 36.10654 (21020920)
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488842.19 3625996.42 47.65070 (21080202) 488922.19
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488942.19 3625996.42 43.18182 (20082723) 488962.19
3625996.42 42.18109 (19082501)
488982.19 3625996.42 41.84975 (21070304) 489002.19
3625996.42 41.27429 (21070304)
489022.19 3625996.42 40.09908 (20101020) 489042.19
3625996.42 39.01737 (20101020)
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3625996.42 37.61478 (20071024)
489102.19 3625996.42 37.30572 (21020920) 489122.19
3625996.42 36.89934 (21020920)
489142.19 3625996.42 36.26633 (20062624) 488802.19
3626016.42 50.28008 (19092021)
488822.19 3626016.42 49.26151 (21080202) 488842.19
3626016.42 49.65319 (19042003)
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3626016.42 41.21230 (20101020)
489022.19 3626016.42 39.94039 (19030322) 489042.19
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489102.19 3626016.42 37.78422 (21020920) 489122.19
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3626036.42 51.33063 (19042003)
488842.19 3626036.42 51.79062 (19042003) 489042.19
3626036.42 39.84608 (21090222)
489062.19 3626036.42 39.58740 (21020920) 489082.19
3626036.42 38.75306 (21073002)
489102.19 3626036.42 38.25519 (21073002) 489122.19
3626036.42 37.10903 (20062624)
489142.19 3626036.42 36.00332 (20102322) 488782.19
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488802.19 3626056.42 53.10570 (19042003) 488822.19
3626056.42 53.50679 (19042003)
488842.19 3626056.42 51.89928 (19042003) 489042.19
3626056.42 40.64488 (21020920)
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489102.19 3626056.42 37.74365 (20102322) 489122.19
3626056.42 36.83216 (19050724)
489142.19 3626056.42 37.43772 (19042005) 489162.19
3626056.42 37.54655 (19042005)

488782.19 3626076.42 54.98246 (19042003) 488802.19
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488822.19 3626076.42 53.52972 (19042003) 488842.19
3626076.42 50.19685 (20041924)
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488782.19 3626116.42 57.05371 (19042003) 488802.19
3626116.42 53.35676 (20041924)
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3626116.42 41.63774 (19042005)
489082.19 3626116.42 41.25476 (19042005) 489102.19
3626116.42 40.19281 (19042005)

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002
, L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010
, L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018
, L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026
, L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS

***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
489122.19	3626116.42	38.57339	(20120918)	489142.19	3626116.42	37.46160	(19080723)
489162.19	3626116.42	36.87829	(20031420)	489182.19	3626116.42	35.83866	(20031420)
488782.19	3626136.42	55.14315	(20082723)	488802.19	3626136.42	54.14239	(20080822)
488822.19	3626136.42	52.59644	(21070304)	488842.19	3626136.42	51.20799	(21070304)
488862.19	3626136.42	49.96460	(20101020)	489082.19	3626136.42	40.65530	(19042005)
489102.19	3626136.42	39.32717	(20120918)	489122.19	3626136.42	38.50049	(19080723)
489142.19	3626136.42	37.48903	(20031420)	489162.19	3626136.42	36.20439	(19083123)
489182.19	3626136.42	35.67847	(20090222)	488782.19	3626156.42	56.16613	(20080822)
488802.19	3626156.42	54.35999	(21070304)	488822.19	3626156.42	52.88057	(20101020)
488842.19	3626156.42	51.33986	(20101020)	488862.19	3626156.42	49.96831	(20071024)
488882.19	3626156.42	49.63741	(21090222)	489102.19	3626156.42	39.31112	(19080723)
489122.19	3626156.42	37.89418	(19083123)	489142.19	3626156.42	37.18580	(20090222)
489162.19	3626156.42	36.70656	(20090222)	489182.19	3626156.42	35.82952	(20090222)
488782.19	3626176.42	56.23287	(19101020)	488802.19	3626176.42	54.68628	(21090402)
488822.19	3626176.42	52.82664	(20011318)	488842.19	3626176.42	51.80797	(21090624)
488862.19	3626176.42	51.51752	(21090222)	488882.19	3626176.42	50.43787	(21090222)
489122.19	3626176.42	38.33840	(20090222)	489142.19	3626176.42	37.46466	(20090222)
489162.19	3626176.42	36.30292	(21083022)	489182.19	3626176.42	35.87849	(19042004)
488782.19	3626196.42	56.67202	(21090402)	488802.19	3626196.42	54.64378	(20011318)
488822.19	3626196.42	53.72747	(21090222)	488842.19	3626196.42	53.34948	(21090222)
488862.19	3626196.42	52.05418	(20080522)	488882.19			

```
3626196.42       50.79010  (20080522)
        488902.19   3626196.42       48.96885  (20102322)                489142.19
3626196.42       37.52749  (19042004)
        489162.19   3626196.42       37.59273  (19042004)                489182.19
3626196.42       37.32323  (19042004)
        489202.19   3626196.42       36.73376  (19042004)                488782.19
3626216.42       56.79382  (21090624)
        488802.19   3626216.42       55.99666  (21090222)                488822.19
3626216.42       55.11535  (21090222)
        488842.19   3626216.42       53.86481  (20080522)                488862.19
3626216.42       52.05370  (20080522)
        488882.19   3626216.42       50.26308  (20102322)                488902.19
3626216.42       50.15214  (19042005)
        489142.19   3626216.42       39.03157  (19042004)                489162.19
3626216.42       38.37561  (19042004)
        489182.19   3626216.42       37.39537  (19042004)                489202.19
3626216.42       36.12755  (19042004)
        489222.19   3626216.42       34.61310  (19042004)                489242.19
3626216.42       33.86052  (21100604)
        489262.19   3626216.42       33.45648  (21100604)                488782.19
3626236.42       58.24010  (21090222)
        488802.19   3626236.42       56.81217  (20080522)                488822.19
3626236.42       55.56895  (20080522)
        488842.19   3626236.42       53.43243  (21092401)                488862.19
3626236.42       52.05217  (19042005)
        488882.19   3626236.42       52.08922  (19042005)                488902.19
3626236.42       51.10690  (19042005)
        489142.19   3626236.42       39.05366  (19042004)                489162.19
3626236.42       37.66246  (19042004)
        489182.19   3626236.42       36.00101  (19042004)                489202.19
3626236.42       35.34432  (21100604)
        489222.19   3626236.42       34.84060  (21100604)                489242.19
3626236.42       34.09600  (21100604)
        489262.19   3626236.42       33.11341  (21100604)                488782.19
3626256.42       59.00072  (20080522)
        488802.19   3626256.42       57.13548  (20080522)                488822.19
3626256.42       55.02878  (21092401)
        488842.19   3626256.42       54.38028  (19042005)                488862.19
3626256.42       53.80861  (19042005)
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                              *** THE   1ST HIGHEST  1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP:  ALL      ***
                                 INCLUDING SOURCE(S):     L0000001    , L0000002
```

, L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010
, L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018
, L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 , L0000025 , L0000026
, L0000027 , L0000028 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488882.19	3626256.42	52.16144	(19042005)	488902.19	3626256.42	50.19698	(20120918)
488922.19	3626256.42	49.01765	(19080723)	489142.19	3626256.42	37.48744	(19042004)
489162.19	3626256.42	36.86780	(21100604)	489222.19	3626256.42	34.29322	(21100604)
489242.19	3626256.42	34.02800	(19092701)	489262.19	3626256.42	33.70341	(19092701)
488882.19	3626276.42	51.64523	(19080723)	488902.19	3626276.42	50.09046	(19080723)
488922.19	3626276.42	48.67701	(19083123)	489142.19	3626276.42	37.80461	(21100604)
489162.19	3626276.42	36.66172	(21100604)	489242.19	3626276.42	34.47790	(19092701)
489262.19	3626276.42	33.86972	(19060822)	488882.19	3626296.42	51.43918	(19083123)
488902.19	3626296.42	49.82949	(20090222)	489262.19	3626296.42	33.89457	(19060822)
489282.19	3626296.42	33.09851	(19083024)	488902.19	3626316.42	50.35391	(19042004)
489282.19	3626316.42	32.75773	(21081521)	489302.19	3626316.42	32.17784	(21081521)
488902.19	3626336.42	52.51306	(19042004)	488922.19	3626336.42	51.30917	(19042004)
489302.19	3626336.42	32.40989	(20083021)	489322.19	3626336.42	31.73402	(20083021)
488922.19	3626356.42	49.78198	(19042004)	488942.19	3626356.42	47.94043	(21062024)
489322.19	3626356.42	32.11593	(21070101)	488942.19	3626376.42	47.32381	(21062024)
488962.19	3626376.42	46.61423	(20062701)	489322.19	3626376.42	32.16445	(19073123)

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        489342.19   3626376.42       31.60508  (19072303)                  488962.19
3626396.42       46.65005  (19060822)
        489322.19   3626396.42       32.55608  (19072303)                  489342.19
3626396.42       31.91759  (19072303)
        489342.19   3626416.42       31.78816  (19043020)                  489342.19
3626436.42       31.64586  (21072101)
        486721.80   3628652.61       15.91815  (19050624)                  486669.50
3628628.55       15.62104  (21122522)
        486698.79   3628698.63       15.72121  (19050624)                  486713.43
3628699.68       15.94296  (19050624)
        486757.36   3628723.73       15.69840  (20122824)                  486803.39
3628721.64       15.31915  (20122824)
        486732.26   3628704.91       15.96806  (19050624)                  486505.52
3627649.40       20.31778  (20032220)
        486498.72   3627624.46       20.04454  (21100322)                  486467.73
3627650.15       19.69037  (20032220)
        486460.18   3627619.17       19.34690  (21100322)                  488395.14
3627250.20       28.90167  (21071022)
        488707.71   3626756.74       56.48742  (19122419)                  488748.32
3626767.81       50.55450  (19122419)
        488796.31   3626745.66       66.11578  (19122419)                  488284.66
3628205.50       26.22320  (20031023)
        488310.04   3628227.57       26.58345  (20031023)                  488291.28
3628261.78       25.32151  (20031023)
        488257.07   3628245.23       23.74070  (19120420)                  488310.04
3628201.09       27.10907  (20031023)
        488301.21   3628169.09       27.78141  (20031023)                  488343.14
3628192.26       25.12501  (20031023)
        487535.35   3626865.62       69.99559  (21120107)                  487693.75
3626992.77      101.38807  (20031323)
        487795.04   3626883.94      108.96790  (20122119)                  487871.55
3626830.06      134.94120  (20122119)
        487958.83   3626811.74      180.30628  (19121406)                  488041.80
3626794.50      273.18003  (19120405)
        488094.61   3626765.41      388.63742  (19120716)                  488046.12
3626714.76      198.85918  (21112423)
        488007.32   3626665.19      155.24529  (19040823)                  487941.59
3626599.46      116.55050  (19021102)
        487911.42   3626574.68      106.00288  (19021102)                  487815.52
3626540.19       79.74110  (19021102)
        487709.91   3626504.63       54.89001  (19021102)                  487555.82
3626439.98       45.68451  (19021102)
        487490.09   3626487.39       61.52529  (20121705)                  487428.67
3626556.36       75.35114  (20122123)
        487358.63   3626713.68       55.36575  (20012319)                  487522.42
3626827.90       64.15646  (21120107)
        488235.45   3625424.52       35.41094  (20091504)                  488562.08
3625540.85       40.29318  (19052822)
```

*** MODELOPTs: RegDFAULT CONC ELEV URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   , L0000025   , L0000026   , L0000027   , L0000028   ,   . . .   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488747.03	3625794.41	44.95005	(21081502)	488857.40	3625879.42	42.75378	(19050206)
489054.28	3625949.52	38.67461	(21070304)	489134.82	3625964.44	35.42313	(20012621)
489178.07	3626085.25	36.24835	(20120918)	489203.43	3626198.60	36.68517	(19042004)
489260.10	3626203.08	33.02757	(21071622)	489276.51	3626217.99	33.00557	(21100604)
489267.56	3626265.72	33.65022	(19092701)	489336.17	3626346.26	31.66097	(21070101)
489361.53	3626432.77	31.04722	(21072101)	489331.70	3626449.18	31.59370	(21072101)
489309.32	3626361.18	32.43122	(21070101)	489258.61	3626298.53	33.97155	(19060822)
489190.00	3626228.43	36.11634	(19042004)	489149.73	3626317.92	37.61169	(19060822)
489130.34	3626250.81	39.04487	(19042004)	489137.80	3626216.50	39.13249	(19042004)
489054.28	3626106.13	40.42852	(19042005)	489036.38	3626036.03	39.91597	(20071024)
488921.53	3625997.25	44.77617	(19042003)	488846.96	3625983.83	46.93037	(21080202)
488872.31	3626110.61	49.05511	(21070304)	488902.14			

3626194.13   48.95523 (20102322)
        488931.97   3626270.20   48.05829 (19083123)   488908.77
3626298.76   49.47424 (20090222)
        488936.81   3626348.34   48.91498 (19042004)   488971.36
3626378.01   46.29017 (20062701)
        488968.11   3626409.72   46.59028 (19083024)   488903.08
3626355.25   52.24844 (19042004)
        488864.87   3626256.49   53.65030 (19042005)   488763.27
3626259.34   60.42168 (21090222)
        488787.87   3625962.95   48.74886 (19050206)   488735.67
3625906.27   49.81573 (20071101)
        488620.82   3625988.31   60.15107 (19100804)   488588.00
3625956.98   59.52352 (20052505)
        488671.53   3625861.52   49.56735 (19032622)   488629.77
3625813.79   53.09952 (19082901)
        488588.00   3625746.67   47.17622 (21082623)   488571.59
3625648.23   43.25803 (20011720)
        488516.41   3625666.13   47.13900 (19052822)   488522.37
3625581.11   43.40970 (19052822)
        488431.39   3625576.63   39.38954 (20070402)   488447.79
3625615.41   41.47903 (21091105)
        488388.13   3625616.90   45.32996 (19080704)   488398.57
3625706.40   46.41641 (20070402)
        488406.03   3625745.18   49.17625 (21091105)   488392.60
3625776.50   50.79300 (21091105)
        488350.84   3625722.81   53.66946 (19080704)   488279.24
3625769.05   53.48872 (21080305)
        488282.23   3625807.83   56.27978 (21080305)   488246.43
3625851.08   60.87666 (19032623)
        488230.02   3625946.54   67.46933 (19032623)   488188.26
3625924.17   65.87615 (20113019)
        488213.62   3625757.11   51.80237 (21090305)   488170.36
3625779.49   54.19131 (19100801)
        488170.36   3625733.25   51.27204 (19100801)   488077.88
3625697.45   46.88790 (20021423)
        487973.47   3625822.74   50.49019 (19111401)   487955.57
3625809.32   49.81957 (19111401)
        488058.49   3625678.06   45.78856 (20021423)   488057.00
3625618.40   43.21391 (20021423)
        488107.71   3625596.02   41.83797 (20021323)   488185.27
3625576.63   43.12660 (20113019)
        488228.53   3625528.90   39.60573 (21011221)   488233.01
3625482.66   37.53810 (21011221)

```
                                         *** THE SUMMARY OF MAXIMUM PERIOD ( 26304
HRS) RESULTS ***

                                     ** CONC OF PM_10    IN MICROGRAMS/M**3
             **

                        NETWORK
GROUP ID                           AVERAGE CONC                RECEPTOR  (XR, YR, ZELEV,
ZHILL, ZFLAG)  OF TYPE  GRID-ID
- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - -

ALL       1ST HIGHEST VALUE IS      45.71644 AT (  488094.61,  3626765.41,    19.58,
  123.49,   0.00)  DC
          2ND HIGHEST VALUE IS      42.11659 AT (  488086.96,  3626764.52,    19.58,
  123.49,   0.00)  DC
          3RD HIGHEST VALUE IS      36.98559 AT (  488066.96,  3626744.52,    19.63,
  123.49,   0.00)  DC
          4TH HIGHEST VALUE IS      33.89666 AT (  488066.96,  3626764.52,    19.57,
  123.49,   0.00)  DC
          5TH HIGHEST VALUE IS      32.86078 AT (  488046.12,  3626714.76,    19.26,
  123.54,   0.00)  DC
          6TH HIGHEST VALUE IS      32.15553 AT (  488046.96,  3626724.52,    19.43,
  123.54,   0.00)  DC
          7TH HIGHEST VALUE IS      29.95372 AT (  488046.96,  3626744.52,    19.58,
  123.49,   0.00)  DC
          8TH HIGHEST VALUE IS      28.07331 AT (  488046.96,  3626764.52,    19.45,
  123.48,   0.00)  DC
          9TH HIGHEST VALUE IS      27.58691 AT (  488026.96,  3626704.52,    19.33,
  123.63,   0.00)  DC
         10TH HIGHEST VALUE IS      26.39171 AT (  488026.96,  3626724.52,    19.26,
  123.49,   0.00)  DC


 *** RECEPTOR TYPES:  GC = GRIDCART
                     GP   = GRIDPOLR
                     DC   = DISCCART
                     DP   = DISCPOLR
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                        ***       11:15:09

                                  PAGE  57
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                                                 *** THE SUMMARY OF HIGHEST  1-HR
```

```
RESULTS ***

                                    ** CONC OF PM_10    IN MICROGRAMS/M**3
             **

                                                                 DATE
                                                    NETWORK
GROUP ID                          AVERAGE CONC     (YYMMDDHH)            RECEPTOR
(XR, YR, ZELEV, ZHILL, ZFLAG)  OF   TYPE  GRID-ID
- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - - - - -

ALL      HIGH   1ST HIGH VALUE IS     388.63742  ON 19120716: AT (  488094.61,
3626765.41,    19.58,   123.49,    0.00)  DC


 *** RECEPTOR TYPES:  GC = GRIDCART
                     GP   = GRIDPOLR
                     DC   = DISCCART
                     DP   = DISCPOLR
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***       11:15:09

                                  PAGE  58
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

 *** Message Summary : AERMOD Model Execution ***

  --------- Summary of Total Messages --------

 A Total of          0    Fatal Error Message(s)
 A Total of          1    Warning Message(s)
 A Total of        1087   Informational Message(s)

 A Total of       26304  Hours Were Processed

 A Total of         318   Calm Hours Identified

 A Total of         769   Missing Hours Identified (  2.92 Percent)


    ******** FATAL ERROR MESSAGES ********
              ***   NONE  ***


    ********   WARNING MESSAGES   ********
 MX W403    275       PFLCNV: Turbulence data is being used w/o ADJ_U* option
```

SigA Data

```
************************************
*** AERMOD Finishes Successfully ***
************************************
```

```
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***        11:15:09

                                  PAGE   1
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                                           ***     MODEL SETUP OPTIONS SUMMARY
 ***
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - -

 ** Model Options Selected:
      * Model Uses Regulatory DEFAULT Options
      * Model Is Setup For Calculation of Average CONCentration Values.
      * NO GAS DEPOSITION Data Provided.
      * NO PARTICLE DEPOSITION Data Provided.
      * Model Uses NO DRY DEPLETION. DDPLETE  =  F
      * Model Uses NO WET DEPLETION. WETDPLT  =  F
      * Stack-tip Downwash.
      * Model Accounts for ELEVated Terrain Effects.
      * Use Calms Processing Routine.
      * Use Missing Data Processing Routine.
      * No Exponential Decay.
      * Model Uses URBAN Dispersion Algorithm for the SBL for    81 Source(s),
        for  Total of    1 Urban Area(s):
   Urban Population =   3276208.0 ;  Urban  Roughness Length =  1.000 m
      * Urban Roughness Length of 1.0 Meter Used.
      * CCVR_Sub - Meteorological data includes CCVR substitutions
      * Model Assumes No FLAGPOLE Receptor Heights.
      * The User Specified a Pollutant Type of: PM_10

 **Model Calculates  1 Short Term Average(s) of:   1-HR
     and Calculates PERIOD Averages

 **This Run Includes:     81 Source(s);     1   Source Group(s); and    1266
Receptor(s)

                with:      0 POINT(s), including
                           0 POINTCAP(s) and      0 POINTHOR(s)
                 and:     81 VOLUME source(s)
                 and:      0 AREA type source(s)
                 and:      0 LINE source(s)
                 and:      0 RLINE/RLINEXT source(s)
                 and:      0 OPENPIT source(s)
                 and:      0 BUOYANT LINE source(s) with a total of     0 line(s)
                 and:      0 SWPOINT source(s)
```

```
 **Model Set To Continue RUNning After the Setup Testing.

**The  AERMET Input Meteorological Data Version Date:  22112

 **Output Options Selected:
          Model Outputs Tables of PERIOD Averages by Receptor
          Model Outputs Tables of Highest Short Term Values by Receptor (RECTABLE
Keyword)
          Model Outputs External File(s) of High Values for Plotting (PLOTFILE
Keyword)
          Model Outputs Separate Summary File of High Ranked Values (SUMMFILE
Keyword)

 **NOTE:  The Following Flags May Appear Following CONC Values:  c for Calm Hours
                                                               m   for Missing Hours
                                                               b   for Both Calm and
Missing Hours

 **Misc. Inputs:  Base Elev. for Pot. Temp. Profile (m MSL) =   132.00 ;  Decay
Coef. =    0.000   ;    Rot. Angle =     0.0
                  Emission Units = GRAMS/SEC                             ;
Emission Rate Unit Factor =   0.10000E+07
                  Output Units   = MICROGRAMS/M**3

 **Approximate Storage Requirements of Model =      3.7 MB of RAM.

 **Input Runstream File:          aermod.inp

 **Output Print File:             aermod.out


 **Detailed Error/Message File:   Fenton Parkway Construction2.err

 **File for Summary of Results:   Fenton Parkway Construction2.sum

   *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                           ***       11:15:09

                                  PAGE   2
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                                           ***  METEOROLOGICAL DAYS SELECTED FOR
PROCESSING ***
                                                               (1=YES; 0=NO)

            1 1 1 1 1 1 1 1 1 1  1 1 1 1 1 1 1 1 1 1  1 1  1 1 1 1 1 1 1 1   1 1 1
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1  1 1 1 1 1 1 1 1 1 1  1 1  1 1 1 1 1 1 1 1   1 1 1
```

```
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1  1 1  1 1 1 1 1 1 1 1   1 1 1
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1  1 1  1 1 1 1 1 1 1 1   1 1 1
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1  1 1  1 1 1 1 1 1 1 1   1 1 1
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1  1 1  1 1 1 1 1 1 1 1   1 1 1
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1  1 1  1 1 1 1 1 1 1 1   1 1 1
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1   1 1 1 1 1

                NOTE:  METEOROLOGICAL DATA ACTUALLY PROCESSED WILL ALSO DEPEND ON
WHAT IS INCLUDED IN THE DATA FILE.



                                  *** UPPER BOUND OF FIRST THROUGH FIFTH WIND SPEED
CATEGORIES ***
                                                            (METERS/SEC)

                                                 1.54,   3.09,   5.14,   8.23,
10.80,
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***       11:15:09

                                  PAGE   3
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                                    *** UP TO THE FIRST 24 HOURS OF METEOROLOGICAL
DATA ***

   Surface file:   SDAPCD Kearny MetData\KVR_2019-2021_v22112.SFC
                 Met Version:  22112
   Profile file:   SDAPCD Kearny MetData\KVR_2019-2021_v22112.PFL

   Surface format: FREE

   Profile format: FREE

   Surface station no.:    93107                Upper air station no.:     3190
                  Name: UNKNOWN                                Name:  UNKNOWN

                  Year:  2019                                  Year:   2019

 First 24 hours of scalar data
 YR MO DY JDY HR    H0     U*       W*  DT/DZ ZICNV ZIMCH  M-O LEN   Z0   BOWEN
```

```
ALBEDO  REF  WS   WD      HT  REF TA   HT
- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - -
 19 01 01   1 01 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   1.34   41.    10.0  282.9   10.0
 19 01 01   1 02 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   1.70   14.    10.0  281.6   10.0
 19 01 01   1 03 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.15   1.21
1.00   1.21  355.    10.0  281.3   10.0
 19 01 01   1 04 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   1.34   23.    10.0  281.5   10.0
 19 01 01   1 05 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   2.28    9.    10.0  281.0   10.0
 19 01 01   1 06 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   2.24   27.    10.0  279.5   10.0
 19 01 01   1 07 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   2.82   31.    10.0  279.4   10.0
 19 01 01   1 08 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.15   1.21
0.50   2.32  356.    10.0  279.8   10.0
 19 01 01   1 09 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.30   2.24   40.    10.0  283.0   10.0
 19 01 01   1 10 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
0.23   3.49   65.    10.0  285.2   10.0
 19 01 01   1 11 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.21   4.51   59.    10.0  286.8   10.0
 19 01 01   1 12 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.20   7.24   52.    10.0  287.3   10.0
 19 01 01   1 13 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.20   7.60   51.    10.0  287.1   10.0
 19 01 01   1 14 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.21   6.79   54.    10.0  287.1   10.0
 19 01 01   1 15 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.24   7.06   52.    10.0  287.1   10.0
 19 01 01   1 16 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.33   5.72   55.    10.0  286.4   10.0
 19 01 01   1 17 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.61   2.64   53.    10.0  285.2   10.0
 19 01 01   1 18 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   5.50   50.    10.0  283.4   10.0
 19 01 01   1 19 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   4.38   59.    10.0  281.6   10.0
 19 01 01   1 20 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   4.29   62.    10.0  280.9   10.0
 19 01 01   1 21 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   4.34   60.    10.0  281.0   10.0
 19 01 01   1 22 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   2.64   72.    10.0  280.1   10.0
 19 01 01   1 23 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   3.49   58.    10.0  279.4   10.0
 19 01 01   1 24 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
```

```
1.00   2.73   77.    10.0  279.3   10.0


 First  hour of profile data
  YR MO DY HR HEIGHT F  WDIR    WSPD  AMB_TMP sigmaA  sigmaW  sigmaV
  19 01 01 01   10.0 1   41.    1.34    283.0   18.0  -99.00   0.40

  F indicates top of profile (=1) or below (=0)
   *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***        11:15:09

                                  PAGE   4
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                                        *** THE SUMMARY OF MAXIMUM PERIOD ( 26304
HRS) RESULTS ***


                                    ** CONC OF PM_10    IN MICROGRAMS/M**3
             **



                        NETWORK
GROUP ID                       AVERAGE CONC                RECEPTOR  (XR, YR, ZELEV,
ZHILL, ZFLAG)  OF TYPE  GRID-ID
- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - -

ALL       1ST HIGHEST VALUE IS      45.71644 AT (  488094.61,  3626765.41,    19.58,
  123.49,   0.00)  DC
          2ND HIGHEST VALUE IS      42.11659 AT (  488086.96,  3626764.52,    19.58,
  123.49,   0.00)  DC
          3RD HIGHEST VALUE IS      36.98559 AT (  488066.96,  3626744.52,    19.63,
  123.49,   0.00)  DC
          4TH HIGHEST VALUE IS      33.89666 AT (  488066.96,  3626764.52,    19.57,
  123.49,   0.00)  DC
          5TH HIGHEST VALUE IS      32.86078 AT (  488046.12,  3626714.76,    19.26,
  123.54,   0.00)  DC
          6TH HIGHEST VALUE IS      32.15553 AT (  488046.96,  3626724.52,    19.43,
  123.54,   0.00)  DC
          7TH HIGHEST VALUE IS      29.95372 AT (  488046.96,  3626744.52,    19.58,
  123.49,   0.00)  DC
          8TH HIGHEST VALUE IS      28.07331 AT (  488046.96,  3626764.52,    19.45,
  123.48,   0.00)  DC
          9TH HIGHEST VALUE IS      27.58691 AT (  488026.96,  3626704.52,    19.33,
  123.63,   0.00)  DC
         10TH HIGHEST VALUE IS      26.39171 AT (  488026.96,  3626724.52,    19.26,
  123.49,   0.00)  DC
```

```
 *** RECEPTOR TYPES:  GC = GRIDCART
                    GP   = GRIDPOLR
                    DC   = DISCCART
                    DP   = DISCPOLR
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***       11:15:09

                                  PAGE   5
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

                                                *** THE SUMMARY OF HIGHEST  1-HR
RESULTS ***


                                    ** CONC OF PM_10    IN MICROGRAMS/M**3
             **

                                                      DATE
                                         NETWORK
GROUP ID                          AVERAGE CONC     (YYMMDDHH)             RECEPTOR
(XR, YR, ZELEV, ZHILL, ZFLAG)  OF   TYPE  GRID-ID
- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - - - -

ALL      HIGH   1ST HIGH VALUE IS     388.63742  ON 19120716: AT (  488094.61,
3626765.41,    19.58,   123.49,    0.00)  DC


 *** RECEPTOR TYPES:  GC = GRIDCART
                    GP   = GRIDPOLR
                    DC   = DISCCART
                    DP   = DISCPOLR
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***       11:15:09

                                  PAGE   6
 *** MODELOPTs:    RegDFAULT  CONC  ELEV  URBAN  SigA  Data

 *** Message Summary : AERMOD Model Execution ***

  --------- Summary of Total Messages --------

 A Total of         0    Fatal Error Message(s)
 A Total of         1    Warning Message(s)
```

A Total of 1087 Informational Message(s)

A Total of 26304 Hours Were Processed

A Total of 318 Calm Hours Identified

A Total of 769 Missing Hours Identified (2.92 Percent)

******** FATAL ERROR MESSAGES ********
*** NONE ***

******** WARNING MESSAGES ********
MX W403 275 PFLCNV: Turbulence data is being used w/o ADJ_U* option
SigA Data

HARP2 - HRACalc (dated 22118) 12/21/2023 11:44:22 AM - Output Log

GLCs loaded successfully
Pollutants loaded successfully
Pathway receptors loaded successfully
****
RISK SCENARIO SETTINGS

Receptor Type: Resident
Scenario: All
Calculation Method: Derived

****
EXPOSURE DURATION PARAMETERS FOR CANCER

Start Age: -0.25
Total Exposure Duration: 0.92

Exposure Duration Bin Distribution
3rd Trimester Bin: 0.25
0<2 Years Bin: 0.92
2<9 Years Bin: 0
2<16 Years Bin: 0
16<30 Years Bin: 0
16 to 70 Years Bin: 0

****
PATHWAYS ENABLED

NOTE: Inhalation is always enabled and used for all assessments. The remaining pathways are only used for cancer and noncancer chronic assessments.

Inhalation: True
Soil: False
Dermal: False
Mother's milk: False
Water: False
Fish: False
Homegrown crops: False
Beef: False
Dairy: False
Pig: False
Chicken: False
Egg: False

****
INHALATION

Daily breathing rate: RMP

```
**Worker Adjustment Factors**
Worker adjustment factors enabled: NO

**Fraction at time at home**
3rd Trimester to 16 years: OFF
16 years to 70 years: OFF

**********************************
TIER 2 SETTINGS

Tier2 adjustments were used in this assessment.  Please see the input file for
details.
Tier2 - What was changed: ED or start age changed|
Calculating cancer risk
Cancer risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive -
Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\Unmit_Con_CancerRisk.csv
Cancer risk total by receptor saved to: C:\Users\enuno\OneDrive -
Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\Unmit_Con_CancerRiskSumByRec.csv
Calculating chronic risk
Chronic risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive -
Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\Unmit_Con_NCChronicRisk.csv
Chronic risk total by receptor saved to: C:\Users\enuno\OneDrive -
Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\Unmit_Con_NCChronicRiskSumByRec.csv
Calculating acute risk
Acute risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive -
Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\Unmit_Con_NCAcuteRisk.csv
Acute risk total by receptor saved to: C:\Users\enuno\OneDrive -
Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\Unmit_Con_NCAcuteRiskSumByRec.csv
HRA ran successfully
```

HARP2 - HRACalc (dated 22118) 12/21/2023 12:09:35 PM - Output Log

GLCs loaded successfully
Pollutants loaded successfully
Pathway receptors loaded successfully
****
RISK SCENARIO SETTINGS

Receptor Type: Resident
Scenario: All
Calculation Method: Derived

****
EXPOSURE DURATION PARAMETERS FOR CANCER

Start Age: -0.25
Total Exposure Duration: 0.92

Exposure Duration Bin Distribution
3rd Trimester Bin: 0.25
0<2 Years Bin: 0.92
2<9 Years Bin: 0
2<16 Years Bin: 0
16<30 Years Bin: 0
16 to 70 Years Bin: 0

****
PATHWAYS ENABLED

NOTE: Inhalation is always enabled and used for all assessments. The remaining pathways are only used for cancer and noncancer chronic assessments.

Inhalation: True
Soil: False
Dermal: False
Mother's milk: False
Water: False
Fish: False
Homegrown crops: False
Beef: False
Dairy: False
Pig: False
Chicken: False
Egg: False

****
INHALATION

Daily breathing rate: RMP

```
**Worker Adjustment Factors**
Worker adjustment factors enabled: NO

**Fraction at time at home**
3rd Trimester to 16 years: OFF
16 years to 70 years: OFF

**********************************
TIER 2 SETTINGS

Tier2 adjustments were used in this assessment.  Please see the input file for
details.
Tier2 - What was changed: ED or start age changed|
Calculating cancer risk
Cancer risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive -
Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\Mit_Con_CancerRisk.csv
Cancer risk total by receptor saved to: C:\Users\enuno\OneDrive -
Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\Mit_Con_CancerRiskSumByRec.csv
Calculating chronic risk
Chronic risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive -
Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\Mit_Con_NCChronicRisk.csv
Chronic risk total by receptor saved to: C:\Users\enuno\OneDrive -
Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\Mit_Con_NCChronicRiskSumByRec.csv
Calculating acute risk
Acute risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive -
Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\Mit_Con_NCAcuteRisk.csv
Acute risk total by receptor saved to: C:\Users\enuno\OneDrive -
Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\Mit_Con_NCAcuteRiskSumByRec.csv
HRA ran successfully
```

HARP2 - HRACalc (dated 22118) 1/31/2024 6:55:04 PM - Output Log

GLCs loaded successfully
Pollutants loaded successfully
Pathway receptors loaded successfully
****
RISK SCENARIO SETTINGS

Receptor Type: Resident
Scenario: All
Calculation Method: Derived

****
EXPOSURE DURATION PARAMETERS FOR CANCER

Start Age: -0.25
Total Exposure Duration: 1.16

Exposure Duration Bin Distribution
3rd Trimester Bin: 0.25
0<2 Years Bin: 1.16
2<9 Years Bin: 0
2<16 Years Bin: 0
16<30 Years Bin: 0
16 to 70 Years Bin: 0

****
PATHWAYS ENABLED

NOTE: Inhalation is always enabled and used for all assessments. The remaining pathways are only used for cancer and noncancer chronic assessments.

Inhalation: True
Soil: False
Dermal: False
Mother's milk: False
Water: False
Fish: False
Homegrown crops: False
Beef: False
Dairy: False
Pig: False
Chicken: False
Egg: False

****
INHALATION

Daily breathing rate: RMP

Worker Adjustment Factors
Worker adjustment factors enabled: NO

Fraction at time at home
3rd Trimester to 16 years: OFF
16 years to 70 years: OFF

****
TIER 2 SETTINGS

Tier2 adjustments were used in this assessment. Please see the input file for details.
Tier2 - What was changed: ED or start age changed|
Calculating cancer risk
Cancer risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\CIP_Unmit_ConCancerRisk.csv
Cancer risk total by receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\CIP_Unmit_ConCancerRiskSumByRec.csv
Calculating chronic risk
Chronic risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\CIP_Unmit_ConNCChronicRisk.csv
Chronic risk total by receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\CIP_Unmit_ConNCChronicRiskSumByRec.csv
Calculating acute risk
Acute risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\CIP_Unmit_ConNCAcuteRisk.csv
Acute risk total by receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\CIP_Unmit_ConNCAcuteRiskSumByRec.csv
HRA ran successfully

HARP2 - HRACalc (dated 22118) 1/31/2024 7:07:43 PM - Output Log

GLCs loaded successfully
Pollutants loaded successfully
Pathway receptors loaded successfully
****
RISK SCENARIO SETTINGS

Receptor Type: Resident
Scenario: All
Calculation Method: Derived

****
EXPOSURE DURATION PARAMETERS FOR CANCER

Start Age: -0.25
Total Exposure Duration: 1.16

Exposure Duration Bin Distribution
3rd Trimester Bin: 0.25
0<2 Years Bin: 1.16
2<9 Years Bin: 0
2<16 Years Bin: 0
16<30 Years Bin: 0
16 to 70 Years Bin: 0

****
PATHWAYS ENABLED

NOTE: Inhalation is always enabled and used for all assessments. The remaining pathways are only used for cancer and noncancer chronic assessments.

Inhalation: True
Soil: False
Dermal: False
Mother's milk: False
Water: False
Fish: False
Homegrown crops: False
Beef: False
Dairy: False
Pig: False
Chicken: False
Egg: False

****
INHALATION

Daily breathing rate: RMP

Worker Adjustment Factors
Worker adjustment factors enabled: NO

Fraction at time at home
3rd Trimester to 16 years: OFF
16 years to 70 years: OFF

****
TIER 2 SETTINGS

Tier2 adjustments were used in this assessment. Please see the input file for details.
Tier2 - What was changed: ED or start age changed|
Calculating cancer risk
Cancer risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\CIP_Mit_ConCancerRisk.csv
Cancer risk total by receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\CIP_Mit_ConCancerRiskSumByRec.csv
Calculating chronic risk
Chronic risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\CIP_Mit_ConNCChronicRisk.csv
Chronic risk total by receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\CIP_Mit_ConNCChronicRiskSumByRec.csv
Calculating acute risk
Acute risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\CIP_Mit_ConNCAcuteRisk.csv
Acute risk total by receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON CON HRA\hra\CIP_Mit_ConNCAcuteRiskSumByRec.csv
HRA ran successfully

```
**
****************************************
**
** AERMOD Input Produced by:
** AERMOD View Ver. 12.0.0
** Lakes Environmental Software Inc.
** Date: 12/21/2023
** File: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\Fenton Parkway
Bridge Project EIR\Fenton Parkway Bridge Project EIR.ADI
**
****************************************
**
**
****************************************
** AERMOD Control Pathway
****************************************
**
**
CO STARTING
   TITLEONE C:\Users\apoll\Desktop\HARP2\HARP\Fenton Parkway Bridge Project EIR\
   MODELOPT CONC
   AVERTIME 1 PERIOD
   URBANOPT 3276208 San_Diego_County
   POLLUTID PM_10
   FLAGPOLE 0.00
   RUNORNOT RUN
   ERRORFIL "Fenton Parkway Bridge Project EIR.err"
CO FINISHED
**
****************************************
** AERMOD Source Pathway
****************************************
**
**
SO STARTING
** Source Location **
** Source ID - Type - X Coord. - Y Coord. **
** --------------------------------------------------------------------
** Line Source Represented by Adjacent Volume Sources
** LINE VOLUME Source ID = PASS
** DESCRSRC Passenger Vehicles
** PREFIX
** Length of Side = 18.00
** Configuration = Adjacent
** Emission Rate = 1.0
** Vertical Dimension = 2.60
** SZINIT = 1.21
** Nodes = 4
** 488139.442, 3626755.390, 19.30, 1.30, 8.37
** 488155.323, 3626732.892, 15.16, 1.30, 8.37
```

```
** 488179.145, 3626691.203, 14.98, 1.30, 8.37
** 488222.819, 3626559.520, 13.73, 1.30, 8.37
** ------------------------------------------------------------------------
   LOCATION L0000001     VOLUME   488144.632 3626748.037 17.01
   LOCATION L0000002     VOLUME   488155.012 3626733.332 15.06
   LOCATION L0000003     VOLUME   488163.986 3626717.731 14.97
   LOCATION L0000004     VOLUME   488172.917 3626702.103 15.03
   LOCATION L0000005     VOLUME   488180.860 3626686.034 14.79
   LOCATION L0000006     VOLUME   488186.526 3626668.949 13.88
   LOCATION L0000007     VOLUME   488192.192 3626651.864 12.85
   LOCATION L0000008     VOLUME   488197.859 3626634.779 12.22
   LOCATION L0000009     VOLUME   488203.525 3626617.694 11.62
   LOCATION L0000010     VOLUME   488209.191 3626600.609 11.94
   LOCATION L0000011     VOLUME   488214.858 3626583.525 12.57
   LOCATION L0000012     VOLUME   488220.524 3626566.440 15.71
** End of LINE VOLUME Source ID = PASS
** ------------------------------------------------------------------------
** Line Source Represented by Adjacent Volume Sources
** LINE VOLUME Source ID = TRUCK
** DESCRSRC Trucks
** PREFIX
** Length of Side = 18.00
** Configuration = Adjacent
** Emission Rate = 1.0
** Vertical Dimension = 6.80
** SZINIT = 3.16
** Nodes = 4
** 488139.442, 3626755.390, 19.30, 3.40, 8.37
** 488155.323, 3626732.892, 15.16, 3.40, 8.37
** 488179.145, 3626691.203, 14.98, 3.40, 8.37
** 488222.819, 3626559.520, 13.73, 3.40, 8.37
** ------------------------------------------------------------------------
   LOCATION L0000013     VOLUME   488144.632 3626748.037 17.01
   LOCATION L0000014     VOLUME   488155.012 3626733.332 15.06
   LOCATION L0000015     VOLUME   488163.986 3626717.731 14.97
   LOCATION L0000016     VOLUME   488172.917 3626702.103 15.03
   LOCATION L0000017     VOLUME   488180.860 3626686.034 14.79
   LOCATION L0000018     VOLUME   488186.526 3626668.949 13.88
   LOCATION L0000019     VOLUME   488192.192 3626651.864 12.85
   LOCATION L0000020     VOLUME   488197.859 3626634.779 12.22
   LOCATION L0000021     VOLUME   488203.525 3626617.694 11.62
   LOCATION L0000022     VOLUME   488209.191 3626600.609 11.94
   LOCATION L0000023     VOLUME   488214.858 3626583.525 12.57
   LOCATION L0000024     VOLUME   488220.524 3626566.440 15.71
** End of LINE VOLUME Source ID = TRUCK
** Source Parameters **
** LINE VOLUME Source ID = PASS
   SRCPARAM L0000001     0.0833333333     1.30      8.37      1.21
   SRCPARAM L0000002     0.0833333333     1.30      8.37      1.21
   SRCPARAM L0000003     0.0833333333     1.30      8.37      1.21
```

```
   SRCPARAM L0000004     0.0833333333     1.30       8.37      1.21
   SRCPARAM L0000005     0.0833333333     1.30       8.37      1.21
   SRCPARAM L0000006     0.0833333333     1.30       8.37      1.21
   SRCPARAM L0000007     0.0833333333     1.30       8.37      1.21
   SRCPARAM L0000008     0.0833333333     1.30       8.37      1.21
   SRCPARAM L0000009     0.0833333333     1.30       8.37      1.21
   SRCPARAM L0000010     0.0833333333     1.30       8.37      1.21
   SRCPARAM L0000011     0.0833333333     1.30       8.37      1.21
   SRCPARAM L0000012     0.0833333333     1.30       8.37      1.21
** ------------------------------------------------------------------------
** LINE VOLUME Source ID = TRUCK
   SRCPARAM L0000013     0.0833333333     3.40       8.37      3.16
   SRCPARAM L0000014     0.0833333333     3.40       8.37      3.16
   SRCPARAM L0000015     0.0833333333     3.40       8.37      3.16
   SRCPARAM L0000016     0.0833333333     3.40       8.37      3.16
   SRCPARAM L0000017     0.0833333333     3.40       8.37      3.16
   SRCPARAM L0000018     0.0833333333     3.40       8.37      3.16
   SRCPARAM L0000019     0.0833333333     3.40       8.37      3.16
   SRCPARAM L0000020     0.0833333333     3.40       8.37      3.16
   SRCPARAM L0000021     0.0833333333     3.40       8.37      3.16
   SRCPARAM L0000022     0.0833333333     3.40       8.37      3.16
   SRCPARAM L0000023     0.0833333333     3.40       8.37      3.16
   SRCPARAM L0000024     0.0833333333     3.40       8.37      3.16
** ------------------------------------------------------------------------
   URBANSRC ALL
   SRCGROUP PASS     L0000001 L0000002 L0000003 L0000004 L0000005 L0000006
   SRCGROUP PASS     L0000007 L0000008 L0000009 L0000010 L0000011 L0000012
   SRCGROUP TRUCK    L0000013 L0000014 L0000015 L0000016 L0000017 L0000018
   SRCGROUP TRUCK    L0000019 L0000020 L0000021 L0000022 L0000023 L0000024
   SRCGROUP ALL
SO FINISHED
**
****************************************
** AERMOD Receptor Pathway
****************************************
**
**
RE STARTING
   INCLUDED "Fenton Parkway Bridge Project EIR.rou"
RE FINISHED
**
****************************************
** AERMOD Meteorology Pathway
****************************************
**
**
ME STARTING
   SURFFILE "..\Fenton Parkway Construction2\SDAPCD Kearny
MetData\KVR_2019-2021_v22112.SFC"
   PROFFILE "..\Fenton Parkway Construction2\SDAPCD Kearny
```

```
MetData\KVR_2019-2021_v22112.PFL"
   SURFDATA 93107 2019
   UAIRDATA 3190 2019
   SITEDATA 72293 2019
   PROFBASE 132.0 METERS
ME FINISHED
**
****************************************
** AERMOD Output Pathway
****************************************
**
**
OU STARTING
   RECTABLE ALLAVE 1ST
   RECTABLE 1 1ST
** Auto-Generated Plotfiles
   PLOTFILE 1 ALL 1ST "Fenton Parkway Bridge Project EIR.AD\01H1GALL.PLT" 31
   PLOTFILE 1 PASS 1ST "Fenton Parkway Bridge Project EIR.AD\01H1G001.PLT" 32
   PLOTFILE 1 TRUCK 1ST "Fenton Parkway Bridge Project EIR.AD\01H1G002.PLT" 33
   PLOTFILE PERIOD ALL "Fenton Parkway Bridge Project EIR.AD\PE00GALL.PLT" 34
   PLOTFILE PERIOD PASS "Fenton Parkway Bridge Project EIR.AD\PE00G001.PLT" 35
   PLOTFILE PERIOD TRUCK "Fenton Parkway Bridge Project EIR.AD\PE00G002.PLT" 36
   SUMMFILE "Fenton Parkway Bridge Project EIR.sum"
OU FINISHED


  ***  Message Summary For AERMOD Model Setup ***

   --------- Summary of Total Messages --------

 A Total of          0    Fatal Error Message(s)
 A Total of          1    Warning Message(s)
 A Total of          0    Informational Message(s)


    ******** FATAL ERROR MESSAGES ********
              ***   NONE   ***


    ********   WARNING MESSAGES   ********
 MX W403    153       PFLCNV: Turbulence data is being used w/o ADJ_U* option
SigA Data

 ***********************************
 *** SETUP Finishes Successfully ***
 ***********************************

   *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
```

```
                        ***        14:45:58

                                   PAGE   1
 *** MODELOPTs:    CONC  ELEV   FLGPOL  URBAN  SigA Data

                                             ***     MODEL SETUP OPTIONS SUMMARY
***
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - -

 ** Model Options Selected:
      * Model Allows User-Specified Options
      * Model Is Setup For Calculation of Average CONCentration Values.
      * NO GAS DEPOSITION Data Provided.
      * NO PARTICLE DEPOSITION Data Provided.
      * Model Uses NO DRY DEPLETION. DDPLETE  =  F
      * Model Uses NO WET DEPLETION. WETDPLT  =  F
      * Stack-tip Downwash.
      * Model Accounts for ELEVated Terrain Effects.
      * Use Calms Processing Routine.
      * Use Missing Data Processing Routine.
      * No Exponential Decay.
      * Model Uses URBAN Dispersion Algorithm for the SBL for    24 Source(s),
        for  Total of    1 Urban Area(s):
   Urban Population =   3276208.0 ;  Urban  Roughness Length =  1.000 m
      * Urban Roughness Length of 1.0 Meter Used.
      * CCVR_Sub - Meteorological data includes CCVR substitutions
      * Model Accepts FLAGPOLE Receptor . Heights.
      * The User Specified a Pollutant Type of: PM_10

 **Model Calculates  1 Short Term Average(s) of:   1-HR
     and Calculates PERIOD Averages

 **This Run Includes:     24 Source(s);     3   Source Group(s); and    1248
Receptor(s)

                with:      0 POINT(s), including
                           0 POINTCAP(s) and      0 POINTHOR(s)
                 and:     24 VOLUME source(s)
                 and:      0 AREA type source(s)
                 and:      0 LINE source(s)
                 and:      0 RLINE/RLINEXT source(s)
                 and:      0 OPENPIT source(s)
                 and:      0 BUOYANT LINE source(s) with a total of     0 line(s)
                 and:      0 SWPOINT source(s)


 **Model Set To Continue RUNning After the Setup Testing.

 **The AERMET Input Meteorological Data Version Date:  22112
```

```
 **Output Options Selected:
          Model Outputs Tables of PERIOD Averages by Receptor
          Model Outputs Tables of Highest Short Term Values by Receptor (RECTABLE
Keyword)
          Model Outputs External File(s) of High Values for Plotting (PLOTFILE
Keyword)
          Model Outputs Separate Summary File of High Ranked Values (SUMMFILE
Keyword)

 **NOTE:  The Following Flags May Appear Following CONC Values:  c for Calm Hours
                                                                m   for Missing Hours
                                                                b   for Both Calm and
Missing Hours

 **Misc. Inputs:  Base Elev. for Pot. Temp. Profile (m MSL) =   132.00 ;  Decay
Coef. =    0.000   ;    Rot. Angle =     0.0
                  Emission Units = GRAMS/SEC                              ;
Emission Rate Unit Factor =   0.10000E+07
                  Output Units   = MICROGRAMS/M**3

 **Approximate Storage Requirements of Model =      3.8 MB of RAM.

 **Input Runstream File:          aermod.inp

 **Output Print File:             aermod.out


 **Detailed Error/Message File:   Fenton Parkway Bridge Project EIR.err

 **File for Summary of Results:   Fenton Parkway Bridge Project EIR.sum

  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***       12/21/23
 *** AERMET - VERSION  22112 ***   ***
                        ***       14:45:58

                                  PAGE   2
 *** MODELOPTs:    CONC  ELEV   FLGPOL  URBAN  SigA Data


                                                      ***  VOLUME SOURCE DATA ***

               NUMBER EMISSION RATE                    BASE     RELEASE    INIT.
INIT.   URBAN  EMISSION RATE   AIRCRAFT
   SOURCE       PART.  (GRAMS/SEC)    X          Y      ELEV.    HEIGHT     SY
SZ     SOURCE  SCALAR VARY
     ID         CATS.                (METERS) (METERS) (METERS) (METERS) (METERS)
(METERS)            BY
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
```

- - - - - - - - - - - - - - - - - - -

L0000001	0	0.83333E-01	488144.6	3626748.0	17.0	1.30	8.37	1.21	YES	NO
L0000 002	0	0.83333E-01	488155.0	3626733.3	15.1	1.30	8.37	1.21	YES	NO
L0000 003	0	0.83333E-01	488164.0	3626717.7	15.0	1.30	8.37	1.21	YES	NO
L0000 004	0	0.83333E-01	488172.9	3626702.1	15.0	1.30	8.37	1.21	YES	NO
L0000 005	0	0.83333E-01	488180.9	3626686.0	14.8	1.30	8.37	1.21	YES	NO
L0000 006	0	0.83333E-01	488186.5	3626668.9	13.9	1.30	8.37	1.21	YES	NO
L0000 007	0	0.83333E-01	488192.2	3626651.9	12.9	1.30	8.37	1.21	YES	NO
L0000 008	0	0.83333E-01	488197.9	3626634.8	12.2	1.30	8.37	1.21	YES	NO
L0000 009	0	0.83333E-01	488203.5	3626617.7	11.6	1.30	8.37	1.21	YES	NO
L0000 010	0	0.83333E-01	488209.2	3626600.6	11.9	1.30	8.37	1.21	YES	NO
L0000 011	0	0.83333E-01	488214.9	3626583.5	12.6	1.30	8.37	1.21	YES	NO
L0000 012	0	0.83333E-01	488220.5	3626566.4	15.7	1.30	8.37	1.21	YES	NO
L0000 013	0	0.83333E-01	488144.6	3626748.0	17.0	3.40	8.37	3.16	YES	NO
L0000 014	0	0.83333E-01	488155.0	3626733.3	15.1	3.40	8.37	3.16	YES	NO
L0000 015	0	0.83333E-01	488164.0	3626717.7	15.0	3.40	8.37	3.16	YES	NO
L0000 016	0	0.83333E-01	488172.9	3626702.1	15.0	3.40	8.37	3.16	YES	NO
L0000 017	0	0.83333E-01	488180.9	3626686.0	14.8	3.40	8.37	3.16	YES	NO
L0000 018	0	0.83333E-01	488186.5	3626668.9	13.9	3.40	8.37	3.16	YES	NO
L0000 019	0	0.83333E-01	488192.2	3626651.9	12.9	3.40	8.37	3.16	YES	NO
L0000 020	0	0.83333E-01	488197.9	3626634.8	12.2	3.40	8.37	3.16	YES	NO
L0000 021	0	0.83333E-01	488203.5	3626617.7	11.6	3.40	8.37	3.16	YES	NO
L0000 022	0	0.83333E-01	488209.2	3626600.6	11.9	3.40	8.37	3.16	YES	NO
L0000 023	0	0.83333E-01	488214.9	3626583.5	12.6	3.40	8.37	3.16	YES	NO
L0000 024	0	0.83333E-01	488220.5	3626566.4	15.7	3.40	8.37	3.16	YES	NO

```
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***       12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***       14:45:58

                                  PAGE   3
 *** MODELOPTs:    CONC  ELEV   FLGPOL  URBAN  SigA Data


                                                   *** SOURCE IDs DEFINING SOURCE GROUPS ***

 SRCGROUP ID                                                      SOURCE IDs
 -----------                                                      ----------


 PASS        L0000001    , L0000002    , L0000003    , L0000004    , L0000005   ,
L0000006    , L0000007    , L0000008   ,

             L0000009    , L0000010    , L0000011    , L0000012    ,

  TRUCK      L0000013    , L0000014    , L0000015    , L0000016    , L0000017   ,
L0000018    , L0000019    , L0000020   ,

             L0000021    , L0000022    , L0000023    , L0000024    ,

 ALL         L0000001    , L0000002    , L0000003    , L0000004    , L0000005   ,
L0000006    , L0000007    , L0000008   ,

             L0000009    , L0000010    , L0000011    , L0000012    , L0000013   ,
L0000014    , L0000015    , L0000016   ,

             L0000017    , L0000018    , L0000019    , L0000020    , L0000021   ,
L0000022    , L0000023    , L0000024   ,
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***       12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***       14:45:58

                                  PAGE   4
 *** MODELOPTs:    CONC  ELEV   FLGPOL  URBAN  SigA Data


                                                  *** SOURCE IDs DEFINED AS URBAN SOURCES
***

  URBAN ID   URBAN  POP                                           SOURCE IDs
  --------   ---------                                            ----------


              3276208.   L0000001    , L0000002    , L0000003    , L0000004    ,
```

```
L0000005    , L0000006    , L0000007   ,
 L0000008    ,

             L0000009    , L0000010    , L0000011    , L0000012    , L0000013   ,
L0000014    , L0000015    , L0000016   ,

             L0000017    , L0000018    , L0000019    , L0000020    , L0000021   ,
L0000022    , L0000023    , L0000024   ,
```


*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

```
  (    487527.0, 3626464.5,      20.0,     123.4,       0.0);       (    487547.0,
3626464.5,      19.8,     123.4,       0.0);
  (    487567.0, 3626464.5,      19.5,     123.6,       0.0);       (    487587.0,
3626464.5,      19.2,     123.6,       0.0);
  (    487607.0, 3626464.5,      18.8,     123.7,       0.0);       (    487507.0,
3626484.5,      20.3,     123.3,       0.0);
  (    487527.0, 3626484.5,      20.2,     123.3,       0.0);       (    487547.0,
3626484.5,      20.0,     123.4,       0.0);
  (    487567.0, 3626484.5,      19.8,     123.4,       0.0);       (    487587.0,
3626484.5,      19.4,     123.6,       0.0);
  (    487607.0, 3626484.5,      18.9,     123.6,       0.0);       (    487627.0,
3626484.5,      18.3,     123.7,       0.0);
  (    487647.0, 3626484.5,      18.0,     123.7,       0.0);       (    487487.0,
3626504.5,      20.5,     123.3,       0.0);
  (    487507.0, 3626504.5,      20.6,     123.3,       0.0);       (    487527.0,
3626504.5,      20.4,     123.3,       0.0);
  (    487547.0, 3626504.5,      19.9,     123.3,       0.0);       (    487567.0,
3626504.5,      19.7,     123.4,       0.0);
  (    487587.0, 3626504.5,      19.4,     123.4,       0.0);       (    487607.0,
3626504.5,      18.8,     123.6,       0.0);
  (    487627.0, 3626504.5,      18.4,     123.6,       0.0);       (    487647.0,
3626504.5,      18.2,     123.7,       0.0);
  (    487667.0, 3626504.5,      18.0,     123.7,       0.0);       (    487687.0,
3626504.5,      17.6,     123.7,       0.0);
  (    487707.0, 3626504.5,      17.1,     123.7,       0.0);       (    487467.0,
3626524.5,      20.6,     122.9,       0.0);
  (    487487.0, 3626524.5,      20.6,     123.0,       0.0);       (    487507.0,
3626524.5,      20.8,     123.3,       0.0);
  (    487527.0, 3626524.5,      20.6,     123.3,       0.0);       (    487547.0,
3626524.5,      19.9,     123.3,       0.0);
```

(487567.0, 3626524.5, 19.6, 123.3, 0.0); (487587.0, 3626524.5, 19.4, 123.4, 0.0);
(487607.0, 3626524.5, 19.0, 123.4, 0.0); (487627.0, 3626524.5, 18.5, 123.6, 0.0);
(487647.0, 3626524.5, 18.3, 123.6, 0.0); (487667.0, 3626524.5, 18.0, 123.6, 0.0);
(487687.0, 3626524.5, 17.6, 123.7, 0.0); (487707.0, 3626524.5, 17.5, 123.7, 0.0);
(487727.0, 3626524.5, 17.6, 123.7, 0.0); (487747.0, 3626524.5, 18.0, 123.7, 0.0);
(487767.0, 3626524.5, 18.2, 123.7, 0.0); (487447.0, 3626544.5, 21.6, 122.2, 0.0);
(487467.0, 3626544.5, 21.2, 122.2, 0.0); (487487.0, 3626544.5, 21.1, 122.2, 0.0);
(487507.0, 3626544.5, 20.9, 122.9, 0.0); (487527.0, 3626544.5, 20.2, 123.3, 0.0);
(487547.0, 3626544.5, 20.1, 123.3, 0.0); (487567.0, 3626544.5, 19.8, 123.3, 0.0);
(487587.0, 3626544.5, 19.7, 123.3, 0.0); (487607.0, 3626544.5, 19.9, 123.3, 0.0);
(487627.0, 3626544.5, 19.4, 123.4, 0.0); (487647.0, 3626544.5, 18.9, 123.4, 0.0);
(487667.0, 3626544.5, 18.3, 123.6, 0.0); (487687.0, 3626544.5, 17.8, 123.6, 0.0);
(487707.0, 3626544.5, 18.0, 123.7, 0.0); (487727.0, 3626544.5, 18.3, 123.7, 0.0);
(487747.0, 3626544.5, 18.4, 123.7, 0.0); (487767.0, 3626544.5, 18.5, 123.7, 0.0);
(487787.0, 3626544.5, 18.8, 123.7, 0.0); (487807.0, 3626544.5, 18.9, 123.7, 0.0);
(487827.0, 3626544.5, 18.8, 123.7, 0.0); (487427.0, 3626564.5, 22.2, 119.9, 0.0);
(487447.0, 3626564.5, 22.0, 121.7, 0.0); (487467.0, 3626564.5, 21.7, 122.2, 0.0);
(487487.0, 3626564.5, 21.4, 122.2, 0.0); (487507.0, 3626564.5, 21.0, 122.2, 0.0);
(487527.0, 3626564.5, 20.5, 122.9, 0.0); (487547.0, 3626564.5, 20.0, 123.3, 0.0);
(487567.0, 3626564.5, 19.6, 123.3, 0.0); (487587.0, 3626564.5, 19.7, 123.3, 0.0);
(487607.0, 3626564.5, 20.2, 123.3, 0.0); (487627.0, 3626564.5, 19.5, 123.3, 0.0);
(487647.0, 3626564.5, 19.1, 123.4, 0.0); (487667.0, 3626564.5, 18.8, 123.4, 0.0);
(487687.0, 3626564.5, 18.5, 123.6, 0.0); (487707.0, 3626564.5, 18.4, 123.6, 0.0);
(487727.0, 3626564.5, 18.8, 123.6, 0.0); (487747.0, 3626564.5, 18.7, 123.6, 0.0);
(487767.0, 3626564.5, 18.7, 123.7, 0.0); (487787.0, 3626564.5, 19.2, 123.7, 0.0);

(487807.0, 3626564.5, 19.2, 123.7, 0.0); (487827.0, 3626564.5, 19.1, 123.7, 0.0);
(487847.0, 3626564.5, 18.9, 123.7, 0.0); (487867.0, 3626564.5, 19.1, 123.7, 0.0);
(487427.0, 3626584.5, 22.7, 119.3, 0.0); (487447.0, 3626584.5, 22.3, 119.9, 0.0);
(487467.0, 3626584.5, 22.0, 122.2, 0.0); (487487.0, 3626584.5, 21.5, 122.2, 0.0);
(487507.0, 3626584.5, 21.1, 122.2, 0.0); (487527.0, 3626584.5, 21.2, 122.2, 0.0);

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(487547.0, 3626584.5, 19.8, 122.9, 0.0); (487567.0, 3626584.5, 19.3, 123.3, 0.0);
(487587.0, 3626584.5, 19.5, 123.3, 0.0); (487607.0, 3626584.5, 20.1, 123.3, 0.0);
(487627.0, 3626584.5, 19.2, 123.3, 0.0); (487647.0, 3626584.5, 19.1, 123.3, 0.0);
(487667.0, 3626584.5, 19.3, 123.3, 0.0); (487687.0, 3626584.5, 19.3, 123.4, 0.0);
(487707.0, 3626584.5, 18.8, 123.4, 0.0); (487727.0, 3626584.5, 19.2, 123.6, 0.0);
(487747.0, 3626584.5, 19.1, 123.6, 0.0); (487767.0, 3626584.5, 18.9, 123.6, 0.0);
(487787.0, 3626584.5, 19.2, 123.6, 0.0); (487807.0, 3626584.5, 19.2, 123.6, 0.0);
(487827.0, 3626584.5, 19.2, 123.7, 0.0); (487847.0, 3626584.5, 19.3, 123.7, 0.0);
(487867.0, 3626584.5, 19.6, 123.7, 0.0); (487887.0, 3626584.5, 19.5, 123.7, 0.0);
(487907.0, 3626584.5, 19.1, 123.7, 0.0); (487427.0, 3626604.5, 22.8, 119.3, 0.0);
(487447.0, 3626604.5, 22.6, 119.3, 0.0); (487467.0, 3626604.5, 22.4, 119.3, 0.0);
(487487.0, 3626604.5, 21.9, 122.2, 0.0); (487507.0, 3626604.5, 21.4, 122.2, 0.0);
(487527.0, 3626604.5, 21.2, 122.2, 0.0); (487547.0, 3626604.5, 20.0, 122.2, 0.0);
(487567.0, 3626604.5, 19.2, 123.3, 0.0); (487587.0, 3626604.5, 18.9, 123.3, 0.0);

(487607.0, 3626604.5, 19.1, 123.3, 0.0); (487627.0, 3626604.5, 19.3, 123.3, 0.0);
(487647.0, 3626604.5, 19.4, 123.3, 0.0); (487667.0, 3626604.5, 19.5, 123.3, 0.0);
(487687.0, 3626604.5, 19.5, 123.3, 0.0); (487707.0, 3626604.5, 19.2, 123.4, 0.0);
(487727.0, 3626604.5, 19.4, 123.4, 0.0); (487747.0, 3626604.5, 19.5, 123.4, 0.0);
(487767.0, 3626604.5, 19.4, 123.6, 0.0); (487787.0, 3626604.5, 19.2, 123.6, 0.0);
(487807.0, 3626604.5, 19.8, 123.6, 0.0); (487827.0, 3626604.5, 19.8, 123.6, 0.0);
(487847.0, 3626604.5, 19.7, 123.6, 0.0); (487867.0, 3626604.5, 19.6, 123.6, 0.0);
(487887.0, 3626604.5, 19.4, 123.7, 0.0); (487907.0, 3626604.5, 19.1, 123.7, 0.0);
(487927.0, 3626604.5, 18.9, 123.7, 0.0); (487407.0, 3626624.5, 23.4, 101.5, 0.0);
(487427.0, 3626624.5, 23.0, 101.5, 0.0); (487447.0, 3626624.5, 22.9, 101.4, 0.0);
(487467.0, 3626624.5, 22.6, 119.3, 0.0); (487487.0, 3626624.5, 22.2, 121.7, 0.0);
(487507.0, 3626624.5, 21.8, 122.2, 0.0); (487527.0, 3626624.5, 21.4, 122.2, 0.0);
(487547.0, 3626624.5, 20.1, 122.2, 0.0); (487567.0, 3626624.5, 19.0, 122.4, 0.0);
(487587.0, 3626624.5, 18.4, 123.3, 0.0); (487607.0, 3626624.5, 18.5, 123.3, 0.0);
(487627.0, 3626624.5, 19.0, 123.3, 0.0); (487647.0, 3626624.5, 19.4, 123.3, 0.0);
(487667.0, 3626624.5, 19.6, 123.3, 0.0); (487687.0, 3626624.5, 19.6, 123.3, 0.0);
(487707.0, 3626624.5, 19.6, 123.3, 0.0); (487727.0, 3626624.5, 19.7, 123.3, 0.0);
(487747.0, 3626624.5, 19.7, 123.3, 0.0); (487767.0, 3626624.5, 19.7, 123.4, 0.0);
(487787.0, 3626624.5, 19.7, 123.4, 0.0); (487807.0, 3626624.5, 20.2, 123.4, 0.0);
(487827.0, 3626624.5, 20.3, 123.6, 0.0); (487847.0, 3626624.5, 20.1, 123.6, 0.0);
(487867.0, 3626624.5, 19.7, 123.6, 0.0); (487887.0, 3626624.5, 19.5, 123.6, 0.0);
(487907.0, 3626624.5, 19.1, 123.6, 0.0); (487927.0, 3626624.5, 19.0, 123.7, 0.0);
(487947.0, 3626624.5, 19.0, 123.7, 0.0); (487407.0, 3626644.5, 23.6, 101.5, 0.0);
(487427.0, 3626644.5, 23.5, 101.5, 0.0); (487447.0, 3626644.5, 23.2, 101.5, 0.0);
(487467.0, 3626644.5, 22.6, 101.5, 0.0); (487487.0, 3626644.5, 22.4, 119.3, 0.0);

(487507.0, 3626644.5,   22.2,   121.7,   0.0);   (487527.0,
3626644.5,   21.7,   122.2,   0.0);
(487547.0, 3626644.5,   20.0,   122.2,   0.0);   (487567.0,
3626644.5,   18.7,   122.2,   0.0);
(487587.0, 3626644.5,   18.2,   122.4,   0.0);   (487607.0,
3626644.5,   18.4,   123.3,   0.0);
(487627.0, 3626644.5,   18.5,   123.3,   0.0);   (487647.0,
3626644.5,   19.2,   123.3,   0.0);
(487667.0, 3626644.5,   19.6,   123.3,   0.0);   (487687.0,
3626644.5,   19.7,   123.3,   0.0);
(487707.0, 3626644.5,   19.9,   123.3,   0.0);   (487727.0,
3626644.5,   19.9,   123.3,   0.0);

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(487747.0, 3626644.5,   19.7,   123.3,   0.0);   (487767.0,
3626644.5,   19.7,   123.3,   0.0);
(487787.0, 3626644.5,   20.5,   123.3,   0.0);   (487807.0,
3626644.5,   20.5,   123.3,   0.0);
(487827.0, 3626644.5,   20.8,   123.3,   0.0);   (487847.0,
3626644.5,   20.5,   123.4,   0.0);
(487867.0, 3626644.5,   19.7,   123.6,   0.0);   (487887.0,
3626644.5,   19.8,   123.6,   0.0);
(487907.0, 3626644.5,   19.2,   123.6,   0.0);   (487927.0,
3626644.5,   18.9,   123.6,   0.0);
(487947.0, 3626644.5,   19.0,   123.6,   0.0);   (487967.0,
3626644.5,   18.8,   123.6,   0.0);
(487387.0, 3626664.5,   24.3,   101.5,   0.0);   (487407.0,
3626664.5,   24.0,   101.5,   0.0);
(487427.0, 3626664.5,   23.7,   101.5,   0.0);   (487447.0,
3626664.5,   23.5,   101.5,   0.0);
(487467.0, 3626664.5,   23.0,   101.5,   0.0);   (487487.0,
3626664.5,   22.7,   101.5,   0.0);
(487507.0, 3626664.5,   22.2,   119.3,   0.0);   (487527.0,
3626664.5,   21.1,   121.7,   0.0);
(487547.0, 3626664.5,   20.6,   122.2,   0.0);   (487567.0,
3626664.5,   20.2,   122.2,   0.0);
(487587.0, 3626664.5,   19.7,   122.2,   0.0);   (487607.0,
3626664.5,   19.2,   122.2,   0.0);
(487627.0, 3626664.5,   18.8,   122.4,   0.0);   (487647.0,
3626664.5,   19.1,   122.7,   0.0);

(487667.0, 3626664.5, 19.6, 123.3, 0.0); (487687.0,
3626664.5, 19.9, 123.3, 0.0);
(487707.0, 3626664.5, 20.1, 123.3, 0.0); (487727.0,
3626664.5, 19.9, 123.3, 0.0);
(487747.0, 3626664.5, 20.2, 123.3, 0.0); (487767.0,
3626664.5, 20.8, 123.3, 0.0);
(487787.0, 3626664.5, 20.9, 123.3, 0.0); (487807.0,
3626664.5, 20.8, 123.3, 0.0);
(487827.0, 3626664.5, 20.9, 123.3, 0.0); (487847.0,
3626664.5, 20.8, 123.3, 0.0);
(487867.0, 3626664.5, 20.4, 123.3, 0.0); (487887.0,
3626664.5, 20.6, 123.4, 0.0);
(487907.0, 3626664.5, 20.3, 123.4, 0.0); (487927.0,
3626664.5, 19.7, 123.6, 0.0);
(487947.0, 3626664.5, 18.9, 123.6, 0.0); (487967.0,
3626664.5, 18.8, 123.6, 0.0);
(487987.0, 3626664.5, 18.8, 123.6, 0.0); (487387.0,
3626684.5, 24.8, 101.5, 0.0);
(487407.0, 3626684.5, 24.6, 101.5, 0.0); (487427.0,
3626684.5, 24.2, 101.5, 0.0);
(487447.0, 3626684.5, 23.8, 101.5, 0.0); (487467.0,
3626684.5, 23.4, 101.5, 0.0);
(487487.0, 3626684.5, 22.9, 101.5, 0.0); (487507.0,
3626684.5, 22.2, 101.5, 0.0);
(487527.0, 3626684.5, 21.1, 119.3, 0.0); (487547.0,
3626684.5, 21.0, 121.7, 0.0);
(487567.0, 3626684.5, 21.0, 122.2, 0.0); (487587.0,
3626684.5, 20.7, 122.2, 0.0);
(487607.0, 3626684.5, 20.1, 122.2, 0.0); (487627.0,
3626684.5, 19.5, 122.2, 0.0);
(487647.0, 3626684.5, 19.4, 122.2, 0.0); (487667.0,
3626684.5, 19.6, 122.4, 0.0);
(487687.0, 3626684.5, 20.1, 122.4, 0.0); (487707.0,
3626684.5, 20.2, 123.3, 0.0);
(487727.0, 3626684.5, 20.3, 123.3, 0.0); (487747.0,
3626684.5, 20.9, 123.3, 0.0);
(487767.0, 3626684.5, 21.4, 123.3, 0.0); (487787.0,
3626684.5, 21.2, 123.3, 0.0);
(487807.0, 3626684.5, 21.0, 123.3, 0.0); (487827.0,
3626684.5, 21.0, 123.3, 0.0);
(487847.0, 3626684.5, 21.0, 123.3, 0.0); (487867.0,
3626684.5, 21.0, 123.3, 0.0);
(487887.0, 3626684.5, 21.1, 123.3, 0.0); (487907.0,
3626684.5, 20.9, 123.4, 0.0);
(487927.0, 3626684.5, 20.2, 123.4, 0.0); (487947.0,
3626684.5, 19.3, 123.6, 0.0);
(487967.0, 3626684.5, 18.9, 123.6, 0.0); (487987.0,
3626684.5, 18.9, 123.6, 0.0);
(488007.0, 3626684.5, 19.0, 123.6, 0.0); (487367.0,
3626704.5, 25.6, 114.0, 0.0);

```
  (    487387.0, 3626704.5,      25.5,     112.6,       0.0);       (    487407.0,
3626704.5,      25.4,     101.5,       0.0);
  (    487427.0, 3626704.5,      25.1,     101.5,       0.0);       (    487447.0,
3626704.5,      24.1,     101.5,       0.0);
  (    487467.0, 3626704.5,      23.7,     101.5,       0.0);       (    487487.0,
3626704.5,      23.0,     101.5,       0.0);
  (    487507.0, 3626704.5,      22.4,     101.5,       0.0);       (    487527.0,
3626704.5,      21.9,     101.5,       0.0);
  (    487547.0, 3626704.5,      21.4,     101.5,       0.0);       (    487567.0,
3626704.5,      21.2,     121.7,       0.0);
  (    487587.0, 3626704.5,      21.2,     122.2,       0.0);       (    487607.0,
3626704.5,      21.2,     122.2,       0.0);
  (    487627.0, 3626704.5,      20.7,     122.2,       0.0);       (    487647.0,
3626704.5,      20.0,     122.2,       0.0);
```


*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

```
  (    487667.0, 3626704.5,      19.8,     122.2,       0.0);       (    487687.0,
3626704.5,      20.0,     122.2,       0.0);
  (    487707.0, 3626704.5,      20.3,     122.4,       0.0);       (    487727.0,
3626704.5,      21.0,     122.4,       0.0);
  (    487747.0, 3626704.5,      21.6,     122.4,       0.0);       (    487767.0,
3626704.5,      21.7,     122.4,       0.0);
  (    487787.0, 3626704.5,      21.4,     123.3,       0.0);       (    487807.0,
3626704.5,      21.1,     123.3,       0.0);
  (    487827.0, 3626704.5,      21.1,     123.3,       0.0);       (    487847.0,
3626704.5,      21.2,     123.3,       0.0);
  (    487867.0, 3626704.5,      21.4,     123.3,       0.0);       (    487887.0,
3626704.5,      21.4,     123.3,       0.0);
  (    487907.0, 3626704.5,      20.8,     123.3,       0.0);       (    487927.0,
3626704.5,      20.4,     123.4,       0.0);
  (    487947.0, 3626704.5,      20.1,     123.5,       0.0);       (    487967.0,
3626704.5,      19.2,     123.5,       0.0);
  (    487987.0, 3626704.5,      19.1,     123.5,       0.0);       (    488007.0,
3626704.5,      19.2,     123.5,       0.0);
  (    488027.0, 3626704.5,      19.3,     123.6,       0.0);       (    487387.0,
3626724.5,      26.1,     114.9,       0.0);
  (    487407.0, 3626724.5,      25.6,     114.0,       0.0);       (    487427.0,
3626724.5,      25.0,     114.0,       0.0);
  (    487447.0, 3626724.5,      24.5,     114.0,       0.0);       (    487467.0,
3626724.5,      24.2,     112.6,       0.0);
```

(487487.0, 3626724.5, 23.8, 101.5, 0.0); (487507.0, 3626724.5, 23.2, 101.5, 0.0);
(487527.0, 3626724.5, 22.5, 101.5, 0.0); (487547.0, 3626724.5, 22.2, 101.5, 0.0);
(487567.0, 3626724.5, 21.9, 101.5, 0.0); (487587.0, 3626724.5, 21.5, 121.7, 0.0);
(487607.0, 3626724.5, 20.9, 122.2, 0.0); (487627.0, 3626724.5, 20.8, 122.2, 0.0);
(487647.0, 3626724.5, 20.4, 122.2, 0.0); (487667.0, 3626724.5, 20.2, 122.2, 0.0);
(487687.0, 3626724.5, 20.3, 122.2, 0.0); (487707.0, 3626724.5, 20.5, 122.2, 0.0);
(487727.0, 3626724.5, 21.4, 122.2, 0.0); (487747.0, 3626724.5, 21.8, 122.2, 0.0);
(487767.0, 3626724.5, 21.8, 122.2, 0.0); (487787.0, 3626724.5, 21.8, 122.4, 0.0);
(487807.0, 3626724.5, 21.9, 122.4, 0.0); (487827.0, 3626724.5, 21.4, 123.3, 0.0);
(487847.0, 3626724.5, 21.0, 123.3, 0.0); (487867.0, 3626724.5, 21.3, 123.3, 0.0);
(487887.0, 3626724.5, 21.4, 123.3, 0.0); (487907.0, 3626724.5, 20.7, 123.3, 0.0);
(487927.0, 3626724.5, 20.2, 123.4, 0.0); (487947.0, 3626724.5, 19.8, 123.4, 0.0);
(487967.0, 3626724.5, 19.4, 123.5, 0.0); (487987.0, 3626724.5, 19.2, 123.5, 0.0);
(488007.0, 3626724.5, 19.2, 123.5, 0.0); (488027.0, 3626724.5, 19.3, 123.5, 0.0);
(488047.0, 3626724.5, 19.4, 123.5, 0.0); (487407.0, 3626744.5, 26.0, 114.9, 0.0);
(487427.0, 3626744.5, 25.1, 114.9, 0.0); (487447.0, 3626744.5, 25.0, 114.9, 0.0);
(487467.0, 3626744.5, 24.7, 114.9, 0.0); (487487.0, 3626744.5, 24.3, 114.0, 0.0);
(487507.0, 3626744.5, 23.8, 114.0, 0.0); (487527.0, 3626744.5, 23.0, 114.0, 0.0);
(487547.0, 3626744.5, 22.9, 101.5, 0.0); (487567.0, 3626744.5, 22.6, 101.5, 0.0);
(487587.0, 3626744.5, 21.9, 101.5, 0.0); (487607.0, 3626744.5, 20.9, 121.7, 0.0);
(487627.0, 3626744.5, 21.0, 122.2, 0.0); (487647.0, 3626744.5, 20.9, 122.2, 0.0);
(487667.0, 3626744.5, 20.8, 122.2, 0.0); (487687.0, 3626744.5, 20.7, 122.2, 0.0);
(487707.0, 3626744.5, 20.7, 122.2, 0.0); (487727.0, 3626744.5, 21.5, 122.2, 0.0);
(487747.0, 3626744.5, 21.8, 122.2, 0.0); (487767.0, 3626744.5, 21.9, 122.2, 0.0);
(487787.0, 3626744.5, 22.1, 122.2, 0.0); (487807.0, 3626744.5, 22.4, 122.2, 0.0);

(487827.0, 3626744.5, 21.8, 122.4, 0.0); (487847.0, 3626744.5, 21.2, 122.4, 0.0);
(487867.0, 3626744.5, 21.2, 123.3, 0.0); (487887.0, 3626744.5, 21.2, 123.3, 0.0);
(487907.0, 3626744.5, 20.6, 123.3, 0.0); (487927.0, 3626744.5, 20.1, 123.3, 0.0);
(487947.0, 3626744.5, 19.8, 123.4, 0.0); (487967.0, 3626744.5, 19.7, 123.5, 0.0);
(487987.0, 3626744.5, 19.5, 123.5, 0.0); (488007.0, 3626744.5, 19.4, 123.5, 0.0);
(488027.0, 3626744.5, 19.4, 123.5, 0.0); (488047.0, 3626744.5, 19.6, 123.5, 0.0);
(488067.0, 3626744.5, 19.6, 123.5, 0.0); (487447.0, 3626764.5, 25.5, 115.4, 0.0);
(487467.0, 3626764.5, 25.4, 115.4, 0.0); (487487.0, 3626764.5, 24.6, 115.4, 0.0);

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(487507.0, 3626764.5, 23.7, 115.4, 0.0); (487527.0, 3626764.5, 23.3, 114.9, 0.0);
(487547.0, 3626764.5, 23.4, 114.9, 0.0); (487567.0, 3626764.5, 23.0, 101.5, 0.0);
(487587.0, 3626764.5, 22.4, 101.5, 0.0); (487607.0, 3626764.5, 21.9, 101.5, 0.0);
(487627.0, 3626764.5, 21.4, 101.5, 0.0); (487647.0, 3626764.5, 21.4, 121.7, 0.0);
(487667.0, 3626764.5, 21.4, 122.2, 0.0); (487687.0, 3626764.5, 21.3, 122.2, 0.0);
(487707.0, 3626764.5, 21.0, 122.2, 0.0); (487727.0, 3626764.5, 21.2, 122.2, 0.0);
(487747.0, 3626764.5, 21.6, 122.2, 0.0); (487767.0, 3626764.5, 22.0, 122.2, 0.0);
(487787.0, 3626764.5, 22.4, 122.2, 0.0); (487807.0, 3626764.5, 22.4, 122.2, 0.0);
(487827.0, 3626764.5, 22.3, 122.2, 0.0); (487847.0, 3626764.5, 21.9, 122.2, 0.0);
(487867.0, 3626764.5, 21.1, 122.4, 0.0); (487887.0, 3626764.5, 20.9, 122.4, 0.0);
(487907.0, 3626764.5, 20.6, 123.3, 0.0); (487927.0, 3626764.5, 20.2, 123.3, 0.0);

(487947.0, 3626764.5, 19.9, 123.4, 0.0); (487967.0,
3626764.5, 20.1, 123.4, 0.0);
(487987.0, 3626764.5, 20.2, 123.5, 0.0); (488007.0,
3626764.5, 20.2, 123.5, 0.0);
(488027.0, 3626764.5, 19.9, 123.5, 0.0); (488047.0,
3626764.5, 19.4, 123.5, 0.0);
(488067.0, 3626764.5, 19.6, 123.5, 0.0); (488087.0,
3626764.5, 19.6, 123.5, 0.0);
(487467.0, 3626784.5, 25.1, 115.4, 0.0); (487487.0,
3626784.5, 24.4, 115.4, 0.0);
(487507.0, 3626784.5, 24.0, 115.4, 0.0); (487527.0,
3626784.5, 24.1, 115.4, 0.0);
(487547.0, 3626784.5, 23.7, 115.4, 0.0); (487567.0,
3626784.5, 23.3, 114.9, 0.0);
(487587.0, 3626784.5, 22.9, 114.9, 0.0); (487607.0,
3626784.5, 22.7, 101.5, 0.0);
(487627.0, 3626784.5, 22.5, 101.5, 0.0); (487647.0,
3626784.5, 22.2, 101.5, 0.0);
(487667.0, 3626784.5, 22.0, 101.5, 0.0); (487687.0,
3626784.5, 21.9, 121.7, 0.0);
(487707.0, 3626784.5, 21.9, 122.2, 0.0); (487727.0,
3626784.5, 21.6, 122.2, 0.0);
(487747.0, 3626784.5, 21.6, 122.2, 0.0); (487767.0,
3626784.5, 22.0, 122.2, 0.0);
(487787.0, 3626784.5, 22.5, 122.2, 0.0); (487807.0,
3626784.5, 22.4, 122.2, 0.0);
(487827.0, 3626784.5, 22.3, 122.2, 0.0); (487847.0,
3626784.5, 22.1, 122.2, 0.0);
(487867.0, 3626784.5, 21.8, 122.2, 0.0); (487887.0,
3626784.5, 21.2, 122.2, 0.0);
(487907.0, 3626784.5, 20.8, 122.2, 0.0); (487927.0,
3626784.5, 20.6, 122.4, 0.0);
(487947.0, 3626784.5, 20.5, 123.3, 0.0); (487967.0,
3626784.5, 20.4, 123.4, 0.0);
(487987.0, 3626784.5, 20.4, 123.4, 0.0); (488007.0,
3626784.5, 20.3, 123.5, 0.0);
(488027.0, 3626784.5, 20.2, 123.5, 0.0); (488047.0,
3626784.5, 19.9, 123.5, 0.0);
(487507.0, 3626804.5, 24.4, 115.4, 0.0); (487527.0,
3626804.5, 24.6, 115.4, 0.0);
(487547.0, 3626804.5, 24.0, 115.4, 0.0); (487567.0,
3626804.5, 23.7, 115.4, 0.0);
(487587.0, 3626804.5, 23.4, 115.4, 0.0); (487607.0,
3626804.5, 23.2, 114.9, 0.0);
(487627.0, 3626804.5, 23.4, 101.5, 0.0); (487647.0,
3626804.5, 22.9, 101.5, 0.0);
(487667.0, 3626804.5, 22.4, 101.5, 0.0); (487687.0,
3626804.5, 22.4, 101.5, 0.0);
(487707.0, 3626804.5, 22.6, 101.4, 0.0); (487727.0,
3626804.5, 22.2, 121.7, 0.0);

```
  (    487747.0, 3626804.5,      22.0,     122.2,       0.0);       (    487767.0,
3626804.5,      22.2,     122.2,       0.0);
  (    487787.0, 3626804.5,      22.4,     122.2,       0.0);       (    487807.0,
3626804.5,      22.4,     122.2,       0.0);
  (    487827.0, 3626804.5,      22.3,     122.2,       0.0);       (    487847.0,
3626804.5,      22.3,     122.2,       0.0);
  (    487867.0, 3626804.5,      22.3,     122.2,       0.0);       (    487887.0,
3626804.5,      21.6,     122.2,       0.0);
  (    487907.0, 3626804.5,      21.1,     122.2,       0.0);       (    487927.0,
3626804.5,      20.9,     122.2,       0.0);
  (    487947.0, 3626804.5,      20.9,     122.8,       0.0);       (    487967.0,
3626804.5,      20.8,     123.3,       0.0);
  (    487987.0, 3626804.5,      20.6,     123.4,       0.0);       (    487527.0,
3626824.5,      24.5,     115.4,       0.0);
  (    487547.0, 3626824.5,      24.5,     115.4,       0.0);       (    487567.0,
3626824.5,      24.3,     115.4,       0.0);
  (    487587.0, 3626824.5,      23.8,     115.4,       0.0);       (    487607.0,
3626824.5,      23.2,     115.4,       0.0);
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                                                    ***  DISCRETE CARTESIAN RECEPTORS ***
                                                   (X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
                                                                   (METERS)

  (    487627.0, 3626824.5,      23.3,     115.4,       0.0);       (    487647.0,
3626824.5,      23.0,     114.9,       0.0);
  (    487667.0, 3626824.5,      22.7,     101.5,       0.0);       (    487687.0,
3626824.5,      22.6,     101.5,       0.0);
  (    487707.0, 3626824.5,      22.6,     101.5,       0.0);       (    487727.0,
3626824.5,      22.9,     101.4,       0.0);
  (    487747.0, 3626824.5,      23.0,     101.2,       0.0);       (    487767.0,
3626824.5,      22.8,     101.2,       0.0);
  (    487787.0, 3626824.5,      22.3,     122.2,       0.0);       (    487807.0,
3626824.5,      22.4,     122.2,       0.0);
  (    487827.0, 3626824.5,      22.4,     122.2,       0.0);       (    487847.0,
3626824.5,      22.4,     122.2,       0.0);
  (    487867.0, 3626824.5,      22.4,     122.2,       0.0);       (    487887.0,
3626824.5,      22.4,     122.2,       0.0);
  (    487547.0, 3626844.5,      24.7,     115.4,       0.0);       (    487567.0,
3626844.5,      24.4,     115.4,       0.0);
  (    487587.0, 3626844.5,      23.9,     115.4,       0.0);       (    487607.0,
3626844.5,      23.5,     115.4,       0.0);
  (    487627.0, 3626844.5,      23.4,     115.4,       0.0);       (    487647.0,
3626844.5,      23.1,     115.4,       0.0);
```

(487667.0, 3626844.5, 23.0, 115.4, 0.0); (487687.0, 3626844.5, 23.0, 101.5, 0.0);
(487707.0, 3626844.5, 22.8, 101.5, 0.0); (487727.0, 3626844.5, 23.1, 101.5, 0.0);
(487747.0, 3626844.5, 23.0, 101.4, 0.0); (487767.0, 3626844.5, 22.8, 101.2, 0.0);
(487787.0, 3626844.5, 22.6, 101.2, 0.0); (487807.0, 3626844.5, 22.5, 100.7, 0.0);
(487827.0, 3626844.5, 22.5, 122.2, 0.0); (487847.0, 3626844.5, 22.4, 122.2, 0.0);
(487547.0, 3626864.5, 25.0, 115.8, 0.0); (487567.0, 3626864.5, 24.4, 115.8, 0.0);
(487587.0, 3626864.5, 24.1, 115.8, 0.0); (487607.0, 3626864.5, 23.8, 115.4, 0.0);
(487627.0, 3626864.5, 23.7, 115.4, 0.0); (487647.0, 3626864.5, 23.4, 115.4, 0.0);
(487667.0, 3626864.5, 23.3, 115.4, 0.0); (487687.0, 3626864.5, 23.4, 115.4, 0.0);
(487707.0, 3626864.5, 23.1, 111.4, 0.0); (487727.0, 3626864.5, 23.1, 109.4, 0.0);
(487747.0, 3626864.5, 22.9, 101.5, 0.0); (487767.0, 3626864.5, 22.8, 101.4, 0.0);
(487787.0, 3626864.5, 22.9, 101.2, 0.0); (487807.0, 3626864.5, 22.7, 100.7, 0.0);
(487567.0, 3626884.5, 25.0, 115.8, 0.0); (487587.0, 3626884.5, 24.3, 115.8, 0.0);
(487607.0, 3626884.5, 24.1, 115.8, 0.0); (487627.0, 3626884.5, 24.5, 115.4, 0.0);
(487647.0, 3626884.5, 23.9, 115.4, 0.0); (487667.0, 3626884.5, 23.5, 115.4, 0.0);
(487687.0, 3626884.5, 23.4, 115.4, 0.0); (487707.0, 3626884.5, 23.1, 115.4, 0.0);
(487727.0, 3626884.5, 23.1, 114.0, 0.0); (487747.0, 3626884.5, 23.1, 109.4, 0.0);
(487767.0, 3626884.5, 23.1, 109.4, 0.0); (487787.0, 3626884.5, 23.2, 101.4, 0.0);
(487587.0, 3626904.5, 24.7, 115.8, 0.0); (487607.0, 3626904.5, 24.3, 115.8, 0.0);
(487627.0, 3626904.5, 24.7, 115.8, 0.0); (487647.0, 3626904.5, 24.4, 115.4, 0.0);
(487667.0, 3626904.5, 24.1, 115.4, 0.0); (487687.0, 3626904.5, 23.9, 115.4, 0.0);
(487707.0, 3626904.5, 23.5, 115.4, 0.0); (487727.0, 3626904.5, 23.4, 115.4, 0.0);
(487747.0, 3626904.5, 23.4, 114.0, 0.0); (487767.0, 3626904.5, 23.3, 109.4, 0.0);
(487627.0, 3626924.5, 24.6, 115.8, 0.0); (487647.0, 3626924.5, 24.7, 115.8, 0.0);
(487667.0, 3626924.5, 24.7, 115.5, 0.0); (487687.0, 3626924.5, 24.5, 115.4, 0.0);

(487707.0, 3626924.5, 24.1, 115.4, 0.0); (487727.0, 3626924.5, 23.9, 115.4, 0.0);
(487747.0, 3626924.5, 23.7, 115.4, 0.0); (487647.0, 3626944.5, 24.7, 115.8, 0.0);
(487667.0, 3626944.5, 24.6, 115.8, 0.0); (487687.0, 3626944.5, 24.5, 115.8, 0.0);
(487707.0, 3626944.5, 24.5, 115.4, 0.0); (487727.0, 3626944.5, 24.4, 115.4, 0.0);
(487667.0, 3626964.5, 24.7, 115.8, 0.0); (487687.0, 3626964.5, 24.6, 115.8, 0.0);
(487707.0, 3626964.5, 24.7, 115.5, 0.0); (487687.0, 3626984.5, 24.9, 115.8, 0.0);
(488242.2, 3625436.4, 122.1, 122.1, 0.0); (488262.2, 3625436.4, 122.5, 122.5, 0.0);
(488242.2, 3625456.4, 122.1, 122.1, 0.0); (488262.2, 3625456.4, 122.5, 122.5, 0.0);
(488282.2, 3625456.4, 122.7, 122.7, 0.0); (488302.2, 3625456.4, 123.5, 123.5, 0.0);
(488322.2, 3625456.4, 123.5, 123.5, 0.0); (488242.2, 3625476.4, 122.1, 122.1, 0.0);

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(488262.2, 3625476.4, 122.6, 122.6, 0.0); (488282.2, 3625476.4, 122.8, 122.8, 0.0);
(488302.2, 3625476.4, 123.5, 123.5, 0.0); (488322.2, 3625476.4, 123.5, 123.5, 0.0);
(488342.2, 3625476.4, 123.3, 123.3, 0.0); (488362.2, 3625476.4, 123.1, 123.1, 0.0);
(488242.2, 3625496.4, 122.1, 122.1, 0.0); (488262.2, 3625496.4, 122.6, 122.6, 0.0);
(488282.2, 3625496.4, 122.8, 122.8, 0.0); (488302.2, 3625496.4, 123.1, 123.1, 0.0);
(488322.2, 3625496.4, 123.0, 123.0, 0.0); (488342.2, 3625496.4, 122.9, 122.9, 0.0);
(488362.2, 3625496.4, 122.8, 122.8, 0.0); (488382.2, 3625496.4, 122.8, 122.8, 0.0);
(488402.2, 3625496.4, 122.7, 122.7, 0.0); (488422.2, 3625496.4, 122.6, 122.6, 0.0);
(488242.2, 3625516.4, 122.3, 122.3, 0.0); (488262.2, 3625516.4, 122.8, 122.8, 0.0);

(488282.2, 3625516.4, 123.1, 123.1, 0.0); (488302.2, 3625516.4, 123.2, 123.2, 0.0);
(488322.2, 3625516.4, 123.1, 123.1, 0.0); (488342.2, 3625516.4, 123.0, 123.0, 0.0);
(488362.2, 3625516.4, 123.0, 123.0, 0.0); (488382.2, 3625516.4, 123.0, 123.0, 0.0);
(488402.2, 3625516.4, 122.9, 122.9, 0.0); (488422.2, 3625516.4, 122.6, 122.6, 0.0);
(488442.2, 3625516.4, 122.4, 122.4, 0.0); (488462.2, 3625516.4, 122.2, 122.2, 0.0);
(488482.2, 3625516.4, 122.2, 122.2, 0.0); (488222.2, 3625536.4, 120.7, 122.1, 0.0);
(488242.2, 3625536.4, 122.5, 122.5, 0.0); (488262.2, 3625536.4, 123.0, 123.0, 0.0);
(488282.2, 3625536.4, 123.6, 123.6, 0.0); (488302.2, 3625536.4, 123.7, 123.7, 0.0);
(488322.2, 3625536.4, 123.5, 123.5, 0.0); (488342.2, 3625536.4, 123.4, 123.4, 0.0);
(488362.2, 3625536.4, 123.4, 123.4, 0.0); (488382.2, 3625536.4, 123.3, 123.3, 0.0);
(488402.2, 3625536.4, 123.1, 123.1, 0.0); (488422.2, 3625536.4, 122.7, 122.7, 0.0);
(488442.2, 3625536.4, 122.3, 122.3, 0.0); (488462.2, 3625536.4, 122.2, 122.2, 0.0);
(488482.2, 3625536.4, 122.2, 122.2, 0.0); (488502.2, 3625536.4, 122.5, 122.5, 0.0);
(488522.2, 3625536.4, 122.7, 122.7, 0.0); (488542.2, 3625536.4, 122.7, 122.7, 0.0);
(488222.2, 3625556.4, 121.7, 121.7, 0.0); (488242.2, 3625556.4, 122.7, 122.7, 0.0);
(488262.2, 3625556.4, 123.2, 123.2, 0.0); (488282.2, 3625556.4, 123.7, 123.7, 0.0);
(488302.2, 3625556.4, 123.6, 123.6, 0.0); (488322.2, 3625556.4, 123.4, 123.4, 0.0);
(488342.2, 3625556.4, 123.3, 123.3, 0.0); (488362.2, 3625556.4, 123.1, 123.1, 0.0);
(488382.2, 3625556.4, 122.6, 122.6, 0.0); (488402.2, 3625556.4, 122.3, 122.3, 0.0);
(488422.2, 3625556.4, 122.0, 122.0, 0.0); (488442.2, 3625556.4, 121.9, 121.9, 0.0);
(488462.2, 3625556.4, 122.0, 122.0, 0.0); (488482.2, 3625556.4, 122.0, 122.0, 0.0);
(488502.2, 3625556.4, 122.1, 122.1, 0.0); (488522.2, 3625556.4, 122.2, 122.2, 0.0);
(488542.2, 3625556.4, 122.2, 122.2, 0.0); (488562.2, 3625556.4, 122.4, 122.4, 0.0);
(488202.2, 3625576.4, 121.6, 121.6, 0.0); (488222.2, 3625576.4, 122.5, 122.5, 0.0);
(488242.2, 3625576.4, 123.0, 123.0, 0.0); (488262.2, 3625576.4, 123.4, 123.4, 0.0);

(488282.2, 3625576.4, 123.7, 123.7, 0.0); (488302.2, 3625576.4, 123.5, 123.5, 0.0);
(488322.2, 3625576.4, 123.2, 123.2, 0.0); (488342.2, 3625576.4, 123.0, 123.0, 0.0);
(488362.2, 3625576.4, 122.6, 122.6, 0.0); (488382.2, 3625576.4, 122.0, 122.0, 0.0);
(488402.2, 3625576.4, 121.8, 121.8, 0.0); (488422.2, 3625576.4, 121.7, 121.7, 0.0);
(488442.2, 3625576.4, 121.6, 121.6, 0.0); (488462.2, 3625576.4, 121.6, 121.6, 0.0);
(488482.2, 3625576.4, 121.6, 121.6, 0.0); (488502.2, 3625576.4, 121.7, 121.7, 0.0);
(488522.2, 3625576.4, 121.9, 121.9, 0.0); (488542.2, 3625576.4, 122.1, 122.1, 0.0);
(488562.2, 3625576.4, 122.2, 122.2, 0.0); (488582.2, 3625576.4, 122.5, 122.5, 0.0);
(488122.2, 3625596.4, 122.6, 122.6, 0.0); (488142.2, 3625596.4, 122.6, 122.6, 0.0);
(488162.2, 3625596.4, 122.6, 122.6, 0.0); (488182.2, 3625596.4, 122.8, 122.8, 0.0);
(488202.2, 3625596.4, 122.9, 122.9, 0.0); (488222.2, 3625596.4, 123.0, 123.0, 0.0);

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(488242.2, 3625596.4, 123.4, 123.4, 0.0); (488262.2, 3625596.4, 123.6, 123.6, 0.0);
(488282.2, 3625596.4, 123.6, 123.6, 0.0); (488302.2, 3625596.4, 123.6, 123.6, 0.0);
(488322.2, 3625596.4, 123.1, 123.1, 0.0); (488342.2, 3625596.4, 122.5, 122.5, 0.0);
(488362.2, 3625596.4, 121.8, 121.8, 0.0); (488382.2, 3625596.4, 121.5, 121.5, 0.0);
(488402.2, 3625596.4, 121.6, 121.6, 0.0); (488422.2, 3625596.4, 121.6, 121.6, 0.0);
(488522.2, 3625596.4, 121.9, 121.9, 0.0); (488542.2, 3625596.4, 122.2, 122.2, 0.0);
(488562.2, 3625596.4, 122.1, 122.1, 0.0); (488582.2, 3625596.4, 122.2, 122.2, 0.0);
(488602.2, 3625596.4, 122.6, 122.6, 0.0); (488062.2, 3625616.4, 122.6, 122.6, 0.0);

(488082.2, 3625616.4, 122.8, 122.8, 0.0); (488102.2, 3625616.4, 122.8, 122.8, 0.0);
(488122.2, 3625616.4, 122.7, 122.7, 0.0); (488142.2, 3625616.4, 122.7, 122.7, 0.0);
(488162.2, 3625616.4, 122.9, 122.9, 0.0); (488182.2, 3625616.4, 123.1, 123.1, 0.0);
(488202.2, 3625616.4, 123.4, 123.4, 0.0); (488222.2, 3625616.4, 123.5, 123.5, 0.0);
(488242.2, 3625616.4, 123.6, 123.6, 0.0); (488262.2, 3625616.4, 123.6, 123.6, 0.0);
(488282.2, 3625616.4, 123.4, 123.4, 0.0); (488302.2, 3625616.4, 123.2, 123.2, 0.0);
(488322.2, 3625616.4, 122.9, 122.9, 0.0); (488342.2, 3625616.4, 122.3, 122.3, 0.0);
(488362.2, 3625616.4, 121.6, 121.6, 0.0); (488382.2, 3625616.4, 121.3, 121.3, 0.0);
(488402.2, 3625616.4, 118.5, 121.7, 0.0); (488522.2, 3625616.4, 121.9, 121.9, 0.0);
(488542.2, 3625616.4, 122.1, 122.1, 0.0); (488562.2, 3625616.4, 122.3, 122.3, 0.0);
(488582.2, 3625616.4, 122.3, 122.3, 0.0); (488602.2, 3625616.4, 122.6, 122.6, 0.0);
(488062.2, 3625636.4, 122.2, 122.2, 0.0); (488082.2, 3625636.4, 122.9, 122.9, 0.0);
(488102.2, 3625636.4, 122.9, 122.9, 0.0); (488122.2, 3625636.4, 122.9, 122.9, 0.0);
(488142.2, 3625636.4, 123.0, 123.0, 0.0); (488162.2, 3625636.4, 123.1, 123.1, 0.0);
(488182.2, 3625636.4, 123.4, 123.4, 0.0); (488202.2, 3625636.4, 123.6, 123.6, 0.0);
(488222.2, 3625636.4, 123.6, 123.6, 0.0); (488242.2, 3625636.4, 123.6, 123.6, 0.0);
(488262.2, 3625636.4, 123.4, 123.4, 0.0); (488282.2, 3625636.4, 123.3, 123.3, 0.0);
(488302.2, 3625636.4, 123.0, 123.0, 0.0); (488322.2, 3625636.4, 122.6, 122.6, 0.0);
(488342.2, 3625636.4, 122.0, 122.0, 0.0); (488362.2, 3625636.4, 121.4, 121.4, 0.0);
(488382.2, 3625636.4, 121.1, 121.1, 0.0); (488522.2, 3625636.4, 121.9, 121.9, 0.0);
(488542.2, 3625636.4, 122.1, 122.1, 0.0); (488562.2, 3625636.4, 122.4, 122.4, 0.0);
(488582.2, 3625636.4, 122.4, 122.4, 0.0); (488602.2, 3625636.4, 122.5, 122.5, 0.0);
(488622.2, 3625636.4, 122.8, 122.8, 0.0); (488062.2, 3625656.4, 121.0, 122.9, 0.0);
(488082.2, 3625656.4, 123.0, 123.0, 0.0); (488102.2, 3625656.4, 123.2, 123.2, 0.0);
(488122.2, 3625656.4, 123.2, 123.2, 0.0); (488142.2, 3625656.4, 123.3, 123.3, 0.0);

(488162.2, 3625656.4, 123.3, 123.3, 0.0); (488182.2, 3625656.4, 123.4, 123.4, 0.0);
(488202.2, 3625656.4, 123.4, 123.4, 0.0); (488222.2, 3625656.4, 123.5, 123.5, 0.0);
(488242.2, 3625656.4, 123.3, 123.3, 0.0); (488262.2, 3625656.4, 123.2, 123.2, 0.0);
(488282.2, 3625656.4, 123.2, 123.2, 0.0); (488302.2, 3625656.4, 122.9, 122.9, 0.0);
(488322.2, 3625656.4, 122.3, 122.3, 0.0); (488342.2, 3625656.4, 121.7, 121.7, 0.0);
(488362.2, 3625656.4, 121.2, 121.2, 0.0); (488382.2, 3625656.4, 121.0, 121.0, 0.0);
(488522.2, 3625656.4, 121.9, 121.9, 0.0); (488542.2, 3625656.4, 122.2, 122.2, 0.0);
(488582.2, 3625656.4, 122.5, 122.5, 0.0); (488602.2, 3625656.4, 122.5, 122.5, 0.0);
(488622.2, 3625656.4, 122.8, 122.8, 0.0); (488642.2, 3625656.4, 123.0, 123.0, 0.0);
(488062.2, 3625676.4, 122.1, 122.1, 0.0); (488082.2, 3625676.4, 123.0, 123.0, 0.0);
(488102.2, 3625676.4, 123.0, 123.0, 0.0); (488122.2, 3625676.4, 123.0, 123.0, 0.0);
(488142.2, 3625676.4, 123.1, 123.1, 0.0); (488162.2, 3625676.4, 123.1, 123.1, 0.0);

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(488182.2, 3625676.4, 123.2, 123.2, 0.0); (488202.2, 3625676.4, 123.4, 123.4, 0.0);
(488222.2, 3625676.4, 123.5, 123.5, 0.0); (488242.2, 3625676.4, 123.5, 123.5, 0.0);
(488262.2, 3625676.4, 123.3, 123.3, 0.0); (488282.2, 3625676.4, 123.2, 123.2, 0.0);
(488302.2, 3625676.4, 122.9, 122.9, 0.0); (488322.2, 3625676.4, 122.2, 122.2, 0.0);
(488342.2, 3625676.4, 121.5, 121.5, 0.0); (488362.2, 3625676.4, 121.3, 121.3, 0.0);
(488382.2, 3625676.4, 121.6, 121.6, 0.0); (488582.2, 3625676.4, 122.5, 122.5, 0.0);
(488602.2, 3625676.4, 122.5, 122.5, 0.0); (488622.2, 3625676.4, 122.5, 122.5, 0.0);

(488642.2, 3625676.4, 122.7, 122.7, 0.0); (488062.2, 3625696.4, 122.7, 122.7, 0.0);
(488082.2, 3625696.4, 122.6, 122.6, 0.0); (488102.2, 3625696.4, 122.4, 122.4, 0.0);
(488122.2, 3625696.4, 122.5, 122.5, 0.0); (488142.2, 3625696.4, 122.8, 122.8, 0.0);
(488162.2, 3625696.4, 123.0, 123.0, 0.0); (488182.2, 3625696.4, 123.0, 123.0, 0.0);
(488202.2, 3625696.4, 123.3, 123.3, 0.0); (488222.2, 3625696.4, 123.3, 123.3, 0.0);
(488242.2, 3625696.4, 123.4, 123.4, 0.0); (488262.2, 3625696.4, 123.3, 123.3, 0.0);
(488282.2, 3625696.4, 122.9, 122.9, 0.0); (488302.2, 3625696.4, 122.7, 122.7, 0.0);
(488322.2, 3625696.4, 122.1, 122.1, 0.0); (488342.2, 3625696.4, 121.6, 121.6, 0.0);
(488362.2, 3625696.4, 121.4, 121.4, 0.0); (488382.2, 3625696.4, 121.7, 121.7, 0.0);
(488582.2, 3625696.4, 122.3, 122.3, 0.0); (488602.2, 3625696.4, 122.6, 122.6, 0.0);
(488622.2, 3625696.4, 122.4, 122.4, 0.0); (488642.2, 3625696.4, 122.6, 122.6, 0.0);
(488662.2, 3625696.4, 122.7, 122.7, 0.0); (488042.2, 3625716.4, 121.5, 122.0, 0.0);
(488142.2, 3625716.4, 122.5, 122.5, 0.0); (488162.2, 3625716.4, 122.9, 122.9, 0.0);
(488182.2, 3625716.4, 123.0, 123.0, 0.0); (488202.2, 3625716.4, 123.0, 123.0, 0.0);
(488222.2, 3625716.4, 122.9, 122.9, 0.0); (488242.2, 3625716.4, 123.0, 123.0, 0.0);
(488262.2, 3625716.4, 122.8, 122.8, 0.0); (488282.2, 3625716.4, 122.4, 122.4, 0.0);
(488302.2, 3625716.4, 122.3, 122.3, 0.0); (488322.2, 3625716.4, 122.0, 122.0, 0.0);
(488342.2, 3625716.4, 121.9, 121.9, 0.0); (488362.2, 3625716.4, 121.7, 121.7, 0.0);
(488382.2, 3625716.4, 121.0, 121.0, 0.0); (488602.2, 3625716.4, 122.8, 122.8, 0.0);
(488622.2, 3625716.4, 122.6, 122.6, 0.0); (488642.2, 3625716.4, 123.2, 123.2, 0.0);
(488662.2, 3625716.4, 123.1, 123.1, 0.0); (488682.2, 3625716.4, 123.1, 123.1, 0.0);
(488022.2, 3625736.4, 119.8, 121.2, 0.0); (488042.2, 3625736.4, 118.3, 122.0, 0.0);
(488182.2, 3625736.4, 123.0, 123.0, 0.0); (488202.2, 3625736.4, 123.1, 123.1, 0.0);
(488222.2, 3625736.4, 123.0, 123.0, 0.0); (488242.2, 3625736.4, 123.1, 123.1, 0.0);
(488262.2, 3625736.4, 123.0, 123.0, 0.0); (488282.2, 3625736.4, 122.7, 122.7, 0.0);

```
  (    488302.2, 3625736.4,     122.5,     122.5,       0.0);       (    488322.2,
3625736.4,     122.0,     122.0,       0.0);
  (    488362.2, 3625736.4,     118.9,     121.9,       0.0);       (    488382.2,
3625736.4,     120.7,     120.7,       0.0);
  (    488402.2, 3625736.4,     120.9,     120.9,       0.0);       (    488602.2,
3625736.4,     122.8,     122.8,       0.0);
  (    488622.2, 3625736.4,     122.7,     122.7,       0.0);       (    488642.2,
3625736.4,     123.2,     123.2,       0.0);
  (    488662.2, 3625736.4,     123.3,     123.3,       0.0);       (    488682.2,
3625736.4,     123.2,     123.2,       0.0);
  (    488702.2, 3625736.4,     123.3,     123.3,       0.0);       (    488002.2,
3625756.4,     120.3,     120.3,       0.0);
  (    488022.2, 3625756.4,     119.9,     121.2,       0.0);       (    488182.2,
3625756.4,     123.1,     123.1,       0.0);
  (    488202.2, 3625756.4,     123.3,     123.3,       0.0);       (    488222.2,
3625756.4,     123.1,     123.1,       0.0);
  (    488242.2, 3625756.4,     123.1,     123.1,       0.0);       (    488262.2,
3625756.4,     123.1,     123.1,       0.0);
  (    488282.2, 3625756.4,     122.8,     122.8,       0.0);       (    488382.2,
3625756.4,     119.8,     120.8,       0.0);
  (    488602.2, 3625756.4,     122.8,     122.8,       0.0);       (    488622.2,
3625756.4,     122.8,     122.8,       0.0);
  (    488642.2, 3625756.4,     123.1,     123.1,       0.0);       (    488662.2,
3625756.4,     123.4,     123.4,       0.0);
  (    488682.2, 3625756.4,     123.3,     123.3,       0.0);       (    488702.2,
3625756.4,     123.3,     123.3,       0.0);
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                                          ***  DISCRETE CARTESIAN RECEPTORS ***
                                         (X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
                                                      (METERS)

  (    487982.2, 3625776.4,     117.8,     119.9,       0.0);       (    488002.2,
3625776.4,     119.4,     119.4,       0.0);
  (    488222.2, 3625776.4,     122.7,     122.7,       0.0);       (    488242.2,
3625776.4,     122.8,     122.8,       0.0);
  (    488262.2, 3625776.4,     122.8,     122.8,       0.0);       (    488622.2,
3625776.4,     122.9,     122.9,       0.0);
  (    488642.2, 3625776.4,     122.9,     122.9,       0.0);       (    488662.2,
3625776.4,     123.3,     123.3,       0.0);
  (    488682.2, 3625776.4,     123.4,     123.4,       0.0);       (    488702.2,
3625776.4,     123.4,     123.4,       0.0);
  (    488722.2, 3625776.4,     123.6,     123.6,       0.0);       (    487982.2,
3625796.4,     117.1,     119.9,       0.0);
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(488222.2, 3625796.4, 122.3, 122.3, 0.0); (488242.2,
3625796.4, 122.5, 122.5, 0.0);
(488262.2, 3625796.4, 122.4, 122.4, 0.0); (488622.2,
3625796.4, 119.7, 122.9, 0.0);
(488642.2, 3625796.4, 122.5, 122.5, 0.0); (488662.2,
3625796.4, 123.1, 123.1, 0.0);
(488682.2, 3625796.4, 123.4, 123.4, 0.0); (488702.2,
3625796.4, 123.5, 123.5, 0.0);
(488722.2, 3625796.4, 123.5, 123.5, 0.0); (488742.2,
3625796.4, 123.5, 123.5, 0.0);
(488222.2, 3625816.4, 121.9, 121.9, 0.0); (488242.2,
3625816.4, 122.1, 122.1, 0.0);
(488262.2, 3625816.4, 121.6, 121.6, 0.0); (488642.2,
3625816.4, 122.3, 122.3, 0.0);
(488662.2, 3625816.4, 123.0, 123.0, 0.0); (488682.2,
3625816.4, 123.3, 123.3, 0.0);
(488702.2, 3625816.4, 123.5, 123.5, 0.0); (488722.2,
3625816.4, 123.4, 123.4, 0.0);
(488742.2, 3625816.4, 123.4, 123.4, 0.0); (488762.2,
3625816.4, 123.4, 123.4, 0.0);
(488202.2, 3625836.4, 119.2, 122.4, 0.0); (488222.2,
3625836.4, 121.1, 121.1, 0.0);
(488242.2, 3625836.4, 121.5, 121.5, 0.0); (488662.2,
3625836.4, 123.0, 123.0, 0.0);
(488682.2, 3625836.4, 123.1, 123.1, 0.0); (488702.2,
3625836.4, 123.3, 123.3, 0.0);
(488722.2, 3625836.4, 123.4, 123.4, 0.0); (488742.2,
3625836.4, 123.3, 123.3, 0.0);
(488762.2, 3625836.4, 123.3, 123.3, 0.0); (488782.2,
3625836.4, 123.2, 123.2, 0.0);
(488202.2, 3625856.4, 118.3, 121.6, 0.0); (488222.2,
3625856.4, 120.9, 120.9, 0.0);
(488242.2, 3625856.4, 117.8, 122.5, 0.0); (488682.2,
3625856.4, 123.2, 123.2, 0.0);
(488702.2, 3625856.4, 123.1, 123.1, 0.0); (488722.2,
3625856.4, 123.2, 123.2, 0.0);
(488742.2, 3625856.4, 123.2, 123.2, 0.0); (488762.2,
3625856.4, 123.2, 123.2, 0.0);
(488782.2, 3625856.4, 123.2, 123.2, 0.0); (488802.2,
3625856.4, 123.0, 123.0, 0.0);
(488822.2, 3625856.4, 122.8, 122.8, 0.0); (488202.2,
3625876.4, 118.7, 122.2, 0.0);
(488222.2, 3625876.4, 121.0, 121.0, 0.0); (488662.2,
3625876.4, 123.5, 123.5, 0.0);
(488682.2, 3625876.4, 123.3, 123.3, 0.0); (488702.2,
3625876.4, 123.0, 123.0, 0.0);
(488722.2, 3625876.4, 123.0, 123.0, 0.0); (488742.2,
3625876.4, 123.1, 123.1, 0.0);
(488762.2, 3625876.4, 123.1, 123.1, 0.0); (488782.2,
3625876.4, 123.1, 123.1, 0.0);

```
  (    488802.2, 3625876.4,     122.9,     122.9,       0.0);       (    488822.2,
3625876.4,     122.8,     122.8,       0.0);
  (    488842.2, 3625876.4,     123.0,     123.0,       0.0);       (    488202.2,
3625896.4,     121.2,     122.2,       0.0);
  (    488222.2, 3625896.4,     121.6,     121.6,       0.0);       (    488642.2,
3625896.4,     123.4,     123.4,       0.0);
  (    488662.2, 3625896.4,     123.1,     123.1,       0.0);       (    488682.2,
3625896.4,     123.0,     123.0,       0.0);
  (    488702.2, 3625896.4,     123.1,     123.1,       0.0);       (    488722.2,
3625896.4,     122.8,     122.8,       0.0);
  (    488742.2, 3625896.4,     122.9,     122.9,       0.0);       (    488762.2,
3625896.4,     122.9,     122.9,       0.0);
  (    488782.2, 3625896.4,     122.9,     122.9,       0.0);       (    488802.2,
3625896.4,     122.8,     122.8,       0.0);
  (    488822.2, 3625896.4,     122.8,     122.8,       0.0);       (    488842.2,
3625896.4,     122.9,     122.9,       0.0);
  (    488862.2, 3625896.4,     123.1,     123.1,       0.0);       (    488882.2,
3625896.4,     123.2,     123.2,       0.0);
  (    488902.2, 3625896.4,     123.3,     123.3,       0.0);       (    488202.2,
3625916.4,     122.0,     122.0,       0.0);
  (    488222.2, 3625916.4,     121.9,     121.9,       0.0);       (    488642.2,
3625916.4,     123.0,     123.0,       0.0);
  (    488662.2, 3625916.4,     122.9,     122.9,       0.0);       (    488682.2,
3625916.4,     122.9,     122.9,       0.0);
  (    488702.2, 3625916.4,     122.9,     122.9,       0.0);       (    488762.2,
3625916.4,     122.0,     122.0,       0.0);
  (    488782.2, 3625916.4,     122.8,     122.8,       0.0);       (    488802.2,
3625916.4,     122.8,     122.8,       0.0);
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                                          ***  DISCRETE CARTESIAN RECEPTORS ***
                                         (X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
                                                      (METERS)

  (    488822.2, 3625916.4,     122.7,     122.7,       0.0);       (    488842.2,
3625916.4,     122.8,     122.8,       0.0);
  (    488862.2, 3625916.4,     123.0,     123.0,       0.0);       (    488882.2,
3625916.4,     123.0,     123.0,       0.0);
  (    488902.2, 3625916.4,     123.0,     123.0,       0.0);       (    488922.2,
3625916.4,     123.0,     123.0,       0.0);
  (    488942.2, 3625916.4,     123.1,     123.1,       0.0);       (    488222.2,
3625936.4,     121.7,     121.7,       0.0);
  (    488622.2, 3625936.4,     122.5,     122.5,       0.0);       (    488642.2,
3625936.4,     122.3,     122.3,       0.0);
```

(488662.2, 3625936.4, 122.6, 122.6, 0.0); (488682.2,
3625936.4, 122.6, 122.6, 0.0);
(488782.2, 3625936.4, 122.7, 122.7, 0.0); (488802.2,
3625936.4, 122.7, 122.7, 0.0);
(488822.2, 3625936.4, 122.7, 122.7, 0.0); (488842.2,
3625936.4, 122.7, 122.7, 0.0);
(488862.2, 3625936.4, 122.7, 122.7, 0.0); (488882.2,
3625936.4, 122.8, 122.8, 0.0);
(488902.2, 3625936.4, 122.8, 122.8, 0.0); (488922.2,
3625936.4, 122.9, 122.9, 0.0);
(488942.2, 3625936.4, 123.1, 123.1, 0.0); (488962.2,
3625936.4, 123.3, 123.3, 0.0);
(488982.2, 3625936.4, 123.6, 123.6, 0.0); (489002.2,
3625936.4, 123.4, 123.4, 0.0);
(488602.2, 3625956.4, 121.8, 121.8, 0.0); (488622.2,
3625956.4, 122.0, 122.0, 0.0);
(488642.2, 3625956.4, 122.0, 122.0, 0.0); (488662.2,
3625956.4, 122.1, 122.1, 0.0);
(488782.2, 3625956.4, 122.4, 122.4, 0.0); (488802.2,
3625956.4, 122.6, 122.6, 0.0);
(488822.2, 3625956.4, 122.6, 122.6, 0.0); (488842.2,
3625956.4, 122.6, 122.6, 0.0);
(488862.2, 3625956.4, 122.6, 122.6, 0.0); (488882.2,
3625956.4, 122.6, 122.6, 0.0);
(488902.2, 3625956.4, 122.6, 122.6, 0.0); (488922.2,
3625956.4, 122.8, 122.8, 0.0);
(488942.2, 3625956.4, 122.9, 122.9, 0.0); (488962.2,
3625956.4, 123.0, 123.0, 0.0);
(488982.2, 3625956.4, 123.2, 123.2, 0.0); (489002.2,
3625956.4, 123.2, 123.2, 0.0);
(489022.2, 3625956.4, 123.2, 123.2, 0.0); (489042.2,
3625956.4, 123.2, 123.2, 0.0);
(489062.2, 3625956.4, 123.1, 123.1, 0.0); (489082.2,
3625956.4, 123.2, 123.2, 0.0);
(488622.2, 3625976.4, 119.8, 121.7, 0.0); (488802.2,
3625976.4, 122.5, 122.5, 0.0);
(488822.2, 3625976.4, 122.5, 122.5, 0.0); (488842.2,
3625976.4, 122.3, 122.3, 0.0);
(488862.2, 3625976.4, 122.1, 122.1, 0.0); (488882.2,
3625976.4, 122.1, 122.1, 0.0);
(488902.2, 3625976.4, 122.1, 122.1, 0.0); (488922.2,
3625976.4, 122.4, 122.4, 0.0);
(488942.2, 3625976.4, 122.7, 122.7, 0.0); (488962.2,
3625976.4, 122.9, 122.9, 0.0);
(488982.2, 3625976.4, 123.0, 123.0, 0.0); (489002.2,
3625976.4, 123.0, 123.0, 0.0);
(489022.2, 3625976.4, 123.1, 123.1, 0.0); (489042.2,
3625976.4, 123.1, 123.1, 0.0);
(489062.2, 3625976.4, 123.1, 123.1, 0.0); (489082.2,
3625976.4, 123.2, 123.2, 0.0);

```
 (    489102.2, 3625976.4,     123.2,     123.2,       0.0);       (    489122.2,
3625976.4,     123.2,     123.2,       0.0);
 (    488802.2, 3625996.4,     122.6,     122.6,       0.0);       (    488822.2,
3625996.4,     122.4,     122.4,       0.0);
 (    488842.2, 3625996.4,     121.7,     121.7,       0.0);       (    488922.2,
3625996.4,     121.8,     121.8,       0.0);
 (    488942.2, 3625996.4,     122.4,     122.4,       0.0);       (    488962.2,
3625996.4,     122.8,     122.8,       0.0);
 (    488982.2, 3625996.4,     123.0,     123.0,       0.0);       (    489002.2,
3625996.4,     123.0,     123.0,       0.0);
 (    489022.2, 3625996.4,     122.9,     122.9,       0.0);       (    489042.2,
3625996.4,     122.9,     122.9,       0.0);
 (    489062.2, 3625996.4,     123.1,     123.1,       0.0);       (    489082.2,
3625996.4,     123.1,     123.1,       0.0);
 (    489102.2, 3625996.4,     123.1,     123.1,       0.0);       (    489122.2,
3625996.4,     123.1,     123.1,       0.0);
 (    489142.2, 3625996.4,     122.9,     122.9,       0.0);       (    488802.2,
3626016.4,     122.5,     122.5,       0.0);
 (    488822.2, 3626016.4,     122.4,     122.4,       0.0);       (    488842.2,
3626016.4,     121.5,     121.5,       0.0);
 (    488982.2, 3626016.4,     122.4,     122.4,       0.0);       (    489002.2,
3626016.4,     122.4,     122.4,       0.0);
 (    489022.2, 3626016.4,     122.5,     122.5,       0.0);       (    489042.2,
3626016.4,     122.6,     122.6,       0.0);
 (    489062.2, 3626016.4,     122.8,     122.8,       0.0);       (    489082.2,
3626016.4,     122.8,     122.8,       0.0);
 (    489102.2, 3626016.4,     122.9,     122.9,       0.0);       (    489122.2,
3626016.4,     122.8,     122.8,       0.0);
 (    489142.2, 3626016.4,     122.6,     122.6,       0.0);       (    488782.2,
3626036.4,     122.3,     122.3,       0.0);
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                                           ***  DISCRETE CARTESIAN RECEPTORS ***
                                          (X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
                                                          (METERS)

 (    488802.2, 3626036.4,     122.5,     122.5,       0.0);       (    488822.2,
3626036.4,     122.4,     122.4,       0.0);
 (    488842.2, 3626036.4,     121.3,     121.3,       0.0);       (    489042.2,
3626036.4,     122.4,     122.4,       0.0);
 (    489062.2, 3626036.4,     122.7,     122.7,       0.0);       (    489082.2,
3626036.4,     122.6,     122.6,       0.0);
 (    489102.2, 3626036.4,     122.7,     122.7,       0.0);       (    489122.2,
3626036.4,     122.7,     122.7,       0.0);
```

(489142.2, 3626036.4, 122.5, 122.5, 0.0); (488782.2,
3626056.4, 122.1, 122.1, 0.0);
(488802.2, 3626056.4, 122.5, 122.5, 0.0); (488822.2,
3626056.4, 122.4, 122.4, 0.0);
(488842.2, 3626056.4, 121.3, 121.3, 0.0); (489042.2,
3626056.4, 122.3, 122.3, 0.0);
(489062.2, 3626056.4, 122.8, 122.8, 0.0); (489082.2,
3626056.4, 122.7, 122.7, 0.0);
(489102.2, 3626056.4, 122.6, 122.6, 0.0); (489122.2,
3626056.4, 122.6, 122.6, 0.0);
(489142.2, 3626056.4, 122.6, 122.6, 0.0); (489162.2,
3626056.4, 122.3, 122.3, 0.0);
(488782.2, 3626076.4, 120.1, 122.5, 0.0); (488802.2,
3626076.4, 122.5, 122.5, 0.0);
(488822.2, 3626076.4, 122.4, 122.4, 0.0); (488842.2,
3626076.4, 121.7, 121.7, 0.0);
(488862.2, 3626076.4, 120.4, 120.4, 0.0); (489062.2,
3626076.4, 122.7, 122.7, 0.0);
(489082.2, 3626076.4, 122.7, 122.7, 0.0); (489102.2,
3626076.4, 122.4, 122.4, 0.0);
(489122.2, 3626076.4, 122.4, 122.4, 0.0); (489142.2,
3626076.4, 122.5, 122.5, 0.0);
(489162.2, 3626076.4, 122.0, 122.0, 0.0); (488782.2,
3626096.4, 119.7, 122.6, 0.0);
(488802.2, 3626096.4, 122.5, 122.5, 0.0); (488822.2,
3626096.4, 122.4, 122.4, 0.0);
(488842.2, 3626096.4, 122.1, 122.1, 0.0); (488862.2,
3626096.4, 121.6, 121.6, 0.0);
(489062.2, 3626096.4, 122.5, 122.5, 0.0); (489082.2,
3626096.4, 122.7, 122.7, 0.0);
(489102.2, 3626096.4, 122.4, 122.4, 0.0); (489122.2,
3626096.4, 122.3, 122.3, 0.0);
(489142.2, 3626096.4, 122.2, 122.2, 0.0); (489162.2,
3626096.4, 121.9, 121.9, 0.0);
(488782.2, 3626116.4, 121.9, 121.9, 0.0); (488802.2,
3626116.4, 122.6, 122.6, 0.0);
(488822.2, 3626116.4, 122.4, 122.4, 0.0); (488842.2,
3626116.4, 122.3, 122.3, 0.0);
(488862.2, 3626116.4, 121.9, 121.9, 0.0); (489062.2,
3626116.4, 122.3, 122.3, 0.0);
(489082.2, 3626116.4, 122.6, 122.6, 0.0); (489102.2,
3626116.4, 122.7, 122.7, 0.0);
(489122.2, 3626116.4, 122.4, 122.4, 0.0); (489142.2,
3626116.4, 122.0, 122.0, 0.0);
(489162.2, 3626116.4, 122.0, 122.0, 0.0); (489182.2,
3626116.4, 121.4, 121.4, 0.0);
(488782.2, 3626136.4, 122.8, 122.8, 0.0); (488802.2,
3626136.4, 122.9, 122.9, 0.0);
(488822.2, 3626136.4, 122.4, 122.4, 0.0); (488842.2,
3626136.4, 122.4, 122.4, 0.0);

(488862.2, 3626136.4, 122.3, 122.3, 0.0); (489082.2, 3626136.4, 122.1, 122.1, 0.0);
(489102.2, 3626136.4, 122.5, 122.5, 0.0); (489122.2, 3626136.4, 122.3, 122.3, 0.0);
(489142.2, 3626136.4, 121.7, 121.7, 0.0); (489162.2, 3626136.4, 121.9, 121.9, 0.0);
(489182.2, 3626136.4, 121.3, 121.3, 0.0); (488782.2, 3626156.4, 123.3, 123.3, 0.0);
(488802.2, 3626156.4, 123.2, 123.2, 0.0); (488822.2, 3626156.4, 122.4, 122.4, 0.0);
(488842.2, 3626156.4, 122.5, 122.5, 0.0); (488862.2, 3626156.4, 122.6, 122.6, 0.0);
(488882.2, 3626156.4, 122.4, 122.4, 0.0); (489102.2, 3626156.4, 121.9, 121.9, 0.0);
(489122.2, 3626156.4, 122.1, 122.1, 0.0); (489142.2, 3626156.4, 121.6, 121.6, 0.0);
(489162.2, 3626156.4, 121.7, 121.7, 0.0); (489182.2, 3626156.4, 121.2, 121.2, 0.0);
(488782.2, 3626176.4, 123.3, 123.3, 0.0); (488802.2, 3626176.4, 123.3, 123.3, 0.0);
(488822.2, 3626176.4, 122.4, 122.4, 0.0); (488842.2, 3626176.4, 122.7, 122.7, 0.0);
(488862.2, 3626176.4, 122.9, 122.9, 0.0); (488882.2, 3626176.4, 122.4, 122.4, 0.0);
(489122.2, 3626176.4, 121.9, 121.9, 0.0); (489142.2, 3626176.4, 121.6, 121.6, 0.0);
(489162.2, 3626176.4, 121.3, 121.3, 0.0); (489182.2, 3626176.4, 121.0, 121.0, 0.0);
(488782.2, 3626196.4, 123.1, 123.1, 0.0); (488802.2, 3626196.4, 123.3, 123.3, 0.0);
(488822.2, 3626196.4, 122.4, 122.4, 0.0); (488842.2, 3626196.4, 122.9, 122.9, 0.0);

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(488862.2, 3626196.4, 123.1, 123.1, 0.0); (488882.2, 3626196.4, 122.8, 122.8, 0.0);
(488902.2, 3626196.4, 122.4, 122.4, 0.0); (489142.2, 3626196.4, 121.3, 121.3, 0.0);
(489162.2, 3626196.4, 121.1, 121.1, 0.0); (489182.2, 3626196.4, 120.9, 120.9, 0.0);

(489202.2, 3626196.4, 120.6, 120.6, 0.0); (488782.2, 3626216.4, 122.8, 122.8, 0.0);
(488802.2, 3626216.4, 123.0, 123.0, 0.0); (488822.2, 3626216.4, 122.3, 122.3, 0.0);
(488842.2, 3626216.4, 122.8, 122.8, 0.0); (488862.2, 3626216.4, 123.2, 123.2, 0.0);
(488882.2, 3626216.4, 122.9, 122.9, 0.0); (488902.2, 3626216.4, 122.6, 122.6, 0.0);
(489142.2, 3626216.4, 121.0, 121.0, 0.0); (489162.2, 3626216.4, 120.9, 120.9, 0.0);
(489182.2, 3626216.4, 120.6, 120.6, 0.0); (489202.2, 3626216.4, 120.4, 120.4, 0.0);
(489222.2, 3626216.4, 120.4, 120.4, 0.0); (489242.2, 3626216.4, 120.8, 120.8, 0.0);
(489262.2, 3626216.4, 120.7, 120.7, 0.0); (488782.2, 3626236.4, 122.2, 122.2, 0.0);
(488802.2, 3626236.4, 122.2, 122.2, 0.0); (488822.2, 3626236.4, 122.1, 122.1, 0.0);
(488842.2, 3626236.4, 122.3, 122.3, 0.0); (488862.2, 3626236.4, 122.4, 122.4, 0.0);
(488882.2, 3626236.4, 122.3, 122.3, 0.0); (488902.2, 3626236.4, 122.3, 122.3, 0.0);
(489142.2, 3626236.4, 120.6, 120.6, 0.0); (489162.2, 3626236.4, 120.5, 120.5, 0.0);
(489182.2, 3626236.4, 120.1, 120.1, 0.0); (489202.2, 3626236.4, 120.1, 120.1, 0.0);
(489222.2, 3626236.4, 120.4, 120.4, 0.0); (489242.2, 3626236.4, 120.9, 120.9, 0.0);
(489262.2, 3626236.4, 120.2, 120.2, 0.0); (488782.2, 3626256.4, 121.4, 121.4, 0.0);
(488802.2, 3626256.4, 120.2, 121.9, 0.0); (488822.2, 3626256.4, 120.5, 122.1, 0.0);
(488842.2, 3626256.4, 121.5, 121.5, 0.0); (488862.2, 3626256.4, 122.2, 122.2, 0.0);
(488882.2, 3626256.4, 122.3, 122.3, 0.0); (488902.2, 3626256.4, 122.0, 122.0, 0.0);
(488922.2, 3626256.4, 121.9, 121.9, 0.0); (489142.2, 3626256.4, 120.0, 120.0, 0.0);
(489162.2, 3626256.4, 117.0, 120.5, 0.0); (489222.2, 3626256.4, 120.2, 120.2, 0.0);
(489242.2, 3626256.4, 120.9, 120.9, 0.0); (489262.2, 3626256.4, 120.5, 120.5, 0.0);
(488882.2, 3626276.4, 122.4, 122.4, 0.0); (488902.2, 3626276.4, 121.8, 121.8, 0.0);
(488922.2, 3626276.4, 120.5, 120.5, 0.0); (489142.2, 3626276.4, 118.5, 120.5, 0.0);
(489162.2, 3626276.4, 112.4, 121.0, 0.0); (489242.2, 3626276.4, 120.2, 120.9, 0.0);
(489262.2, 3626276.4, 120.7, 120.7, 0.0); (488882.2, 3626296.4, 122.0, 122.0, 0.0);

```
  (    488902.2, 3626296.4,     121.6,     121.6,       0.0);       (    489262.2,
3626296.4,     119.8,     119.8,       0.0);
  (    489282.2, 3626296.4,     119.8,     119.8,       0.0);       (    488902.2,
3626316.4,     121.2,     121.2,       0.0);
  (    489282.2, 3626316.4,     119.0,     119.0,       0.0);       (    489302.2,
3626316.4,     118.7,     118.7,       0.0);
  (    488902.2, 3626336.4,     120.8,     121.6,       0.0);       (    488922.2,
3626336.4,     119.7,     121.6,       0.0);
  (    489302.2, 3626336.4,     118.6,     118.6,       0.0);       (    489322.2,
3626336.4,     118.5,     118.9,       0.0);
  (    488922.2, 3626356.4,     120.1,     120.1,       0.0);       (    488942.2,
3626356.4,     118.2,     120.6,       0.0);
  (    489322.2, 3626356.4,     118.5,     118.5,       0.0);       (    488942.2,
3626376.4,     118.0,     120.6,       0.0);
  (    488962.2, 3626376.4,     118.1,     119.4,       0.0);       (    489322.2,
3626376.4,     119.2,     119.2,       0.0);
  (    489342.2, 3626376.4,     117.2,     120.5,       0.0);       (    488962.2,
3626396.4,     117.8,     118.3,       0.0);
  (    489322.2, 3626396.4,     120.4,     120.4,       0.0);       (    489342.2,
3626396.4,     120.1,     120.1,       0.0);
  (    489342.2, 3626416.4,     120.6,     120.6,       0.0);       (    489342.2,
3626436.4,     119.8,     119.8,       0.0);
  (    488086.2, 3626768.1,      19.6,     123.5,      11.0);       (    488077.2,
3626746.8,      19.6,     123.5,      11.0);
  (    488075.8, 3626778.1,      19.8,     123.5,      11.0);       (    488002.9,
3626694.7,      19.1,     123.6,      11.0);
  (    487535.3, 3626865.6,      25.6,     115.8,       0.0);       (    487693.8,
3626992.8,      24.9,     115.8,       0.0);
  (    487795.0, 3626883.9,      23.1,     101.2,       0.0);       (    487871.5,
3626830.1,      22.5,     122.2,       0.0);
  (    487958.8, 3626811.7,      20.9,     122.8,       0.0);       (    488041.8,
3626794.5,      20.2,     123.5,       0.0);
  (    488094.6, 3626765.4,      19.6,     123.5,       0.0);       (    488046.1,
3626714.8,      19.3,     123.5,       0.0);
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                                                      ***  DISCRETE CARTESIAN RECEPTORS ***
                                                     (X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
                                                                     (METERS)

  (    488007.3, 3626665.2,      18.2,     123.6,       0.0);       (    487941.6,
3626599.5,      18.7,     123.7,       0.0);
  (    487911.4, 3626574.7,      18.9,     123.7,       0.0);       (    487815.5,
3626540.2,      18.7,     123.7,       0.0);
```

(487709.9, 3626504.6, 17.1, 123.7, 0.0); (487555.8,
3626440.0, 18.9, 123.6, 0.0);
(487490.1, 3626487.4, 20.5, 123.3, 0.0); (487428.7,
3626556.4, 22.0, 121.7, 0.0);
(487358.6, 3626713.7, 26.3, 114.0, 0.0); (487522.4,
3626827.9, 24.5, 115.4, 0.0);
(488235.5, 3625424.5, 122.1, 122.1, 0.0); (488562.1,
3625540.8, 122.7, 122.7, 0.0);
(488747.0, 3625794.4, 123.5, 123.5, 0.0); (488857.4,
3625879.4, 123.1, 123.1, 0.0);
(489054.3, 3625949.5, 123.1, 123.1, 0.0); (489134.8,
3625964.4, 123.2, 123.2, 0.0);
(489178.1, 3626085.2, 121.5, 121.5, 0.0); (489203.4,
3626198.6, 120.6, 120.6, 0.0);
(489260.1, 3626203.1, 120.7, 120.7, 0.0); (489276.5,
3626218.0, 120.0, 120.0, 0.0);
(489267.6, 3626265.7, 120.6, 120.6, 0.0); (489336.2,
3626346.3, 115.2, 120.5, 0.0);
(489361.5, 3626432.8, 117.2, 120.8, 0.0); (489331.7,
3626449.2, 117.5, 120.8, 0.0);
(489309.3, 3626361.2, 116.0, 120.5, 0.0); (489258.6,
3626298.5, 119.1, 120.6, 0.0);
(489190.0, 3626228.4, 120.2, 120.2, 0.0); (489149.7,
3626317.9, 107.9, 121.7, 0.0);
(489130.3, 3626250.8, 118.1, 120.5, 0.0); (489137.8,
3626216.5, 120.8, 120.8, 0.0);
(489054.3, 3626106.1, 122.1, 122.1, 0.0); (489036.4,
3626036.0, 122.3, 122.3, 0.0);
(488921.5, 3625997.2, 121.6, 121.6, 0.0); (488847.0,
3625983.8, 121.9, 121.9, 0.0);
(488872.3, 3626110.6, 121.5, 121.5, 0.0); (488902.1,
3626194.1, 122.4, 122.4, 0.0);
(488932.0, 3626270.2, 121.2, 121.2, 0.0); (488908.8,
3626298.8, 119.8, 121.4, 0.0);
(488936.8, 3626348.3, 117.9, 121.6, 0.0); (488971.4,
3626378.0, 116.7, 119.4, 0.0);
(488968.1, 3626409.7, 112.1, 120.6, 0.0); (488903.1,
3626355.2, 119.8, 119.8, 0.0);
(488864.9, 3626256.5, 122.3, 122.3, 0.0); (488763.3,
3626259.3, 119.9, 122.1, 0.0);
(488787.9, 3625962.9, 122.3, 122.3, 0.0); (488735.7,
3625906.3, 122.6, 122.6, 0.0);
(488620.8, 3625988.3, 118.1, 121.9, 0.0); (488588.0,
3625957.0, 120.0, 121.8, 0.0);
(488671.5, 3625861.5, 123.3, 123.3, 0.0); (488629.8,
3625813.8, 118.9, 123.2, 0.0);
(488588.0, 3625746.7, 122.8, 122.8, 0.0); (488571.6,
3625648.2, 122.5, 122.5, 0.0);
(488516.4, 3625666.1, 119.6, 122.1, 0.0); (488522.4,
3625581.1, 121.9, 121.9, 0.0);

(488431.4, 3625576.6, 121.6, 121.6, 0.0); (488447.8,
3625615.4, 118.9, 121.6, 0.0);
(488388.1, 3625616.9, 120.6, 120.6, 0.0); (488398.6,
3625706.4, 121.1, 121.1, 0.0);
(488406.0, 3625745.2, 120.5, 120.5, 0.0); (488392.6,
3625776.5, 118.8, 118.8, 0.0);
(488350.8, 3625722.8, 121.4, 121.4, 0.0); (488279.2,
3625769.0, 122.8, 122.8, 0.0);
(488282.2, 3625807.8, 120.5, 121.1, 0.0); (488246.4,
3625851.1, 118.5, 122.5, 0.0);
(488230.0, 3625946.5, 118.4, 122.2, 0.0); (488188.3,
3625924.2, 118.2, 122.2, 0.0);
(488213.6, 3625757.1, 123.2, 123.2, 0.0); (488170.4,
3625779.5, 120.8, 122.7, 0.0);
(488170.4, 3625733.2, 122.5, 122.5, 0.0); (488077.9,
3625697.4, 122.6, 122.6, 0.0);
(487973.5, 3625822.7, 115.5, 119.3, 0.0); (487955.6,
3625809.3, 115.2, 119.3, 0.0);
(488058.5, 3625678.1, 122.0, 122.0, 0.0); (488057.0,
3625618.4, 122.5, 122.5, 0.0);
(488107.7, 3625596.0, 122.6, 122.6, 0.0); (488185.3,
3625576.6, 121.5, 121.5, 0.0);
(488228.5, 3625528.9, 122.0, 122.0, 0.0); (488233.0,
3625482.7, 121.7, 121.7, 0.0);

*** METEOROLOGICAL DAYS SELECTED FOR
PROCESSING ***

(1=YES; 0=NO)

1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
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1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1

1 1 1 1 1 1 1 1 1 1 1 1 1 1 1

NOTE: METEOROLOGICAL DATA ACTUALLY PROCESSED WILL ALSO DEPEND ON WHAT IS INCLUDED IN THE DATA FILE.

*** UPPER BOUND OF FIRST THROUGH FIFTH WIND SPEED CATEGORIES ***

(METERS/SEC)

1.54,   3.09,   5.14,   8.23,   10.80,

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** UP TO THE FIRST 24 HOURS OF METEOROLOGICAL DATA ***

Surface file: ..\Fenton Parkway Construction2\SDAPCD Kearny MetData\KVR_2019-2021_v22112.SFC   Met Version: 22112
Profile file: ..\Fenton Parkway Construction2\SDAPCD Kearny MetData\KVR_2019-2021_v22112.PFL
Surface format: FREE

Profile format: FREE

Surface station no.:   93107   Upper air station no.:   3190
Name: UNKNOWN   Name: UNKNOWN

Year: 2019   Year: 2019

First 24 hours of scalar data

YR	MO	DY	JDY	HR	H0	U*	W*	DT/DZ	ZICNV	ZIMCH	M-O LEN	Z0	BOWEN	ALBEDO	REF WS	WD	HT	REF TA	HT
19	01	01	1	01	-999.0	-9.000	-9.000	-9.000	-999.	-999.	-99999.0	0.08	1.21	1.00	1.34	41.	10.0	282.9	10.0
19	01	01	1	02	-999.0	-9.000	-9.000	-9.000	-999.	-999.	-99999.0	0.10	1.21	1.00	1.70	14.	10.0	281.6	10.0
19	01	01	1	03	-999.0	-9.000	-9.000	-9.000	-999.	-999.	-99999.0	0.15	1.21	1.00	1.21	355.	10.0	281.3	10.0
19	01	01	1	04	-999.0	-9.000	-9.000	-9.000	-999.	-999.	-99999.0	0.10	1.21	1.00	1.34	23.	10.0	281.5	10.0

```
 19 01 01   1 05 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   2.28    9.     10.0  281.0   10.0
 19 01 01   1 06 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   2.24   27.     10.0  279.5   10.0
 19 01 01   1 07 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   2.82   31.     10.0  279.4   10.0
 19 01 01   1 08 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.15   1.21
0.50   2.32  356.     10.0  279.8   10.0
 19 01 01   1 09 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.30   2.24   40.     10.0  283.0   10.0
 19 01 01   1 10 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
0.23   3.49   65.     10.0  285.2   10.0
 19 01 01   1 11 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.21   4.51   59.     10.0  286.8   10.0
 19 01 01   1 12 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.20   7.24   52.     10.0  287.3   10.0
 19 01 01   1 13 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.20   7.60   51.     10.0  287.1   10.0
 19 01 01   1 14 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.21   6.79   54.     10.0  287.1   10.0
 19 01 01   1 15 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.24   7.06   52.     10.0  287.1   10.0
 19 01 01   1 16 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.33   5.72   55.     10.0  286.4   10.0
 19 01 01   1 17 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.61   2.64   53.     10.0  285.2   10.0
 19 01 01   1 18 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   5.50   50.     10.0  283.4   10.0
 19 01 01   1 19 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   4.38   59.     10.0  281.6   10.0
 19 01 01   1 20 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   4.29   62.     10.0  280.9   10.0
 19 01 01   1 21 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   4.34   60.     10.0  281.0   10.0
 19 01 01   1 22 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   2.64   72.     10.0  280.1   10.0
 19 01 01   1 23 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   3.49   58.     10.0  279.4   10.0
 19 01 01   1 24 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   2.73   77.     10.0  279.3   10.0


 First hour of profile data
 YR MO DY HR HEIGHT F  WDIR    WSPD  AMB_TMP sigmaA  sigmaW  sigmaV
 19 01 01 01    10.0 1   41.    1.34    283.0   18.0  -99.00   0.40

 F indicates top of profile (=1) or below (=0)
```

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***

INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 , L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487526.96	3626464.52	3.51534	487546.96	3626464.52	3.69823
487566.96	3626464.52	3.89969	487586.96	3626464.52	4.13498
487606.96	3626464.52	4.37318	487506.96	3626484.52	3.29238
487526.96	3626484.52	3.47576	487546.96	3626484.52	3.62084
487566.96	3626484.52	3.82566	487586.96	3626484.52	4.05755
487606.96	3626484.52	4.28962	487626.96	3626484.52	4.56345
487646.96	3626484.52	4.87107	487486.96	3626504.52	3.05238
487506.96	3626504.52	3.22851	487526.96	3626504.52	3.41000
487546.96	3626504.52	3.54096	487566.96	3626504.52	3.74222
487586.96	3626504.52	3.97098	487606.96	3626504.52	4.20599
487626.96	3626504.52	4.48085	487646.96	3626504.52	4.78974
487666.96	3626504.52	5.13084	487686.96	3626504.52	5.49412
487706.96	3626504.52	5.90021	487466.96	3626524.52	2.83576
487486.96	3626524.52	2.98845	487506.96	3626524.52	3.15879

487526.96 3626524.52 3.33973 487546.96
3626524.52 3.46769
487566.96 3626524.52 3.66508 487586.96
3626524.52 3.88986
487606.96 3626524.52 4.13515 487626.96
3626524.52 4.39971
487646.96 3626524.52 4.70422 487666.96
3626524.52 5.04010
487686.96 3626524.52 5.40646 487706.96
3626524.52 5.82964
487726.96 3626524.52 6.29831 487746.96
3626524.52 6.83906
487766.96 3626524.52 7.43982 487446.96
3626544.52 2.66390
487466.96 3626544.52 2.79117 487486.96
3626544.52 2.93639
487506.96 3626544.52 3.09133 487526.96
3626544.52 3.24646
487546.96 3626544.52 3.43202 487566.96
3626544.52 3.59978
487586.96 3626544.52 3.82100 487606.96
3626544.52 4.07453
487626.96 3626544.52 4.33323 487646.96
3626544.52 4.62237
487666.96 3626544.52 4.95180 487686.96
3626544.52 5.31756
487706.96 3626544.52 5.73542 487726.96
3626544.52 6.20254
487746.96 3626544.52 6.72823 487766.96
3626544.52 7.32267
487786.96 3626544.52 8.00014 487806.96
3626544.52 8.79614
487826.96 3626544.52 9.62661 487426.96
3626564.52 2.50452
487446.96 3626564.52 2.61677 487466.96
3626564.52 2.74375
487486.96 3626564.52 2.88045 487506.96
3626564.52 3.02787
487526.96 3626564.52 3.19155 487546.96
3626564.52 3.35067
487566.96 3626564.52 3.53877 487586.96
3626564.52 3.75400
487606.96 3626564.52 4.03136 487626.96
3626564.52 4.25220
487646.96 3626564.52 4.54178 487666.96
3626564.52 4.86348
487686.96 3626564.52 5.22528 487706.96
3626564.52 5.63023
487726.96 3626564.52 6.08391 487746.96
3626564.52 6.59927

487766.96   3626564.52   7.18406   487786.96
3626564.52   7.86705

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487806.96	3626564.52	8.63413	487826.96	3626564.52	9.50800
487846.96	3626564.52	10.51240	487866.96	3626564.52	11.67640
487426.96	3626584.52	2.46139	487446.96	3626584.52	2.57358
487466.96	3626584.52	2.69826	487486.96	3626584.52	2.82516
487506.96	3626584.52	2.96983	487526.96	3626584.52	3.13408
487546.96	3626584.52	3.29620	487566.96	3626584.52	3.48901
487586.96	3626584.52	3.69581	487606.96	3626584.52	3.94261
487626.96	3626584.52	4.18117	487646.96	3626584.52	4.46316
487666.96	3626584.52	4.77488	487686.96	3626584.52	5.12461
487706.96	3626584.52	5.52457	487726.96	3626584.52	5.96270
487746.96	3626584.52	6.46604	487766.96	3626584.52	7.04062
487786.96	3626584.52	7.69170	487806.96		

3626584.52 8.44299
487826.96 3626584.52 9.31106 487846.96
3626584.52 10.31606
487866.96 3626584.52 11.48425 487886.96
3626584.52 12.84974
487906.96 3626584.52 14.44978 487426.96
3626604.52 2.41166
487446.96 3626604.52 2.52529 487466.96
3626604.52 2.64728
487486.96 3626604.52 2.77486 487506.96
3626604.52 2.91704
487526.96 3626604.52 3.07357 487546.96
3626604.52 3.24985
487566.96 3626604.52 3.44728 487586.96
3626604.52 3.65990
487606.96 3626604.52 3.87522 487626.96
3626604.52 4.11844
487646.96 3626604.52 4.38872 487666.96
3626604.52 4.69038
487686.96 3626604.52 5.02960 487706.96
3626604.52 5.41523
487726.96 3626604.52 5.83992 487746.96
3626604.52 6.32360
487766.96 3626604.52 6.87863 487786.96
3626604.52 7.51977
487806.96 3626604.52 8.23302 487826.96
3626604.52 9.08831
487846.96 3626604.52 10.06821 487866.96
3626604.52 11.22914
487886.96 3626604.52 12.60515 487906.96
3626604.52 14.24352
487926.96 3626604.52 16.19029 487406.96
3626624.52 2.26389
487426.96 3626624.52 2.36580 487446.96
3626624.52 2.47675
487466.96 3626624.52 2.59550 487486.96
3626624.52 2.72446
487506.96 3626624.52 2.86437 487526.96
3626624.52 3.01800
487546.96 3626624.52 3.20427 487566.96
3626624.52 3.41480
487586.96 3626624.52 3.63247 487606.96
3626624.52 3.84942
487626.96 3626624.52 4.07174 487646.96
3626624.52 4.32658
487666.96 3626624.52 4.61626 487686.96
3626624.52 4.94427
487706.96 3626624.52 5.31207 487726.96
3626624.52 5.72453
487746.96 3626624.52 6.19256 487766.96

3626624.52 6.72596
487786.96 3626624.52 7.33537 487806.96
3626624.52 8.07736
487826.96 3626624.52 8.91696 487846.96
3626624.52 9.89460
487866.96 3626624.52 10.95007 487886.96
3626624.52 12.30950

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487906.96	3626624.52	13.96369	487926.96	3626624.52	15.93723
487946.96	3626624.52	18.29929	487406.96	3626644.52	2.21948
487426.96	3626644.52	2.31966	487446.96	3626644.52	2.42766
487466.96	3626644.52	2.54581	487486.96	3626644.52	2.67256
487506.96	3626644.52	2.80950	487526.96	3626644.52	2.96311
487546.96	3626644.52	3.17203	487566.96	3626644.52	3.39698
487586.96	3626644.52	3.60927	487606.96	3626644.52	3.81949
487626.96	3626644.52	4.05216	487646.96	3626644.52	4.28217
487666.96	3626644.52	4.55453	487686.96	3626644.52	4.86957

487706.96 3626644.52 5.20934 487726.96
3626644.52 5.60913
487746.96 3626644.52 6.08050 487766.96
3626644.52 6.59366
487786.96 3626644.52 7.14863 487806.96
3626644.52 7.83322
487826.96 3626644.52 8.60051 487846.96
3626644.52 9.56626
487866.96 3626644.52 10.66914 487886.96
3626644.52 11.97078
487906.96 3626644.52 13.63287 487926.96
3626644.52 15.60857
487946.96 3626644.52 17.96937 487966.96
3626644.52 21.01697
487386.96 3626664.52 2.08365 487406.96
3626664.52 2.17526
487426.96 3626664.52 2.27360 487446.96
3626664.52 2.37897
487466.96 3626664.52 2.49498 487486.96
3626664.52 2.61994
487506.96 3626664.52 2.75929 487526.96
3626664.52 2.93017
487546.96 3626664.52 3.11047 487566.96
3626664.52 3.29644
487586.96 3626664.52 3.52398 487606.96
3626664.52 3.75042
487626.96 3626664.52 4.00569 487646.96
3626664.52 4.23877
487666.96 3626664.52 4.50075 487686.96
3626664.52 4.78500
487706.96 3626664.52 5.10521 487726.96
3626664.52 5.52019
487746.96 3626664.52 5.92152 487766.96
3626664.52 6.36891
487786.96 3626664.52 6.92065 487806.96
3626664.52 7.57591
487826.96 3626664.52 8.32533 487846.96
3626664.52 9.22063
487866.96 3626664.52 10.32677 487886.96
3626664.52 11.57205
487906.96 3626664.52 13.12097 487926.96
3626664.52 15.06154
487946.96 3626664.52 17.57032 487966.96
3626664.52 20.59822
487986.96 3626664.52 24.42150 487386.96
3626684.52 2.03970
487406.96 3626684.52 2.12884 487426.96
3626684.52 2.22550
487446.96 3626684.52 2.33078 487466.96
3626684.52 2.44392

487486.96 3626684.52 2.56861 487506.96
3626684.52 2.71172
487526.96 3626684.52 2.88885 487546.96
3626684.52 3.04417
487566.96 3626684.52 3.21294 487586.96
3626684.52 3.40768
487606.96 3626684.52 3.64725 487626.96
3626684.52 3.92968
487646.96 3626684.52 4.18520 487666.96
3626684.52 4.44837
487686.96 3626684.52 4.69859 487706.96
3626684.52 5.01589

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC X-COORD (M) Y-COORD (M) CONC
- -
487726.96 3626684.52 5.38727 487746.96
3626684.52 5.74539
487766.96 3626684.52 6.16981 487786.96
3626684.52 6.72539
487806.96 3626684.52 7.36410 487826.96
3626684.52 8.08521
487846.96 3626684.52 8.92354 487866.96
3626684.52 9.91743
487886.96 3626684.52 11.07624 487906.96
3626684.52 12.54409
487926.96 3626684.52 14.48645 487946.96
3626684.52 17.00364
487966.96 3626684.52 19.96476 487986.96

3626684.52 23.77797
488006.96 3626684.52 28.58400 487366.96
3626704.52 1.91367
487386.96 3626704.52 1.99339 487406.96
3626704.52 2.07789
487426.96 3626704.52 2.17120 487446.96
3626704.52 2.28286
487466.96 3626704.52 2.39451 487486.96
3626704.52 2.52158
487506.96 3626704.52 2.66452 487526.96
3626704.52 2.82077
487546.96 3626704.52 2.99044 487566.96
3626704.52 3.15922
487586.96 3626704.52 3.33451 487606.96
3626704.52 3.52941
487626.96 3626704.52 3.78996 487646.96
3626704.52 4.10196
487666.96 3626704.52 4.39334 487686.96
3626704.52 4.63956
487706.96 3626704.52 4.93775 487726.96
3626704.52 5.21899
487746.96 3626704.52 5.57131 487766.96
3626704.52 6.00667
487786.96 3626704.52 6.55153 487806.96
3626704.52 7.18878
487826.96 3626704.52 7.87966 487846.96
3626704.52 8.65681
487866.96 3626704.52 9.56323 487886.96
3626704.52 10.67993
487906.96 3626704.52 12.15906 487926.96
3626704.52 13.96577
487946.96 3626704.52 16.15696 487966.96
3626704.52 19.29706
487986.96 3626704.52 22.86446 488006.96
3626704.52 27.52791
488026.96 3626704.52 33.99934 487386.96
3626724.52 1.94683
487406.96 3626724.52 2.03411 487426.96
3626724.52 2.12970
487446.96 3626724.52 2.23247 487466.96
3626724.52 2.34112
487486.96 3626724.52 2.46028 487506.96
3626724.52 2.59399
487526.96 3626724.52 2.74911 487546.96
3626724.52 2.90756
487566.96 3626724.52 3.08064 487586.96
3626724.52 3.27295
487606.96 3626724.52 3.50440 487626.96
3626724.52 3.71801
487646.96 3626724.52 3.98898 487666.96

3626724.52   4.26290
         487686.96   3626724.52   4.54413   487706.96
3626724.52   4.84726
         487726.96   3626724.52   5.09550   487746.96
3626724.52   5.44194
         487766.96   3626724.52   5.87339   487786.96
3626724.52   6.37774
         487806.96   3626724.52   6.92488   487826.96
3626724.52   7.65686
         487846.96   3626724.52   8.49038   487866.96
3626724.52   9.34052
         487886.96   3626724.52   10.38213   487906.96
3626724.52   11.87161
         487926.96   3626724.52   13.63190   487946.96
3626724.52   15.87271
         487966.96   3626724.52   18.63506   487986.96
3626724.52   22.03887

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)   Y-COORD (M)   CONC   X-COORD (M)
Y-COORD (M)   CONC
- -
         488006.96   3626724.52   26.48590   488026.96
3626724.52   32.55787
         488046.96   3626724.52   41.31107   487406.96
3626744.52   1.98930
         487426.96   3626744.52   2.08929   487446.96
3626744.52   2.18204
         487466.96   3626744.52   2.28699   487486.96
3626744.52   2.40282

487506.96 3626744.52 2.53436 487526.96
3626744.52 2.68815
487546.96 3626744.52 2.83179 487566.96
3626744.52 2.99608
487586.96 3626744.52 3.20790 487606.96
3626744.52 3.45446
487626.96 3626744.52 3.65292 487646.96
3626744.52 3.88836
487666.96 3626744.52 4.14784 487686.96
3626744.52 4.43188
487706.96 3626744.52 4.74151 487726.96
3626744.52 5.00175
487746.96 3626744.52 5.34013 487766.96
3626744.52 5.75110
487786.96 3626744.52 6.18822 487806.96
3626744.52 6.68262
487826.96 3626744.52 7.42444 487846.96
3626744.52 8.26869
487866.96 3626744.52 9.14407 487886.96
3626744.52 10.14624
487906.96 3626744.52 11.57943 487926.96
3626744.52 13.33546
487946.96 3626744.52 15.49446 487966.96
3626744.52 17.93917
487986.96 3626744.52 21.09453 488006.96
3626744.52 25.21266
488026.96 3626744.52 30.77682 488046.96
3626744.52 38.64284
488066.96 3626744.52 50.79627 487446.96
3626764.52 2.13297
487466.96 3626764.52 2.23174 487486.96
3626764.52 2.35546
487506.96 3626764.52 2.49668 487526.96
3626764.52 2.63582
487546.96 3626764.52 2.76559 487566.96
3626764.52 2.93058
487586.96 3626764.52 3.12373 487606.96
3626764.52 3.34552
487626.96 3626764.52 3.57533 487646.96
3626764.52 3.79544
487666.96 3626764.52 4.03547 487686.96
3626764.52 4.31224
487706.96 3626764.52 4.64548 487726.96
3626764.52 4.95333
487746.96 3626764.52 5.27853 487766.96
3626764.52 5.63516
487786.96 3626764.52 6.01070 487806.96
3626764.52 6.53716
487826.96 3626764.52 7.14128 487846.96
3626764.52 7.94202

487866.96 3626764.52 8.94553 487886.96
3626764.52 9.96651
487906.96 3626764.52 11.28508 487926.96
3626764.52 12.85666
487946.96 3626764.52 14.89200 487966.96
3626764.52 16.95080
487986.96 3626764.52 19.57451 488006.96
3626764.52 23.18556
488026.96 3626764.52 28.56769 488046.96
3626764.52 35.81141
488066.96 3626764.52 45.95855 488086.96
3626764.52 62.54838
487466.96 3626784.52 2.20160 487486.96
3626784.52 2.32473
487506.96 3626784.52 2.44683 487526.96
3626784.52 2.56548
487546.96 3626784.52 2.71011 487566.96
3626784.52 2.87154
487586.96 3626784.52 3.04731 487606.96
3626784.52 3.23413
487626.96 3626784.52 3.43110 487646.96
3626784.52 3.66345

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC X-COORD (M)
Y-COORD (M) CONC
- -
487666.96 3626784.52 3.92932 487686.96
3626784.52 4.19347
487706.96 3626784.52 4.47610 487726.96

3626784.52 4.82866
487746.96 3626784.52 5.18110 487766.96
3626784.52 5.53682
487786.96 3626784.52 5.88510 487806.96
3626784.52 6.39886
487826.96 3626784.52 6.98384 487846.96
3626784.52 7.67805
487866.96 3626784.52 8.57047 487886.96
3626784.52 9.64884
487906.96 3626784.52 10.86379 487926.96
3626784.52 12.29164
487946.96 3626784.52 13.96030 487966.96
3626784.52 15.99652
487986.96 3626784.52 18.49449 488006.96
3626784.52 21.72863
488026.96 3626784.52 26.00818 488046.96
3626784.52 32.20248
487506.96 3626804.52 2.40074 487526.96
3626804.52 2.50697
487546.96 3626804.52 2.65636 487566.96
3626804.52 2.81062
487586.96 3626804.52 2.97565 487606.96
3626804.52 3.15402
487626.96 3626804.52 3.32254 487646.96
3626804.52 3.55875
487666.96 3626804.52 3.81393 487686.96
3626804.52 4.06673
487706.96 3626804.52 4.31238 487726.96
3626804.52 4.66384
487746.96 3626804.52 5.04480 487766.96
3626804.52 5.38474
487786.96 3626804.52 5.77517 487806.96
3626804.52 6.26238
487826.96 3626804.52 6.83153 487846.96
3626804.52 7.46546
487866.96 3626804.52 8.18183 487886.96
3626804.52 9.26736
487906.96 3626804.52 10.42788 487926.96
3626804.52 11.73028
487946.96 3626804.52 13.22569 487966.96
3626804.52 15.06179
487986.96 3626804.52 17.35487 487526.96
3626824.52 2.47717
487546.96 3626824.52 2.59990 487566.96
3626824.52 2.74242
487586.96 3626824.52 2.91175 487606.96
3626824.52 3.10920
487626.96 3626824.52 3.27670 487646.96
3626824.52 3.49501
487666.96 3626824.52 3.73393 487686.96

3626824.52 3.98109
487706.96 3626824.52 4.24665 487726.96
3626824.52 4.50045
487746.96 3626824.52 4.80886 487766.96
3626824.52 5.19456
487786.96 3626824.52 5.67691 487806.96
3626824.52 6.12678
487826.96 3626824.52 6.65340 487846.96
3626824.52 7.25525
487866.96 3626824.52 7.93594 487886.96
3626824.52 8.75717
487546.96 3626844.52 2.55664 487566.96
3626844.52 2.70263
487586.96 3626844.52 2.86534 487606.96
3626844.52 3.04861
487626.96 3626844.52 3.22233 487646.96
3626844.52 3.43182
487666.96 3626844.52 3.64939 487686.96
3626844.52 3.87486
487706.96 3626844.52 4.14610 487726.96
3626844.52 4.40415
487746.96 3626844.52 4.71752 487766.96
3626844.52 5.09162
487786.96 3626844.52 5.51777 487806.96
3626844.52 5.96640
487826.96 3626844.52 6.47619 487846.96
3626844.52 7.05440

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC X-COORD (M) Y-COORD (M) CONC

- -
487546.96 3626864.52 2.51101 487566.96
3626864.52 2.66391
487586.96 3626864.52 2.82138 487606.96
3626864.52 2.98635
487626.96 3626864.52 3.15688 487646.96
3626864.52 3.36162
487666.96 3626864.52 3.56777 487686.96
3626864.52 3.77853
487706.96 3626864.52 4.04882 487726.96
3626864.52 4.32353
487746.96 3626864.52 4.64313 487766.96
3626864.52 4.99557
487786.96 3626864.52 5.34975 487806.96
3626864.52 5.79877
487566.96 3626884.52 2.60330 487586.96
3626884.52 2.77013
487606.96 3626884.52 2.92817 487626.96
3626884.52 3.06586
487646.96 3626884.52 3.27468 487666.96
3626884.52 3.49528
487686.96 3626884.52 3.71587 487706.96
3626884.52 3.98519
487726.96 3626884.52 4.24271 487746.96
3626884.52 4.53283
487766.96 3626884.52 4.85270 487786.96
3626884.52 5.19177
487586.96 3626904.52 2.71667 487606.96
3626904.52 2.87889
487626.96 3626904.52 3.01295 487646.96
3626904.52 3.19748
487666.96 3626904.52 3.39982 487686.96
3626904.52 3.61706
487706.96 3626904.52 3.87852 487726.96
3626904.52 4.13102
487746.96 3626904.52 4.41454 487766.96
3626904.52 4.72736
487626.96 3626924.52 2.97119 487646.96
3626924.52 3.12934
487666.96 3626924.52 3.30926 487686.96
3626924.52 3.51714
487706.96 3626924.52 3.76263 487726.96
3626924.52 4.01034
487746.96 3626924.52 4.29364 487646.96
3626944.52 3.08057
487666.96 3626944.52 3.26344 487686.96
3626944.52 3.45957
487706.96 3626944.52 3.66170 487726.96
3626944.52 3.89477

487666.96   3626964.52   3.20304   487686.96
3626964.52   3.38943
487706.96   3626964.52   3.57933   487686.96
3626984.52   3.31276
488242.19   3625436.42   0.54866   488262.19
3625436.42   0.54096
488242.19   3625456.42   0.56325   488262.19
3625456.42   0.55524
488282.19   3625456.42   0.54758   488302.19
3625456.42   0.54116
488322.19   3625456.42   0.53705   488242.19
3625476.42   0.57849
488262.19   3625476.42   0.57013   488282.19
3625476.42   0.56226
488302.19   3625476.42   0.55575   488322.19
3625476.42   0.55168
488342.19   3625476.42   0.54987   488362.19
3625476.42   0.54960
488242.19   3625496.42   0.59440   488262.19
3625496.42   0.58571
488282.19   3625496.42   0.57762   488302.19
3625496.42   0.57119
488322.19   3625496.42   0.56719   488342.19
3625496.42   0.56547
488362.19   3625496.42   0.56522   488382.19
3625496.42   0.56545
488402.19   3625496.42   0.56535   488422.19
3625496.42   0.56447
488242.19   3625516.42   0.61103   488262.19
3625516.42   0.60200
488282.19   3625516.42   0.59362   488302.19
3625516.42   0.58716

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488322.19	3625516.42	0.58326	488342.19	3625516.42	0.58164
488362.19	3625516.42	0.58145	488382.19	3625516.42	0.58162
488402.19	3625516.42	0.58136	488422.19	3625516.42	0.58029
488442.19	3625516.42	0.57832	488462.19	3625516.42	0.57562
488482.19	3625516.42	0.57265	488222.19	3625536.42	0.63717
488242.19	3625536.42	0.62843	488262.19	3625536.42	0.61905
488282.19	3625536.42	0.61034	488302.19	3625536.42	0.60381
488322.19	3625536.42	0.60002	488342.19	3625536.42	0.59854
488362.19	3625536.42	0.59840	488382.19	3625536.42	0.59852
488402.19	3625536.42	0.59808	488422.19	3625536.42	0.59678
488442.19	3625536.42	0.59457	488462.19	3625536.42	0.59165
488482.19	3625536.42	0.58863	488502.19	3625536.42	0.58637
488522.19	3625536.42	0.58615	488542.19	3625536.42	0.58895
488222.19	3625556.42	0.65561	488242.19	3625556.42	0.64669
488262.19	3625556.42	0.63695	488282.19	3625556.42	0.62800
488302.19	3625556.42	0.62151	488322.19	3625556.42	0.61780
488342.19	3625556.42	0.61645	488362.19	3625556.42	0.61638
488382.19	3625556.42	0.61653	488402.19	3625556.42	0.61589
488422.19	3625556.42	0.61425	488442.19	3625556.42	0.61168
488462.19	3625556.42	0.60852	488482.19	3625556.42	0.60557
488502.19	3625556.42	0.60384	488522.19	3625556.42	0.60455
488542.19	3625556.42	0.60848	488562.19		

3625556.42 0.61529
488202.19 3625576.42 0.68160 488222.19
3625576.42 0.67500
488242.19 3625576.42 0.66583 488262.19
3625576.42 0.65573
488282.19 3625576.42 0.64660 488302.19
3625576.42 0.64007
488322.19 3625576.42 0.63650 488342.19
3625576.42 0.63532
488362.19 3625576.42 0.63534 488382.19
3625576.42 0.63536
488402.19 3625576.42 0.63442 488422.19
3625576.42 0.63242
488442.19 3625576.42 0.62956 488462.19
3625576.42 0.62629
488482.19 3625576.42 0.62353 488502.19
3625576.42 0.62240
488522.19 3625576.42 0.62412 488542.19
3625576.42 0.62923
488562.19 3625576.42 0.63703 488582.19
3625576.42 0.64562
488122.19 3625596.42 0.70234 488142.19
3625596.42 0.70307
488162.19 3625596.42 0.70470 488182.19
3625596.42 0.70501
488202.19 3625596.42 0.70214 488222.19
3625596.42 0.69546
488242.19 3625596.42 0.68590 488262.19
3625596.42 0.67545
488282.19 3625596.42 0.66620 488302.19
3625596.42 0.65958
488322.19 3625596.42 0.65616 488342.19
3625596.42 0.65521
488362.19 3625596.42 0.65532 488382.19
3625596.42 0.65508
488402.19 3625596.42 0.65375 488422.19
3625596.42 0.65139

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010

, L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488522.19	3625596.42	0.64500	488542.19	3625596.42	0.65130
488562.19	3625596.42	0.65999	488582.19	3625596.42	0.66877
488602.19	3625596.42	0.67583	488062.19	3625616.42	0.73916
488082.19	3625616.42	0.73231	488102.19	3625616.42	0.72707
488122.19	3625616.42	0.72485	488142.19	3625616.42	0.72533
488162.19	3625616.42	0.72686	488182.19	3625616.42	0.72709
488202.19	3625616.42	0.72403	488222.19	3625616.42	0.71703
488242.19	3625616.42	0.70709	488262.19	3625616.42	0.69630
488282.19	3625616.42	0.68685	488302.19	3625616.42	0.68026
488322.19	3625616.42	0.67693	488342.19	3625616.42	0.67606
488362.19	3625616.42	0.67612	488382.19	3625616.42	0.67566
488402.19	3625616.42	0.67492	488522.19	3625616.42	0.66739
488542.19	3625616.42	0.67492	488562.19	3625616.42	0.68417
488582.19	3625616.42	0.69286	488602.19	3625616.42	0.69935
488062.19	3625636.42	0.76406	488082.19	3625636.42	0.75691
488102.19	3625636.42	0.75125	488122.19	3625636.42	0.74857
488142.19	3625636.42	0.74878	488162.19	3625636.42	0.75022
488182.19	3625636.42	0.75042	488202.19	3625636.42	0.74718
488222.19	3625636.42	0.73983	488242.19	3625636.42	0.72947

488262.19 3625636.42 0.71828 488282.19
3625636.42 0.70859
488302.19 3625636.42 0.70201 488322.19
3625636.42 0.69881
488342.19 3625636.42 0.69803 488362.19
3625636.42 0.69799
488382.19 3625636.42 0.69725 488522.19
3625636.42 0.69140
488542.19 3625636.42 0.70006 488562.19
3625636.42 0.70966
488582.19 3625636.42 0.71802 488602.19
3625636.42 0.72384
488622.19 3625636.42 0.72729 488062.19
3625656.42 0.79041
488082.19 3625656.42 0.78287 488102.19
3625656.42 0.77674
488122.19 3625656.42 0.77358 488142.19
3625656.42 0.77351
488162.19 3625656.42 0.77488 488182.19
3625656.42 0.77508
488202.19 3625656.42 0.77171 488222.19
3625656.42 0.76395
488242.19 3625656.42 0.75311 488262.19
3625656.42 0.74147
488282.19 3625656.42 0.73147 488302.19
3625656.42 0.72490
488322.19 3625656.42 0.72192 488342.19
3625656.42 0.72122
488362.19 3625656.42 0.72100 488382.19
3625656.42 0.71993
488522.19 3625656.42 0.71714 488542.19
3625656.42 0.72675
488582.19 3625656.42 0.74426 488602.19
3625656.42 0.74939
488622.19 3625656.42 0.75235 488642.19
3625656.42 0.75414
488062.19 3625676.42 0.81748 488082.19
3625676.42 0.81030
488102.19 3625676.42 0.80384 488122.19
3625676.42 0.80022
488142.19 3625676.42 0.79982 488162.19
3625676.42 0.80107

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***

INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 , L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488182.19	3625676.42	0.80117	488202.19	3625676.42	0.79755
488222.19	3625676.42	0.78939	488242.19	3625676.42	0.77795
488262.19	3625676.42	0.76581	488282.19	3625676.42	0.75563
488302.19	3625676.42	0.74906	488322.19	3625676.42	0.74625
488342.19	3625676.42	0.74559	488362.19	3625676.42	0.74516
488382.19	3625676.42	0.74360	488582.19	3625676.42	0.77169
488602.19	3625676.42	0.77613	488622.19	3625676.42	0.77875
488642.19	3625676.42	0.78060	488062.19	3625696.42	0.84611
488082.19	3625696.42	0.83942	488102.19	3625696.42	0.83269
488122.19	3625696.42	0.82857	488142.19	3625696.42	0.82770
488162.19	3625696.42	0.82873	488182.19	3625696.42	0.82873
488202.19	3625696.42	0.82487	488222.19	3625696.42	0.81629
488242.19	3625696.42	0.80424	488262.19	3625696.42	0.79160
488282.19	3625696.42	0.78123	488302.19	3625696.42	0.77468
488322.19	3625696.42	0.77196	488342.19	3625696.42	0.77128
488362.19	3625696.42	0.77060	488382.19	3625696.42	0.76867
488582.19	3625696.42	0.80040	488602.19		

3625696.42 0.80418
488622.19 3625696.42 0.80661 488642.19
3625696.42 0.80868
488662.19 3625696.42 0.81182 488042.19
3625716.42 0.87851
488142.19 3625716.42 0.85726 488162.19
3625716.42 0.85797
488182.19 3625716.42 0.85785 488202.19
3625716.42 0.85382
488222.19 3625716.42 0.84478 488242.19
3625716.42 0.83215
488262.19 3625716.42 0.81901 488282.19
3625716.42 0.80843
488302.19 3625716.42 0.80189 488322.19
3625716.42 0.79918
488342.19 3625716.42 0.79836 488362.19
3625716.42 0.79742
488382.19 3625716.42 0.79535 488602.19
3625716.42 0.83371
488622.19 3625716.42 0.83610 488642.19
3625716.42 0.83862
488662.19 3625716.42 0.84313 488682.19
3625716.42 0.85067
488022.19 3625736.42 0.90219 488042.19
3625736.42 0.91009
488182.19 3625736.42 0.88867 488202.19
3625736.42 0.88435
488222.19 3625736.42 0.87481 488242.19
3625736.42 0.86152
488262.19 3625736.42 0.84782 488282.19
3625736.42 0.83697
488302.19 3625736.42 0.83049 488322.19
3625736.42 0.82800
488362.19 3625736.42 0.82665 488382.19
3625736.42 0.82341
488402.19 3625736.42 0.81937 488602.19
3625736.42 0.86502
488622.19 3625736.42 0.86765 488642.19
3625736.42 0.87115
488662.19 3625736.42 0.87743 488682.19
3625736.42 0.88722
488702.19 3625736.42 0.89969 488002.19
3625756.42 0.91591
488022.19 3625756.42 0.93224 488182.19
3625756.42 0.92138
488202.19 3625756.42 0.91672 488222.19
3625756.42 0.90668

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488242.19	3625756.42	0.89268	488262.19	3625756.42	0.87839
488282.19	3625756.42	0.86731	488382.19	3625756.42	0.85319
488602.19	3625756.42	0.89836	488622.19	3625756.42	0.90158
488642.19	3625756.42	0.90662	488662.19	3625756.42	0.91509
488682.19	3625756.42	0.92708	488702.19	3625756.42	0.94069
487982.19	3625776.42	0.92575	488002.19	3625776.42	0.94605
488222.19	3625776.42	0.94063	488242.19	3625776.42	0.92591
488262.19	3625776.42	0.91101	488622.19	3625776.42	0.93831
488642.19	3625776.42	0.94555	488662.19	3625776.42	0.95643
488682.19	3625776.42	0.97020	488702.19	3625776.42	0.98387
488722.19	3625776.42	0.99384	487982.19	3625796.42	0.95673
488222.19	3625796.42	0.97673	488242.19	3625796.42	0.96119
488262.19	3625796.42	0.94573	488622.19	3625796.42	0.97961
488642.19	3625796.42	0.98837	488662.19	3625796.42	1.00156

488682.19 3625796.42 1.01624 488702.19
3625796.42 1.02861
488722.19 3625796.42 1.03518 488742.19
3625796.42 1.03394
488222.19 3625816.42 1.01519 488242.19
3625816.42 0.99878
488262.19 3625816.42 0.98286 488642.19
3625816.42 1.03531
488662.19 3625816.42 1.05030 488682.19
3625816.42 1.06465
488702.19 3625816.42 1.07414 488722.19
3625816.42 1.07594
488742.19 3625816.42 1.06894 488762.19
3625816.42 1.05377
488202.19 3625836.42 1.06963 488222.19
3625836.42 1.05630
488242.19 3625836.42 1.03894 488662.19
3625836.42 1.10219
488682.19 3625836.42 1.11461 488702.19
3625836.42 1.11964
488722.19 3625836.42 1.11543 488742.19
3625836.42 1.10205
488762.19 3625836.42 1.08095 488782.19
3625836.42 1.05450
488202.19 3625856.42 1.11438 488222.19
3625856.42 1.10003
488242.19 3625856.42 1.08285 488682.19
3625856.42 1.16508
488702.19 3625856.42 1.16420 488722.19
3625856.42 1.15311
488742.19 3625856.42 1.13303 488762.19
3625856.42 1.10632
488782.19 3625856.42 1.07595 488802.19
3625856.42 1.04503
488822.19 3625856.42 1.01621 488202.19
3625876.42 1.16181
488222.19 3625876.42 1.14671 488662.19
3625876.42 1.21220
488682.19 3625876.42 1.21513 488702.19
3625876.42 1.20705
488722.19 3625876.42 1.18854 488742.19
3625876.42 1.16193
488762.19 3625876.42 1.13040 488782.19
3625876.42 1.09743
488802.19 3625876.42 1.06616 488822.19
3625876.42 1.03881
488842.19 3625876.42 1.01655 488202.19
3625896.42 1.21199
488222.19 3625896.42 1.19660 488642.19
3625896.42 1.26139

488662.19   3625896.42   1.26843   488682.19
3625896.42   1.26386

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002 , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010 , L0000011   , L0000012   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488702.19	3625896.42	1.24754	488722.19	3625896.42	1.22159
488742.19	3625896.42	1.18918	488762.19	3625896.42	1.15420
488782.19	3625896.42	1.12028	488802.19	3625896.42	1.09021
488822.19	3625896.42	1.06554	488842.19	3625896.42	1.04652
488862.19	3625896.42	1.03252	488882.19	3625896.42	1.02226
488902.19	3625896.42	1.01419	488202.19	3625916.42	1.26666
488222.19	3625916.42	1.25031	488642.19	3625916.42	1.32409
488662.19	3625916.42	1.32372	488682.19	3625916.42	1.31033
488702.19	3625916.42	1.28549	488762.19	3625916.42	1.17929
488782.19	3625916.42	1.14597	488802.19	3625916.42	1.11852
488822.19	3625916.42	1.09729	488842.19	3625916.42	1.08158
488862.19	3625916.42	1.07005	488882.19		

3625916.42 1.06101
488902.19 3625916.42 1.05286 488922.19
3625916.42 1.04425
488942.19 3625916.42 1.03422 488222.19
3625936.42 1.30832
488622.19 3625936.42 1.38240 488642.19
3625936.42 1.38674
488662.19 3625936.42 1.37702 488682.19
3625936.42 1.35407
488782.19 3625936.42 1.17606 488802.19
3625936.42 1.15220
488822.19 3625936.42 1.13457 488842.19
3625936.42 1.12163
488862.19 3625936.42 1.11155 488882.19
3625936.42 1.10252
488902.19 3625936.42 1.09305 488922.19
3625936.42 1.08214
488942.19 3625936.42 1.06936 488962.19
3625936.42 1.05476
488982.19 3625936.42 1.03869 489002.19
3625936.42 1.02198
488602.19 3625956.42 1.44359 488622.19
3625956.42 1.45292
488642.19 3625956.42 1.44781 488662.19
3625956.42 1.42757
488782.19 3625956.42 1.21202 488802.19
3625956.42 1.19198
488822.19 3625956.42 1.17738 488842.19
3625956.42 1.16607
488862.19 3625956.42 1.15606 488882.19
3625956.42 1.14570
488902.19 3625956.42 1.13382 488922.19
3625956.42 1.11998
488942.19 3625956.42 1.10423 488962.19
3625956.42 1.08700
488982.19 3625956.42 1.06894 489002.19
3625956.42 1.05085
489022.19 3625956.42 1.03333 489042.19
3625956.42 1.01699
489062.19 3625956.42 1.00227 489082.19
3625956.42 0.98945
488622.19 3625976.42 1.52299 488802.19
3625976.42 1.23782
488822.19 3625976.42 1.22513 488842.19
3625976.42 1.21410
488862.19 3625976.42 1.20274 488882.19
3625976.42 1.18980
488902.19 3625976.42 1.17478 488922.19
3625976.42 1.15763
488942.19 3625976.42 1.13900 488962.19

3625976.42   1.11963
        488982.19   3625976.42   1.10028   489002.19
3625976.42   1.08175
        489022.19   3625976.42   1.06462   489042.19
3625976.42   1.04938
        489062.19   3625976.42   1.03635   489082.19
3625976.42   1.02568

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002 , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010 , L0000011   , L0000012   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
489102.19	3625976.42	1.01743	489122.19	3625976.42	1.01144
488802.19	3625996.42	1.28917	488822.19	3625996.42	1.27680
488842.19	3625996.42	1.26452	488922.19	3625996.42	1.19548
488942.19	3625996.42	1.17448	488962.19	3625996.42	1.15375
488982.19	3625996.42	1.13409	489002.19	3625996.42	1.11621
489022.19	3625996.42	1.10052	489042.19	3625996.42	1.08730
489062.19	3625996.42	1.07664	489082.19	3625996.42	1.06857
489102.19	3625996.42	1.06284	489122.19	3625996.42	1.05911
489142.19	3625996.42	1.05693	488802.19	3626016.42	1.34506

488822.19 3626016.42 1.33109 488842.19
3626016.42 1.31596
488982.19 3626016.42 1.17249 489002.19
3626016.42 1.15635
489022.19 3626016.42 1.14297 489042.19
3626016.42 1.13239
489062.19 3626016.42 1.12450 489082.19
3626016.42 1.11908
489102.19 3626016.42 1.11547 489122.19
3626016.42 1.11332
489142.19 3626016.42 1.11204 488782.19
3626036.42 1.41965
488802.19 3626036.42 1.40396 488822.19
3626036.42 1.38675
488842.19 3626036.42 1.36773 489042.19
3626036.42 1.18567
489062.19 3626036.42 1.18030 489082.19
3626036.42 1.17692
489102.19 3626036.42 1.17460 489122.19
3626036.42 1.17287
489142.19 3626036.42 1.17116 488782.19
3626056.42 1.48377
488802.19 3626056.42 1.46449 488822.19
3626056.42 1.44297
488842.19 3626056.42 1.41976 489042.19
3626056.42 1.24747
489062.19 3626056.42 1.24370 489082.19
3626056.42 1.24120
489102.19 3626056.42 1.23891 489122.19
3626056.42 1.23617
489142.19 3626056.42 1.23256 489162.19
3626056.42 1.22795
488782.19 3626076.42 1.55093 488802.19
3626076.42 1.52583
488822.19 3626076.42 1.49976 488842.19
3626076.42 1.47267
488862.19 3626076.42 1.44600 489062.19
3626076.42 1.31361
489082.19 3626076.42 1.31036 489102.19
3626076.42 1.30656
489122.19 3626076.42 1.30148 489142.19
3626076.42 1.29484
489162.19 3626076.42 1.28683 488782.19
3626096.42 1.61855
488802.19 3626096.42 1.58810 488822.19
3626096.42 1.55827
488842.19 3626096.42 1.52877 488862.19
3626096.42 1.50109
489062.19 3626096.42 1.38803 489082.19
3626096.42 1.38237

489102.19 3626096.42 1.37549 489122.19
3626096.42 1.36684
489142.19 3626096.42 1.35625 489162.19
3626096.42 1.34393
488782.19 3626116.42 1.68586 488802.19
3626116.42 1.65278
488822.19 3626116.42 1.62094 488842.19
3626116.42 1.59127
488862.19 3626116.42 1.56526 489062.19
3626116.42 1.46474
489082.19 3626116.42 1.45520 489102.19
3626116.42 1.44385

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC X-COORD (M)
Y-COORD (M) CONC
- -
489122.19 3626116.42 1.43061 489142.19
3626116.42 1.41539
489162.19 3626116.42 1.39800 489182.19
3626116.42 1.37909
488782.19 3626136.42 1.75711 488802.19
3626136.42 1.72266
488822.19 3626136.42 1.69156 488842.19
3626136.42 1.66417
488862.19 3626136.42 1.64166 489082.19
3626136.42 1.52714
489102.19 3626136.42 1.51024 489122.19
3626136.42 1.49149
489142.19 3626136.42 1.47082 489162.19

3626136.42 1.44797
489182.19 3626136.42 1.42386 488782.19
3626156.42 1.83564
488802.19 3626156.42 1.80238 488822.19
3626156.42 1.77466
488842.19 3626156.42 1.75141 488862.19
3626156.42 1.73331
488882.19 3626156.42 1.71980 489102.19
3626156.42 1.57282
489122.19 3626156.42 1.54766 489142.19
3626156.42 1.52098
489162.19 3626156.42 1.49248 489182.19
3626156.42 1.46303
488782.19 3626176.42 1.92684 488802.19
3626176.42 1.89727
488822.19 3626176.42 1.87447 488842.19
3626176.42 1.85563
488862.19 3626176.42 1.84115 488882.19
3626176.42 1.82997
489122.19 3626176.42 1.59743 489142.19
3626176.42 1.56444
489162.19 3626176.42 1.53046 489182.19
3626176.42 1.49578
488782.19 3626196.42 2.03615 488802.19
3626196.42 2.01143
488822.19 3626196.42 1.99319 488842.19
3626196.42 1.97716
488862.19 3626196.42 1.96357 488882.19
3626196.42 1.95139
488902.19 3626196.42 1.93868 489142.19
3626196.42 1.60040
489162.19 3626196.42 1.56097 489182.19
3626196.42 1.52143
489202.19 3626196.42 1.48198 488782.19
3626216.42 2.16741
488802.19 3626216.42 2.14644 488822.19
3626216.42 2.12995
488842.19 3626216.42 2.11354 488862.19
3626216.42 2.09740
488882.19 3626216.42 2.08080 488902.19
3626216.42 2.06235
489142.19 3626216.42 1.62818 489162.19
3626216.42 1.58364
489182.19 3626216.42 1.53958 489202.19
3626216.42 1.49597
489222.19 3626216.42 1.45283 489242.19
3626216.42 1.41016
489262.19 3626216.42 1.36839 488782.19
3626236.42 2.32105
488802.19 3626236.42 2.30077 488822.19

3626236.42 2.28137
488842.19 3626236.42 2.26101 488862.19
3626236.42 2.23901
488882.19 3626236.42 2.21458 488902.19
3626236.42 2.18705
489142.19 3626236.42 1.64727 489162.19
3626236.42 1.59808
489182.19 3626236.42 1.54978 489202.19
3626236.42 1.50214
489222.19 3626236.42 1.45524 489242.19
3626236.42 1.40926
489262.19 3626236.42 1.36487 488782.19
3626256.42 2.49372
488802.19 3626256.42 2.47042 488822.19
3626256.42 2.44389
488842.19 3626256.42 2.41435 488862.19
3626256.42 2.38184

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC X-COORD (M) Y-COORD (M) CONC
- -
488882.19 3626256.42 2.34624 488902.19
3626256.42 2.30677
488922.19 3626256.42 2.26287 489142.19
3626256.42 1.65723
489162.19 3626256.42 1.60500 489222.19
3626256.42 1.44986
489242.19 3626256.42 1.40103 489262.19
3626256.42 1.35421

488882.19   3626276.42   2.46919   488902.19
3626276.42   2.41479
488922.19   3626276.42   2.35678   489142.19
3626276.42   1.65768
489162.19   3626276.42   1.60368   489242.19
3626276.42   1.38626
489262.19   3626276.42   1.33750   488882.19
3626296.42   2.57637
488902.19   3626296.42   2.50487   489262.19
3626296.42   1.31658
489282.19   3626296.42   1.26948   488902.19
3626316.42   2.57335
489282.19   3626316.42   1.24536   489302.19
3626316.42   1.20102
488902.19   3626336.42   2.61880   488922.19
3626336.42   2.51836
489302.19   3626336.42   1.17569   489322.19
3626336.42   1.13427
488922.19   3626356.42   2.52959   488942.19
3626356.42   2.42289
489322.19   3626356.42   1.10960   488942.19
3626376.42   2.40542
488962.19   3626376.42   2.29513   489322.19
3626376.42   1.08504
489342.19   3626376.42   1.04924   488962.19
3626396.42   2.25647
489322.19   3626396.42   1.06132   489342.19
3626396.42   1.02589
489342.19   3626416.42   1.00560   489342.19
3626436.42   0.98773
488086.20   3626768.13   15.69995   488077.21
3626746.82   16.29630
488075.79   3626778.08   14.62446   488002.86
3626694.73   14.46709
487535.35   3626865.62   2.41809   487693.75
3626992.77   3.34605
487795.04   3626883.94   5.36440   487871.55
3626830.06   8.03795
487958.83   3626811.74   13.98328   488041.80
3626794.50   28.50756
488094.61   3626765.41   71.38897   488046.12
3626714.76   42.06057
488007.32   3626665.19   29.69189   487941.59
3626599.46   17.84671
487911.42   3626574.68   14.89835   487815.52
3626540.19   9.14534
487709.91   3626504.63   5.96517   487555.82
3626439.98   3.84119
487490.09   3626487.39   3.13971   487428.67
3626556.36   2.52570

487358.63   3626713.68   1.85904   487522.42
3626827.90   2.44601
488235.45   3625424.52   0.54262   488562.08
3625540.85   0.59915
488747.03   3625794.41   1.02894   488857.40
3625879.42   1.00771
489054.28   3625949.52   0.99748   489134.82
3625964.44   0.98249
489178.07   3626085.25   1.30325   489203.43
3626198.60   1.48140
489260.10   3626203.08   1.37113   489276.51
3626217.99   1.33906
489267.56   3626265.72   1.33454   489336.17
3626346.26   1.09679
489361.53   3626432.77   0.96193   489331.70
3626449.18   0.99466
489309.32   3626361.18   1.13084   489258.61
3626298.53   1.32299
489190.00   3626228.43   1.52869   489149.73
3626317.92   1.60986
489130.34   3626250.81   1.68786   489137.80
3626216.50   1.63814

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002 , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010 , L0000011   , L0000012   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)   Y-COORD (M)   CONC   X-COORD (M)
Y-COORD (M)   CONC
- -
489054.28   3626106.13   1.42781   489036.38
3626036.03   1.18655
488921.53   3625997.25   1.19786   488846.96

3625983.83 1.22982
488872.31 3626110.61 1.53356 488902.14
3626194.13 1.92481
488931.97 3626270.20 2.30136 488908.77
3626298.76 2.49030
488936.81 3626348.34 2.45246 488971.36
3626378.01 2.24509
488968.11 3626409.72 2.19772 488903.08
3626355.25 2.63623
488864.87 3626256.49 2.37778 488763.27
3626259.34 2.54590
488787.87 3625962.95 1.21919 488735.67
3625906.27 1.21399
488620.82 3625988.31 1.56489 488588.00
3625956.98 1.43342
488671.53 3625861.52 1.17511 488629.77
3625813.79 1.02219
488588.00 3625746.67 0.87983 488571.59
3625648.23 0.72940
488516.41 3625666.13 0.72858 488522.37
3625581.11 0.62892
488431.39 3625576.63 0.63139 488447.79
3625615.41 0.66682
488388.13 3625616.90 0.67603 488398.57
3625706.40 0.77921
488406.03 3625745.18 0.83123 488392.60
3625776.50 0.88268
488350.84 3625722.81 0.80716 488279.24
3625769.05 0.88887
488282.23 3625807.83 0.95535 488246.43
3625851.08 1.06702
488230.02 3625946.54 1.33137 488188.26
3625924.17 1.29698
488213.62 3625757.11 0.91276 488170.36
3625779.49 0.96306
488170.36 3625733.25 0.88428 488077.88
3625697.45 0.84254
487973.47 3625822.74 0.99156 487955.57
3625809.32 0.95191
488058.49 3625678.06 0.82088 488057.00
3625618.40 0.74328
488107.71 3625596.02 0.70295 488185.27
3625576.63 0.68435
488228.53 3625528.90 0.62764 488233.01
3625482.66 0.58705

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487526.96	3626464.52	3.70936	487546.96	3626464.52	3.86213
487566.96	3626464.52	4.03701	487586.96	3626464.52	4.27788
487606.96	3626464.52	4.48372	487506.96	3626484.52	3.52571
487526.96	3626484.52	3.72569	487546.96	3626484.52	3.77659
487566.96	3626484.52	3.95807	487586.96	3626484.52	4.19594
487606.96	3626484.52	4.40178	487626.96	3626484.52	4.67674
487646.96	3626484.52	4.98370	487486.96	3626504.52	3.24990
487506.96	3626504.52	3.43891	487526.96	3626504.52	3.63587
487546.96	3626504.52	3.68624	487566.96	3626504.52	3.86897
487586.96	3626504.52	4.10339	487606.96	3626504.52	4.31638
487626.96	3626504.52	4.59202	487646.96	3626504.52	4.90072
487666.96	3626504.52	5.24019	487686.96	3626504.52	5.56490
487706.96	3626504.52	5.92090	487466.96	3626524.52	2.99884
487486.96	3626524.52	3.16317	487506.96	3626524.52	3.34249
487526.96	3626524.52	3.54004	487546.96	3626524.52	3.59905

487566.96 3626524.52 3.78222 487586.96
3626524.52 4.01227
487606.96 3626524.52 4.26175 487626.96
3626524.52 4.50524
487646.96 3626524.52 4.81044 487666.96
3626524.52 5.14444
487686.96 3626524.52 5.47870 487706.96
3626524.52 5.89170
487726.96 3626524.52 6.35064 487746.96
3626524.52 6.92758
487766.96 3626524.52 7.52036 487446.96
3626544.52 2.79153
487466.96 3626544.52 2.92819 487486.96
3626544.52 3.08320
487506.96 3626544.52 3.24868 487526.96
3626544.52 3.42064
487546.96 3626544.52 3.61962 487566.96
3626544.52 3.70388
487586.96 3626544.52 3.93025 487606.96
3626544.52 4.21056
487626.96 3626544.52 4.45214 487646.96
3626544.52 4.72256
487666.96 3626544.52 5.04959 487686.96
3626544.52 5.39051
487706.96 3626544.52 5.82830 487726.96
3626544.52 6.29386
487746.96 3626544.52 6.81317 487766.96
3626544.52 7.39791
487786.96 3626544.52 8.06186 487806.96
3626544.52 8.90446
487826.96 3626544.52 9.65105 487426.96
3626564.52 2.61979
487446.96 3626564.52 2.72277 487466.96
3626564.52 2.85767
487486.96 3626564.52 3.00269 487506.96
3626564.52 3.15815
487526.96 3626564.52 3.33747 487546.96
3626564.52 3.46590
487566.96 3626564.52 3.62652 487586.96
3626564.52 3.84738
487606.96 3626564.52 4.23099 487626.96
3626564.52 4.35486
487646.96 3626564.52 4.64651 487666.96
3626564.52 4.95258
487686.96 3626564.52 5.31302 487706.96
3626564.52 5.71637
487726.96 3626564.52 6.17041 487746.96
3626564.52 6.67955
487766.96 3626564.52 7.25457 487786.96
3626564.52 7.96789

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487806.96	3626564.52	8.72273	487826.96	3626564.52	9.58065
487846.96	3626564.52	10.56560	487866.96	3626564.52	11.70575
487426.96	3626584.52	2.55569	487446.96	3626584.52	2.67432
487466.96	3626584.52	2.80595	487486.96	3626584.52	2.92307
487506.96	3626584.52	3.07302	487526.96	3626584.52	3.24660
487546.96	3626584.52	3.36239	487566.96	3626584.52	3.55577
487586.96	3626584.52	3.76942	487606.96	3626584.52	4.10171
487626.96	3626584.52	4.26126	487646.96	3626584.52	4.54688
487666.96	3626584.52	4.86452	487686.96	3626584.52	5.21823
487706.96	3626584.52	5.59957	487726.96	3626584.52	6.05822
487746.96	3626584.52	6.55965	487766.96	3626584.52	7.12779
487786.96	3626584.52	7.77482	487806.96	3626584.52	8.51422
487826.96	3626584.52	9.36362	487846.96		

3626584.52 10.34325
487866.96 3626584.52 11.47659 487886.96
3626584.52 12.79913
487906.96 3626584.52 14.35271 487426.96
3626604.52 2.48646
487446.96 3626604.52 2.60505 487466.96
3626604.52 2.73216
487486.96 3626604.52 2.85038 487506.96
3626604.52 2.99607
487526.96 3626604.52 3.15752 487546.96
3626604.52 3.31537
487566.96 3626604.52 3.49319 487586.96
3626604.52 3.70343
487606.96 3626604.52 3.92714 487626.96
3626604.52 4.17656
487646.96 3626604.52 4.45238 487666.96
3626604.52 4.75864
487686.96 3626604.52 5.10066 487706.96
3626604.52 5.48522
487726.96 3626604.52 5.91375 487746.96
3626604.52 6.39817
487766.96 3626604.52 6.94958 487786.96
3626604.52 7.58095
487806.96 3626604.52 8.29010 487826.96
3626604.52 9.16738
487846.96 3626604.52 10.08009 487866.96
3626604.52 11.20260
487886.96 3626604.52 12.52585 487906.96
3626604.52 14.09398
487926.96 3626604.52 15.95413 487406.96
3626624.52 2.31866
487426.96 3626624.52 2.42312 487446.96
3626624.52 2.53749
487466.96 3626624.52 2.65903 487486.96
3626624.52 2.79012
487506.96 3626624.52 2.92140 487526.96
3626624.52 3.07625
487546.96 3626624.52 3.25961 487566.96
3626624.52 3.43757
487586.96 3626624.52 3.65144 487606.96
3626624.52 3.87151
487626.96 3626624.52 4.10149 487646.96
3626624.52 4.36518
487666.96 3626624.52 4.65980 487686.96
3626624.52 4.99007
487706.96 3626624.52 5.35954 487726.96
3626624.52 5.77366
487746.96 3626624.52 6.24169 487766.96
3626624.52 6.77303
487786.96 3626624.52 7.37822 487806.96

3626624.52 8.28775
487826.96 3626624.52 9.14697 487846.96
3626624.52 10.13952
487866.96 3626624.52 10.90976 487886.96
3626624.52 12.21454

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487906.96	3626624.52	13.78600	487926.96	3626624.52	15.65444
487946.96	3626624.52	17.88794	487406.96	3626644.52	2.25998
487426.96	3626644.52	2.36211	487446.96	3626644.52	2.47173
487466.96	3626644.52	2.58912	487486.96	3626644.52	2.71694
487506.96	3626644.52	2.85566	487526.96	3626644.52	2.99927
487546.96	3626644.52	3.18861	487566.96	3626644.52	3.40132
487586.96	3626644.52	3.60558	487606.96	3626644.52	3.81899
487626.96	3626644.52	4.05425	487646.96	3626644.52	4.29058
487666.96	3626644.52	4.57105	487686.96	3626644.52	4.88861
487706.96	3626644.52	5.23183	487726.96	3626644.52	5.63213

487746.96 3626644.52 6.09860 487766.96
3626644.52 6.61007
487786.96 3626644.52 7.26428 487806.96
3626644.52 7.95966
487826.96 3626644.52 8.70414 487846.96
3626644.52 9.71170
487866.96 3626644.52 10.61165 487886.96
3626644.52 11.86933
487906.96 3626644.52 13.44234 487926.96
3626644.52 15.30754
487946.96 3626644.52 17.53423 487966.96
3626644.52 20.37350
487386.96 3626664.52 2.11155 487406.96
3626664.52 2.20346
487426.96 3626664.52 2.30215 487446.96
3626664.52 2.40806
487466.96 3626664.52 2.52296 487486.96
3626664.52 2.64686
487506.96 3626664.52 2.78186 487526.96
3626664.52 2.93293
487546.96 3626664.52 3.11774 487566.96
3626664.52 3.29461
487586.96 3626664.52 3.51948 487606.96
3626664.52 3.73689
487626.96 3626664.52 3.99297 487646.96
3626664.52 4.22159
487666.96 3626664.52 4.49114 487686.96
3626664.52 4.77471
487706.96 3626664.52 5.11057 487726.96
3626664.52 5.50576
487746.96 3626664.52 5.93710 487766.96
3626664.52 6.37512
487786.96 3626664.52 6.93319 487806.96
3626664.52 7.58545
487826.96 3626664.52 8.33512 487846.96
3626664.52 9.22169
487866.96 3626664.52 10.35327 487886.96
3626664.52 11.59333
487906.96 3626664.52 13.11395 487926.96
3626664.52 14.79771
487946.96 3626664.52 17.13584 487966.96
3626664.52 20.01597
487986.96 3626664.52 23.56286 487386.96
3626684.52 2.05845
487406.96 3626684.52 2.14734 487426.96
3626684.52 2.24317
487446.96 3626684.52 2.34700 487466.96
3626684.52 2.45835
487486.96 3626684.52 2.57965 487506.96
3626684.52 2.71390

487526.96   3626684.52   2.87049   487546.96
3626684.52   3.02321
487566.96   3626684.52   3.18934   487586.96
3626684.52   3.37522
487606.96   3626684.52   3.61300   487626.96
3626684.52   3.90126
487646.96   3626684.52   4.15139   487666.96
3626684.52   4.41678
487686.96   3626684.52   4.64987   487706.96
3626684.52   4.97188

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK   ***
INCLUDING SOURCE(S):   L0000013   , L0000014   , L0000015   , L0000016   ,   L0000017   ,
L0000018   , L0000019   , L0000020   , L0000021   , L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487726.96	3626684.52	5.34198	487746.96	3626684.52	5.69180
487766.96	3626684.52	6.13118	487786.96	3626684.52	6.67311
487806.96	3626684.52	7.29522	487826.96	3626684.52	8.00383
487846.96	3626684.52	8.82765	487866.96	3626684.52	9.80049
487886.96	3626684.52	10.93929	487906.96	3626684.52	12.35725
487926.96	3626684.52	14.25941	487946.96	3626684.52	16.60062
487966.96	3626684.52	19.38113	487986.96	3626684.52	23.04352
488006.96	3626684.52	27.37997	487366.96		

3626704.52 1.92545
487386.96 3626704.52 2.00475 487406.96
3626704.52 2.08893
487426.96 3626704.52 2.18126 487446.96
3626704.52 2.28829
487466.96 3626704.52 2.39701 487486.96
3626704.52 2.51762
487506.96 3626704.52 2.65014 487526.96
3626704.52 2.79914
487546.96 3626704.52 2.95580 487566.96
3626704.52 3.11838
487586.96 3626704.52 3.29137 487606.96
3626704.52 3.48203
487626.96 3626704.52 3.73905 487646.96
3626704.52 4.04887
487666.96 3626704.52 4.34543 487686.96
3626704.52 4.55434
487706.96 3626704.52 4.84901 487726.96
3626704.52 5.12698
487746.96 3626704.52 5.48973 487766.96
3626704.52 5.92000
487786.96 3626704.52 6.44139 487806.96
3626704.52 7.04632
487826.96 3626704.52 7.71549 487846.96
3626704.52 8.47537
487866.96 3626704.52 9.36015 487886.96
3626704.52 10.43643
487906.96 3626704.52 11.82565 487926.96
3626704.52 13.58201
487946.96 3626704.52 15.64509 487966.96
3626704.52 18.74833
487986.96 3626704.52 22.12188 488006.96
3626704.52 26.49593
488026.96 3626704.52 32.47053 487386.96
3626724.52 1.95199
487406.96 3626724.52 2.03763 487426.96
3626724.52 2.13057
487446.96 3626724.52 2.23003 487466.96
3626724.52 2.33538
487486.96 3626724.52 2.45007 487506.96
3626724.52 2.57652
487526.96 3626724.52 2.71883 487546.96
3626724.52 2.86698
487566.96 3626724.52 3.03772 487586.96
3626724.52 3.21650
487606.96 3626724.52 3.42298 487626.96
3626724.52 3.62805
487646.96 3626724.52 3.89823 487666.96
3626724.52 4.15641
487686.96 3626724.52 4.43040 487706.96

```
3626724.52        4.72941
         487726.96    3626724.52        4.97746                      487746.96
3626724.52        5.32546
         487766.96    3626724.52        5.74289                      487786.96
3626724.52        6.22594
         487806.96    3626724.52        6.75680                      487826.96
3626724.52        7.43834
         487846.96    3626724.52        8.21662                      487866.96
3626724.52        9.04107
         487886.96    3626724.52       10.03733                      487906.96
3626724.52       11.45509
         487926.96    3626724.52       13.07831                      487946.96
3626724.52       15.37027
         487966.96    3626724.52       18.08779                      487986.96
3626724.52       21.32470
```


*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK   ***
INCLUDING SOURCE(S):   L0000013   , L0000014   , L0000015   , L0000016   ,   L0000017   ,
L0000018   , L0000019   , L0000020   , L0000021   , L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

```
       X-COORD (M)   Y-COORD (M)        CONC                        X-COORD (M)
Y-COORD (M)       CONC
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - - - -
         488006.96    3626724.52       25.53478                      488026.96
3626724.52       31.22570
         488046.96    3626724.52       39.29393                      487406.96
3626744.52        1.98700
         487426.96    3626744.52        2.08258                      487446.96
3626744.52        2.17352
         487466.96    3626744.52        2.27505                      487486.96
3626744.52        2.38626
         487506.96    3626744.52        2.51044                      487526.96
3626744.52        2.65093
```

487546.96 3626744.52 2.78859 487566.96
3626744.52 2.94309
487586.96 3626744.52 3.14352 487606.96
3626744.52 3.35681
487626.96 3626744.52 3.54999 487646.96
3626744.52 3.77186
487666.96 3626744.52 4.01644 487686.96
3626744.52 4.28515
487706.96 3626744.52 4.57998 487726.96
3626744.52 4.85584
487746.96 3626744.52 5.19122 487766.96
3626744.52 5.58713
487786.96 3626744.52 5.98870 487806.96
3626744.52 6.46947
487826.96 3626744.52 7.17532 487846.96
3626744.52 7.94839
487866.96 3626744.52 8.77252 487886.96
3626744.52 9.72080
487906.96 3626744.52 11.06886 487926.96
3626744.52 12.74199
487946.96 3626744.52 15.05061 487966.96
3626744.52 17.39009
487986.96 3626744.52 20.39531 488006.96
3626744.52 24.30028
488026.96 3626744.52 29.53604 488046.96
3626744.52 36.84563
488066.96 3626744.52 47.89815 487446.96
3626764.52 2.11962
487466.96 3626764.52 2.21553 487486.96
3626764.52 2.33175
487506.96 3626764.52 2.46125 487526.96
3626764.52 2.59094
487546.96 3626764.52 2.71778 487566.96
3626764.52 2.87085
487586.96 3626764.52 3.04568 487606.96
3626764.52 3.26019
487626.96 3626764.52 3.46889 487646.96
3626764.52 3.67856
487666.96 3626764.52 3.90778 487686.96
3626764.52 4.16809
487706.96 3626764.52 4.47298 487726.96
3626764.52 4.77296
487746.96 3626764.52 5.09463 487766.96
3626764.52 5.44812
487786.96 3626764.52 5.78979 487806.96
3626764.52 6.28363
487826.96 3626764.52 6.84899 487846.96
3626764.52 7.62732
487866.96 3626764.52 8.53219 487886.96
3626764.52 9.48014

487906.96 3626764.52 10.72426 487926.96
3626764.52 12.15976
487946.96 3626764.52 14.36111 487966.96
3626764.52 16.06827
487986.96 3626764.52 18.33648 488006.96
3626764.52 21.60998
488026.96 3626764.52 27.22659 488046.96
3626764.52 34.11460
488066.96 3626764.52 43.33661 488086.96
3626764.52 57.91255
487466.96 3626784.52 2.17709 487486.96
3626784.52 2.29155
487506.96 3626784.52 2.40668 487526.96
3626784.52 2.52143
487546.96 3626784.52 2.65659 487566.96
3626784.52 2.80583
487586.96 3626784.52 2.96794 487606.96
3626784.52 3.14141
487626.96 3626784.52 3.32625 487646.96
3626784.52 3.53931

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC X-COORD (M) Y-COORD (M) CONC
- -
487666.96 3626784.52 3.80585 487686.96
3626784.52 4.05494
487706.96 3626784.52 4.32410 487726.96
3626784.52 4.64874
487746.96 3626784.52 4.98383 487766.96

3626784.52 5.33194
487786.96 3626784.52 5.64156 487806.96
3626784.52 6.12022
487826.96 3626784.52 6.66470 487846.96
3626784.52 7.30535
487866.96 3626784.52 8.18434 487886.96
3626784.52 9.16544
487906.96 3626784.52 10.28028 487926.96
3626784.52 11.62975
487946.96 3626784.52 13.16880 487966.96
3626784.52 15.04073
487986.96 3626784.52 17.32882 488006.96
3626784.52 20.26577
488026.96 3626784.52 24.11790 488046.96
3626784.52 30.52044
487506.96 3626804.52 2.35643 487526.96
3626804.52 2.46076
487546.96 3626804.52 2.59898 487566.96
3626804.52 2.74230
487586.96 3626804.52 2.89595 487606.96
3626804.52 3.06221
487626.96 3626804.52 3.22574 487646.96
3626804.52 3.43985
487666.96 3626804.52 3.67220 487686.96
3626804.52 3.90882
487706.96 3626804.52 4.14695 487726.96
3626804.52 4.46552
487746.96 3626804.52 4.85344 487766.96
3626804.52 5.14220
487786.96 3626804.52 5.51661 487806.96
3626804.52 5.97178
487826.96 3626804.52 6.49979 487846.96
3626804.52 7.09016
487866.96 3626804.52 7.75782 487886.96
3626804.52 8.81657
487906.96 3626804.52 9.88129 487926.96
3626804.52 11.08527
487946.96 3626804.52 12.47092 487966.96
3626804.52 14.16219
487986.96 3626804.52 16.29903 487526.96
3626824.52 2.42338
487546.96 3626824.52 2.54094 487566.96
3626824.52 2.67536
487586.96 3626824.52 2.83161 487606.96
3626824.52 3.00977
487626.96 3626824.52 3.17117 487646.96
3626824.52 3.37166
487666.96 3626824.52 3.59132 487686.96
3626824.52 3.82233
487706.96 3626824.52 4.07222 487726.96

3626824.52 4.31999
487746.96 3626824.52 4.61361 487766.96
3626824.52 4.97140
487786.96 3626824.52 5.40938 487806.96
3626824.52 5.83402
487826.96 3626824.52 6.32667 487846.96
3626824.52 6.88821
487866.96 3626824.52 7.52298 487886.96
3626824.52 8.28107
487546.96 3626844.52 2.49441 487566.96
3626844.52 2.63091
487586.96 3626844.52 2.78175 487606.96
3626844.52 2.94954
487626.96 3626844.52 3.11402 487646.96
3626844.52 3.30741
487666.96 3626844.52 3.51100 487686.96
3626844.52 3.72523
487706.96 3626844.52 3.97749 487726.96
3626844.52 4.22628
487746.96 3626844.52 4.52161 487766.96
3626844.52 4.86913
487786.96 3626844.52 5.26384 487806.96
3626844.52 5.68436
487826.96 3626844.52 6.16095 487846.96
3626844.52 6.70051

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC X-COORD (M) Y-COORD (M) CONC
- -

487546.96   3626864.52   2.44765   487566.96
3626864.52   2.58924
487586.96   3626864.52   2.73579   487606.96
3626864.52   2.89014
487626.96   3626864.52   3.05147   487646.96
3626864.52   3.24102
487666.96   3626864.52   3.43557   487686.96
3626864.52   3.63787
487706.96   3626864.52   3.88830   487726.96
3626864.52   4.14761
487746.96   3626864.52   4.44621   487766.96
3626864.52   4.77616
487786.96   3626864.52   5.11405   487806.96
3626864.52   5.53236
487566.96   3626884.52   2.53183   487586.96
3626884.52   2.68605
487606.96   3626884.52   2.83499   487626.96
3626884.52   2.97035
487646.96   3626884.52   3.16377   487666.96
3626884.52   3.36851
487686.96   3626884.52   3.57701   487706.96
3626884.52   3.82593
487726.96   3626884.52   4.07134   487746.96
3626884.52   4.34640
487766.96   3626884.52   4.64958   487786.96
3626884.52   4.97307
487586.96   3626904.52   2.63561   487606.96
3626904.52   2.78780
487626.96   3626904.52   2.91947   487646.96
3626904.52   3.09383
487666.96   3626904.52   3.28460   487686.96
3626904.52   3.48997
487706.96   3626904.52   3.73306   487726.96
3626904.52   3.97302
487746.96   3626904.52   4.24122   487766.96
3626904.52   4.53683
487626.96   3626924.52   2.87896   487646.96
3626924.52   3.03132
487666.96   3626924.52   3.20353   487686.96
3626924.52   3.40098
487706.96   3626924.52   3.63152   487726.96
3626924.52   3.86640
487746.96   3626924.52   4.13314   487646.96
3626944.52   2.98551
487666.96   3626944.52   3.15981   487686.96
3626944.52   3.34680
487706.96   3626944.52   3.54041   487726.96
3626944.52   3.76178
487666.96   3626964.52   3.10385   487686.96
3626964.52   3.28180

487706.96 3626964.52 3.46373 487686.96
3626984.52 3.21019
488242.19 3625436.42 0.53506 488262.19
3625436.42 0.52963
488242.19 3625456.42 0.54916 488262.19
3625456.42 0.54351
488282.19 3625456.42 0.53793 488302.19
3625456.42 0.53281
488322.19 3625456.42 0.52890 488242.19
3625476.42 0.56388
488262.19 3625476.42 0.55799 488282.19
3625476.42 0.55225
488302.19 3625476.42 0.54701 488322.19
3625476.42 0.54302
488342.19 3625476.42 0.54020 488362.19
3625476.42 0.53825
488242.19 3625496.42 0.57925 488262.19
3625496.42 0.57313
488282.19 3625496.42 0.56722 488302.19
3625496.42 0.56200
488322.19 3625496.42 0.55796 488342.19
3625496.42 0.55507
488362.19 3625496.42 0.55303 488382.19
3625496.42 0.55141
488402.19 3625496.42 0.54996 488422.19
3625496.42 0.54851
488242.19 3625516.42 0.59530 488262.19
3625516.42 0.58896
488282.19 3625516.42 0.58280 488302.19
3625516.42 0.57750

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488322.19	3625516.42	0.57341	488342.19	3625516.42	0.57046
488362.19	3625516.42	0.56834	488382.19	3625516.42	0.56664
488402.19	3625516.42	0.56510	488422.19	3625516.42	0.56364
488442.19	3625516.42	0.56234	488462.19	3625516.42	0.56138
488482.19	3625516.42	0.56101	488222.19	3625536.42	0.61840
488242.19	3625536.42	0.61210	488262.19	3625536.42	0.60552
488282.19	3625536.42	0.59910	488302.19	3625536.42	0.59366
488322.19	3625536.42	0.58951	488342.19	3625536.42	0.58651
488362.19	3625536.42	0.58430	488382.19	3625536.42	0.58254
488402.19	3625536.42	0.58093	488422.19	3625536.42	0.57947
488442.19	3625536.42	0.57824	488462.19	3625536.42	0.57740
488482.19	3625536.42	0.57722	488502.19	3625536.42	0.57784
488522.19	3625536.42	0.57949	488542.19	3625536.42	0.58223
488222.19	3625556.42	0.63608	488242.19	3625556.42	0.62973
488262.19	3625556.42	0.62291	488282.19	3625556.42	0.61628
488302.19	3625556.42	0.61078	488322.19	3625556.42	0.60655
488342.19	3625556.42	0.60348	488362.19	3625556.42	0.60124
488382.19	3625556.42	0.59952	488402.19	3625556.42	0.59786
488422.19	3625556.42	0.59633	488442.19	3625556.42	0.59507
488462.19	3625556.42	0.59432	488482.19	3625556.42	0.59441
488502.19	3625556.42	0.59545	488522.19	3625556.42	0.59756
488542.19	3625556.42	0.60068	488562.19	3625556.42	0.60460
488202.19	3625576.42	0.65988	488222.19		

3625576.42 0.65466
488242.19 3625576.42 0.64820 488262.19
3625576.42 0.64114
488282.19 3625576.42 0.63435 488302.19
3625576.42 0.62871
488322.19 3625576.42 0.62442 488342.19
3625576.42 0.62134
488362.19 3625576.42 0.61909 488382.19
3625576.42 0.61729
488402.19 3625576.42 0.61551 488422.19
3625576.42 0.61392
488442.19 3625576.42 0.61273 488462.19
3625576.42 0.61220
488482.19 3625576.42 0.61261 488502.19
3625576.42 0.61404
488522.19 3625576.42 0.61655 488542.19
3625576.42 0.62007
488562.19 3625576.42 0.62437 488582.19
3625576.42 0.62899
488122.19 3625596.42 0.68729 488142.19
3625596.42 0.68609
488162.19 3625596.42 0.68490 488182.19
3625596.42 0.68292
488202.19 3625596.42 0.67948 488222.19
3625596.42 0.67426
488242.19 3625596.42 0.66757 488262.19
3625596.42 0.66027
488282.19 3625596.42 0.65337 488302.19
3625596.42 0.64753
488322.19 3625596.42 0.64318 488342.19
3625596.42 0.64012
488362.19 3625596.42 0.63788 488382.19
3625596.42 0.63591
488402.19 3625596.42 0.63396 488422.19
3625596.42 0.63233

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488522.19	3625596.42	0.63657	488542.19	3625596.42	0.64048
488562.19	3625596.42	0.64518	488582.19	3625596.42	0.65012
488602.19	3625596.42	0.65493	488062.19	3625616.42	0.71567
488082.19	3625616.42	0.71328	488102.19	3625616.42	0.71078
488122.19	3625616.42	0.70885	488142.19	3625616.42	0.70749
488162.19	3625616.42	0.70616	488182.19	3625616.42	0.70403
488202.19	3625616.42	0.70037	488222.19	3625616.42	0.69493
488242.19	3625616.42	0.68801	488262.19	3625616.42	0.68049
488282.19	3625616.42	0.67338	488302.19	3625616.42	0.66743
488322.19	3625616.42	0.66294	488342.19	3625616.42	0.65977
488362.19	3625616.42	0.65743	488382.19	3625616.42	0.65535
488402.19	3625616.42	0.65428	488522.19	3625616.42	0.65776
488542.19	3625616.42	0.66211	488562.19	3625616.42	0.66708
488582.19	3625616.42	0.67228	488602.19	3625616.42	0.67726
488062.19	3625636.42	0.73863	488082.19	3625636.42	0.73620
488102.19	3625636.42	0.73363	488122.19	3625636.42	0.73153
488142.19	3625636.42	0.73002	488162.19	3625636.42	0.72856
488182.19	3625636.42	0.72631	488202.19	3625636.42	0.72247
488222.19	3625636.42	0.71676	488242.19	3625636.42	0.70958
488262.19	3625636.42	0.70178	488282.19	3625636.42	0.69442

488302.19 3625636.42 0.68832 488322.19
3625636.42 0.68373
488342.19 3625636.42 0.68045 488362.19
3625636.42 0.67798
488382.19 3625636.42 0.67577 488522.19
3625636.42 0.68021
488542.19 3625636.42 0.68499 488562.19
3625636.42 0.69024
488582.19 3625636.42 0.69566 488602.19
3625636.42 0.70081
488622.19 3625636.42 0.70556 488062.19
3625656.42 0.76290
488082.19 3625656.42 0.76031 488102.19
3625656.42 0.75766
488122.19 3625656.42 0.75539 488142.19
3625656.42 0.75374
488162.19 3625656.42 0.75220 488182.19
3625656.42 0.74986
488202.19 3625656.42 0.74586 488222.19
3625656.42 0.73985
488242.19 3625656.42 0.73235 488262.19
3625656.42 0.72423
488282.19 3625656.42 0.71655 488302.19
3625656.42 0.71027
488322.19 3625656.42 0.70563 488342.19
3625656.42 0.70226
488362.19 3625656.42 0.69960 488382.19
3625656.42 0.69727
488522.19 3625656.42 0.70401 488542.19
3625656.42 0.70921
488582.19 3625656.42 0.72035 488602.19
3625656.42 0.72567
488622.19 3625656.42 0.73058 488642.19
3625656.42 0.73523
488062.19 3625676.42 0.78780 488082.19
3625676.42 0.78574
488102.19 3625676.42 0.78314 488122.19
3625676.42 0.78076
488142.19 3625676.42 0.77895 488162.19
3625676.42 0.77727

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***

INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488182.19	3625676.42	0.77476	488202.19	3625676.42	0.77048
488222.19	3625676.42	0.76418	488242.19	3625676.42	0.75626
488262.19	3625676.42	0.74777	488282.19	3625676.42	0.73988
488302.19	3625676.42	0.73340	488322.19	3625676.42	0.72865
488342.19	3625676.42	0.72514	488362.19	3625676.42	0.72231
488382.19	3625676.42	0.71973	488582.19	3625676.42	0.74649
488602.19	3625676.42	0.75196	488622.19	3625676.42	0.75711
488642.19	3625676.42	0.76207	488062.19	3625696.42	0.81413
488082.19	3625696.42	0.81268	488102.19	3625696.42	0.81020
488122.19	3625696.42	0.80769	488142.19	3625696.42	0.80561
488162.19	3625696.42	0.80374	488182.19	3625696.42	0.80104
488202.19	3625696.42	0.79651	488222.19	3625696.42	0.78989
488242.19	3625696.42	0.78156	488262.19	3625696.42	0.77270
488282.19	3625696.42	0.76456	488302.19	3625696.42	0.75786
488322.19	3625696.42	0.75292	488342.19	3625696.42	0.74924
488362.19	3625696.42	0.74625	488382.19	3625696.42	0.74362
488582.19	3625696.42	0.77421	488602.19	3625696.42	0.77979
488622.19	3625696.42	0.78522	488642.19		

3625696.42 0.79049
488662.19 3625696.42 0.79601 488042.19
3625716.42 0.84078
488142.19 3625716.42 0.83384 488162.19
3625716.42 0.83168
488182.19 3625716.42 0.82880 488202.19
3625716.42 0.82407
488222.19 3625716.42 0.81711 488242.19
3625716.42 0.80839
488262.19 3625716.42 0.79914 488282.19
3625716.42 0.79070
488302.19 3625716.42 0.78377 488322.19
3625716.42 0.77856
488342.19 3625716.42 0.77462 488362.19
3625716.42 0.77150
488382.19 3625716.42 0.76916 488602.19
3625716.42 0.80930
488622.19 3625716.42 0.81502 488642.19
3625716.42 0.82060
488662.19 3625716.42 0.82667 488682.19
3625716.42 0.83310
488022.19 3625736.42 0.86366 488042.19
3625736.42 0.87035
488182.19 3625736.42 0.85815 488202.19
3625736.42 0.85312
488222.19 3625736.42 0.84578 488242.19
3625736.42 0.83661
488262.19 3625736.42 0.82693 488282.19
3625736.42 0.81814
488302.19 3625736.42 0.81098 488322.19
3625736.42 0.80567
488362.19 3625736.42 0.79909 488382.19
3625736.42 0.79610
488402.19 3625736.42 0.79444 488602.19
3625736.42 0.84075
488622.19 3625736.42 0.84684 488642.19
3625736.42 0.85291
488662.19 3625736.42 0.85948 488682.19
3625736.42 0.86635
488702.19 3625736.42 0.87299 488002.19
3625756.42 0.88164
488022.19 3625756.42 0.89269 488182.19
3625756.42 0.88929
488202.19 3625756.42 0.88389 488222.19
3625756.42 0.87618

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488242.19	3625756.42	0.86653	488262.19	3625756.42	0.85639
488282.19	3625756.42	0.84724	488382.19	3625756.42	0.82483
488602.19	3625756.42	0.87429	488622.19	3625756.42	0.88081
488642.19	3625756.42	0.88748	488662.19	3625756.42	0.89453
488682.19	3625756.42	0.90165	488702.19	3625756.42	0.90806
487982.19	3625776.42	0.89778	488002.19	3625776.42	0.91147
488222.19	3625776.42	0.90854	488242.19	3625776.42	0.89839
488262.19	3625776.42	0.88775	488622.19	3625776.42	0.91715
488642.19	3625776.42	0.92452	488662.19	3625776.42	0.93191
488682.19	3625776.42	0.93897	488702.19	3625776.42	0.94465
488722.19	3625776.42	0.94767	487982.19	3625796.42	0.92842
488222.19	3625796.42	0.94292	488242.19	3625796.42	0.93219
488262.19	3625796.42	0.92107	488622.19	3625796.42	0.95691
488642.19	3625796.42	0.96412	488662.19	3625796.42	0.97164
488682.19	3625796.42	0.97820	488702.19	3625796.42	0.98250

488722.19 3625796.42 0.98333 488742.19
3625796.42 0.97977
488222.19 3625816.42 0.97950 488242.19
3625816.42 0.96815
488262.19 3625816.42 0.95662 488642.19
3625816.42 1.00631
488662.19 3625816.42 1.01363 488682.19
3625816.42 1.01911
488702.19 3625816.42 1.02133 488722.19
3625816.42 1.01924
488742.19 3625816.42 1.01215 488762.19
3625816.42 1.00018
488202.19 3625836.42 1.02870 488222.19
3625836.42 1.01857
488242.19 3625836.42 1.00652 488662.19
3625836.42 1.05766
488682.19 3625836.42 1.06140 488702.19
3625836.42 1.06077
488722.19 3625836.42 1.05499 488742.19
3625836.42 1.04395
488762.19 3625836.42 1.02821 488782.19
3625836.42 1.00903
488202.19 3625856.42 1.07101 488222.19
3625856.42 1.06008
488242.19 3625856.42 1.04808 488682.19
3625856.42 1.10454
488702.19 3625856.42 1.10035 488722.19
3625856.42 1.09038
488742.19 3625856.42 1.07513 488762.19
3625856.42 1.05573
488782.19 3625856.42 1.03387 488802.19
3625856.42 1.01132
488822.19 3625856.42 0.98961 488202.19
3625876.42 1.11582
488222.19 3625876.42 1.10434 488662.19
3625876.42 1.15056
488682.19 3625876.42 1.14816 488702.19
3625876.42 1.13968
488722.19 3625876.42 1.12517 488742.19
3625876.42 1.10574
488762.19 3625876.42 1.08312 488782.19
3625876.42 1.05927
488802.19 3625876.42 1.03600 488822.19
3625876.42 1.01457
488842.19 3625876.42 0.99574 488202.19
3625896.42 1.16342
488222.19 3625896.42 1.15159 488642.19
3625896.42 1.19933
488662.19 3625896.42 1.19884 488682.19
3625896.42 1.19191

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488702.19	3625896.42	1.17841	488722.19	3625896.42	1.15931
488742.19	3625896.42	1.13612	488762.19	3625896.42	1.11102
488782.19	3625896.42	1.08605	488802.19	3625896.42	1.06283
488822.19	3625896.42	1.04236	488842.19	3625896.42	1.02491
488862.19	3625896.42	1.01037	488882.19	3625896.42	0.99820
488902.19	3625896.42	0.98768	488202.19	3625916.42	1.21496
488222.19	3625916.42	1.20235	488642.19	3625916.42	1.25250
488662.19	3625916.42	1.24747	488682.19	3625916.42	1.23528
488702.19	3625916.42	1.21660	488762.19	3625916.42	1.14042
488782.19	3625916.42	1.11497	488802.19	3625916.42	1.09260
488822.19	3625916.42	1.07354	488842.19	3625916.42	1.05759
488862.19	3625916.42	1.04424	488882.19	3625916.42	1.03271
488902.19	3625916.42	1.02219	488922.19		

3625916.42 1.01193
488942.19 3625916.42 1.00133 488222.19
3625936.42 1.25710
488622.19 3625936.42 1.30953 488642.19
3625936.42 1.30665
488662.19 3625936.42 1.29601 488682.19
3625936.42 1.27815
488782.19 3625936.42 1.14696 488802.19
3625936.42 1.12598
488822.19 3625936.42 1.10850 488842.19
3625936.42 1.09387
488862.19 3625936.42 1.08127 488882.19
3625936.42 1.06977
488902.19 3625936.42 1.05860 488922.19
3625936.42 1.04711
488942.19 3625936.42 1.03501 488962.19
3625936.42 1.02219
488982.19 3625936.42 1.00874 489002.19
3625936.42 0.99518
488602.19 3625956.42 1.37017 488622.19
3625956.42 1.36956
488642.19 3625956.42 1.36101 488662.19
3625956.42 1.34425
488782.19 3625956.42 1.18296 488802.19
3625956.42 1.16355
488822.19 3625956.42 1.14742 488842.19
3625956.42 1.13357
488862.19 3625956.42 1.12102 488882.19
3625956.42 1.10889
488902.19 3625956.42 1.09645 488922.19
3625956.42 1.08339
488942.19 3625956.42 1.06961 488962.19
3625956.42 1.05525
488982.19 3625956.42 1.04059 489002.19
3625956.42 1.02610
489022.19 3625956.42 1.01208 489042.19
3625956.42 0.99891
489062.19 3625956.42 0.98687 489082.19
3625956.42 0.97607
488622.19 3625976.42 1.43084 488802.19
3625976.42 1.20538
488822.19 3625976.42 1.19016 488842.19
3625976.42 1.17651
488862.19 3625976.42 1.16332 488882.19
3625976.42 1.14985
488902.19 3625976.42 1.13574 488922.19
3625976.42 1.12079
488942.19 3625976.42 1.10529 488962.19
3625976.42 1.08960
488982.19 3625976.42 1.07411 489002.19

```
3625976.42        1.05929
         489022.19    3625976.42        1.04545                       489042.19
3625976.42        1.03290
         489062.19    3625976.42        1.02180                       489082.19
3625976.42        1.01221
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                       ***        14:45:58

                                  PAGE  49
 *** MODELOPTs:    CONC  ELEV   FLGPOL  URBAN  SigA Data

                              *** THE PERIOD ( 26304 HRS) AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: TRUCK    ***
                                  INCLUDING SOURCE(S):     L0000013    , L0000014
, L0000015    , L0000016   ,   L0000017    ,
                 L0000018    , L0000019    , L0000020    , L0000021    , L0000022
, L0000023    , L0000024   ,

                                             ***   DISCRETE CARTESIAN RECEPTOR POINTS
***

                                        **   CONC OF PM_10    IN MICROGRAMS/M**3
                   **

       X-COORD (M)   Y-COORD (M)        CONC                        X-COORD (M)
Y-COORD (M)       CONC
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - - - -
         489102.19    3625976.42        1.00415                       489122.19
3625976.42        0.99751
         488802.19    3625996.42        1.25142                       488822.19
3625996.42        1.23637
         488842.19    3625996.42        1.22221                       488922.19
3625996.42        1.15964
         488942.19    3625996.42        1.14265                       488962.19
3625996.42        1.12604
         488982.19    3625996.42        1.11029                       489002.19
3625996.42        1.09581
         489022.19    3625996.42        1.08278                       489042.19
3625996.42        1.07133
         489062.19    3625996.42        1.06147                       489082.19
3625996.42        1.05324
         489102.19    3625996.42        1.04645                       489122.19
3625996.42        1.04089
         489142.19    3625996.42        1.03628                       488802.19
3626016.42        1.30143
         488822.19    3626016.42        1.28556                       488842.19
3626016.42        1.27001
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488982.19 3626016.42 1.15067 489002.19
3626016.42 1.13711
489022.19 3626016.42 1.12527 489042.19
3626016.42 1.11515
489062.19 3626016.42 1.10666 489082.19
3626016.42 1.09972
489102.19 3626016.42 1.09384 489122.19
3626016.42 1.08889
489142.19 3626016.42 1.08452 488782.19
3626036.42 1.37242
488802.19 3626036.42 1.35482 488822.19
3626036.42 1.33730
488842.19 3626036.42 1.31976 489042.19
3626036.42 1.16478
489062.19 3626036.42 1.15739 489082.19
3626036.42 1.15130
489102.19 3626036.42 1.14583 489122.19
3626036.42 1.14076
489142.19 3626036.42 1.13578 488782.19
3626056.42 1.43059
488802.19 3626056.42 1.41112 488822.19
3626056.42 1.39138
488842.19 3626056.42 1.37162 489042.19
3626056.42 1.22036
489062.19 3626056.42 1.21343 489082.19
3626056.42 1.20747
489102.19 3626056.42 1.20167 489122.19
3626056.42 1.19560
489142.19 3626056.42 1.18901 489162.19
3626056.42 1.18193
488782.19 3626076.42 1.49311 488802.19
3626076.42 1.47021
488822.19 3626076.42 1.44806 488842.19
3626076.42 1.42606
488862.19 3626076.42 1.40491 489062.19
3626076.42 1.27427
489082.19 3626076.42 1.26739 489102.19
3626076.42 1.26029
489122.19 3626076.42 1.25235 489142.19
3626076.42 1.24337
489162.19 3626076.42 1.23367 488782.19
3626096.42 1.55826
488802.19 3626096.42 1.53244 488822.19
3626096.42 1.50825
488842.19 3626096.42 1.48475 488862.19
3626096.42 1.46266
489062.19 3626096.42 1.33871 489082.19
3626096.42 1.32978
489102.19 3626096.42 1.32020 489122.19
3626096.42 1.30944

489142.19 3626096.42 1.29736 489162.19
3626096.42 1.28418
488782.19 3626116.42 1.62579 488802.19
3626116.42 1.59897
488822.19 3626116.42 1.57359 488842.19
3626116.42 1.54972
488862.19 3626116.42 1.52816 489062.19
3626116.42 1.40521
489082.19 3626116.42 1.39310 489102.19
3626116.42 1.37986

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
489122.19	3626116.42	1.36541	489142.19	3626116.42	1.34963
489162.19	3626116.42	1.33223	489182.19	3626116.42	1.31389
488782.19	3626136.42	1.69903	488802.19	3626136.42	1.67151
488822.19	3626136.42	1.64633	488842.19	3626136.42	1.62318
488862.19	3626136.42	1.60282	489082.19	3626136.42	1.45591
489102.19	3626136.42	1.43807	489122.19	3626136.42	1.41911
489142.19	3626136.42	1.39890	489162.19	3626136.42	1.37695
489182.19	3626136.42	1.35427	488782.19		

3626156.42 1.78006
488802.19 3626156.42 1.75279 488822.19
3626156.42 1.72884
488842.19 3626156.42 1.70704 488862.19
3626156.42 1.68809
488882.19 3626156.42 1.67188 489102.19
3626156.42 1.49328
489122.19 3626156.42 1.46901 489142.19
3626156.42 1.44386
489162.19 3626156.42 1.41723 489182.19
3626156.42 1.38998
488782.19 3626176.42 1.87182 488802.19
3626176.42 1.84554
488822.19 3626176.42 1.82316 488842.19
3626176.42 1.80252
488862.19 3626176.42 1.78445 488882.19
3626176.42 1.76864
489122.19 3626176.42 1.51382 489142.19
3626176.42 1.48336
489162.19 3626176.42 1.45213 489182.19
3626176.42 1.42026
488782.19 3626196.42 1.97684 488802.19
3626196.42 1.95164
488822.19 3626196.42 1.93036 488842.19
3626196.42 1.90990
488862.19 3626196.42 1.89109 488882.19
3626196.42 1.87353
488902.19 3626196.42 1.85574 489142.19
3626196.42 1.51668
489162.19 3626196.42 1.48056 489182.19
3626196.42 1.44427
489202.19 3626196.42 1.40795 488782.19
3626216.42 2.09684
488802.19 3626216.42 2.07193 488822.19
3626216.42 2.05004
488842.19 3626216.42 2.02790 488862.19
3626216.42 2.00612
488882.19 3626216.42 1.98433 488902.19
3626216.42 1.96136
489142.19 3626216.42 1.54287 489162.19
3626216.42 1.50204
489182.19 3626216.42 1.46158 489202.19
3626216.42 1.42147
489222.19 3626216.42 1.38175 489242.19
3626216.42 1.34245
489262.19 3626216.42 1.30410 488782.19
3626236.42 2.23213
488802.19 3626236.42 2.20583 488822.19
3626236.42 2.18025
488842.19 3626236.42 2.15407 488862.19

3626236.42 2.12685
488882.19 3626236.42 2.09804 488902.19
3626236.42 2.06714
489142.19 3626236.42 1.56129 489162.19
3626236.42 1.51620
489182.19 3626236.42 1.47195 489202.19
3626236.42 1.42826
489222.19 3626236.42 1.38528 489242.19
3626236.42 1.34320
489262.19 3626236.42 1.30276 488782.19
3626256.42 2.38078
488802.19 3626256.42 2.35092 488822.19
3626256.42 2.31857
488842.19 3626256.42 2.28392 488862.19
3626256.42 2.24730

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC X-COORD (M) Y-COORD (M) CONC
- -
488882.19 3626256.42 2.20899 488902.19
3626256.42 2.16844
488922.19 3626256.42 2.12509 489142.19
3626256.42 1.57170
489162.19 3626256.42 1.52420 489222.19
3626256.42 1.38252
489242.19 3626256.42 1.33803 489262.19
3626256.42 1.29552
488882.19 3626276.42 2.31282 488902.19
3626276.42 2.26095

488922.19 3626276.42 2.20730 489142.19
3626276.42 1.57419
489162.19 3626276.42 1.52588 489242.19
3626276.42 1.32758
489262.19 3626276.42 1.28320 488882.19
3626296.42 2.40548
488902.19 3626296.42 2.34049 489262.19
3626296.42 1.26715
489282.19 3626296.42 1.22395 488902.19
3626316.42 2.40375
489282.19 3626316.42 1.20426 489302.19
3626316.42 1.16316
488902.19 3626336.42 2.44816 488922.19
3626336.42 2.35902
489302.19 3626336.42 1.14134 489322.19
3626336.42 1.10253
488922.19 3626356.42 2.37321 488942.19
3626356.42 2.27808
489322.19 3626356.42 1.08046 488942.19
3626376.42 2.26789
488962.19 3626376.42 2.16940 489322.19
3626376.42 1.05782
489342.19 3626376.42 1.02386 488962.19
3626396.42 2.14135
489322.19 3626396.42 1.03527 489342.19
3626396.42 1.00143
489342.19 3626416.42 0.98122 489342.19
3626436.42 0.96254
488086.20 3626768.13 16.13494 488077.21
3626746.82 16.87865
488075.79 3626778.08 14.51576 488002.86
3626694.73 14.04242
487535.35 3626865.62 2.36169 487693.75
3626992.77 3.24183
487795.04 3626883.94 5.13384 487871.55
3626830.06 7.61740
487958.83 3626811.74 13.17543 488041.80
3626794.50 26.35630
488094.61 3626765.41 65.37882 488046.12
3626714.76 39.88850
488007.32 3626665.19 28.38423 487941.59
3626599.46 17.46797
487911.42 3626574.68 14.83093 487815.52
3626540.19 9.18400
487709.91 3626504.63 5.98374 487555.82
3626439.98 3.98240
487490.09 3626487.39 3.35687 487428.67
3626556.36 2.63325
487358.63 3626713.68 1.86847 487522.42
3626827.90 2.39215

488235.45   3625424.52   0.52862   488562.08
3625540.85   0.58986
488747.03   3625794.41   0.97501   488857.40
3625879.42   0.98769
489054.28   3625949.52   0.98050   489134.82
3625964.44   0.96981
489178.07   3626085.25   1.24648   489203.43
3626198.60   1.40747
489260.10   3626203.08   1.30582   489276.51
3626217.99   1.27741
489267.56   3626265.72   1.27893   489336.17
3626346.26   1.06810
489361.53   3626432.77   0.93797   489331.70
3626449.18   0.96789
489309.32   3626361.18   1.10085   489258.61
3626298.53   1.27337
489190.00   3626228.43   1.45213   489149.73
3626317.92   1.53917
489130.34   3626250.81   1.59950   489137.80
3626216.50   1.55201

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK   ***
INCLUDING SOURCE(S):   L0000013   , L0000014   , L0000015   , L0000016   ,   L0000017   ,
L0000018   , L0000019   , L0000020   , L0000021   , L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)   Y-COORD (M)   CONC   X-COORD (M)   Y-COORD (M)   CONC
- -
489054.28   3626106.13   1.37486   489036.38
3626036.03   1.16617
488921.53   3625997.25   1.16196   488846.96
3625983.83   1.18995
488872.31   3626110.61   1.49820   488902.14

3626194.13 1.84386
488931.97 3626270.20 2.15693 488908.77
3626298.76 2.32796
488936.81 3626348.34 2.30269 488971.36
3626378.01 2.12510
488968.11 3626409.72 2.09289 488903.08
3626355.25 2.46814
488864.87 3626256.49 2.24271 488763.27
3626259.34 2.43505
488787.87 3625962.95 1.18993 488735.67
3625906.27 1.15954
488620.82 3625988.31 1.46857 488588.00
3625956.98 1.36886
488671.53 3625861.52 1.11608 488629.77
3625813.79 0.99642
488588.00 3625746.67 0.85320 488571.59
3625648.23 0.70715
488516.41 3625666.13 0.71529 488522.37
3625581.11 0.62117
488431.39 3625576.63 0.61350 488447.79
3625615.41 0.65056
488388.13 3625616.90 0.65547 488398.57
3625706.40 0.75471
488406.03 3625745.18 0.80679 488392.60
3625776.50 0.85494
488350.84 3625722.81 0.78174 488279.24
3625769.05 0.86786
488282.23 3625807.83 0.93119 488246.43
3625851.08 1.03398
488230.02 3625946.54 1.28066 488188.26
3625924.17 1.24369
488213.62 3625757.11 0.88086 488170.36
3625779.49 0.93048
488170.36 3625733.25 0.85553 488077.88
3625697.45 0.81455
487973.47 3625822.74 0.96507 487955.57
3625809.32 0.93001
488058.49 3625678.06 0.79011 488057.00
3625618.40 0.71834
488107.71 3625596.02 0.68812 488185.27
3625576.63 0.66297
488228.53 3625528.90 0.60981 488233.01
3625482.66 0.57121

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***

INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 , L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 , L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487526.96	3626464.52	7.22470	487546.96	3626464.52	7.56036
487566.96	3626464.52	7.93670	487586.96	3626464.52	8.41286
487606.96	3626464.52	8.85689	487506.96	3626484.52	6.81809
487526.96	3626484.52	7.20145	487546.96	3626484.52	7.39742
487566.96	3626484.52	7.78373	487586.96	3626484.52	8.25349
487606.96	3626484.52	8.69141	487626.96	3626484.52	9.24019
487646.96	3626484.52	9.85477	487486.96	3626504.52	6.30228
487506.96	3626504.52	6.66742	487526.96	3626504.52	7.04587
487546.96	3626504.52	7.22719	487566.96	3626504.52	7.61119
487586.96	3626504.52	8.07437	487606.96	3626504.52	8.52237
487626.96	3626504.52	9.07287	487646.96	3626504.52	9.69046
487666.96	3626504.52	10.37103	487686.96	3626504.52	11.05902
487706.96	3626504.52	11.82111	487466.96	3626524.52	5.83460
487486.96	3626524.52	6.15163	487506.96	3626524.52	6.50128
487526.96	3626524.52	6.87977	487546.96		

3626524.52 7.06675
487566.96 3626524.52 7.44730 487586.96
3626524.52 7.90214
487606.96 3626524.52 8.39691 487626.96
3626524.52 8.90494
487646.96 3626524.52 9.51466 487666.96
3626524.52 10.18454
487686.96 3626524.52 10.88515 487706.96
3626524.52 11.72134
487726.96 3626524.52 12.64895 487746.96
3626524.52 13.76664
487766.96 3626524.52 14.96018 487446.96
3626544.52 5.45543
487466.96 3626544.52 5.71936 487486.96
3626544.52 6.01958
487506.96 3626544.52 6.34001 487526.96
3626544.52 6.66711
487546.96 3626544.52 7.05164 487566.96
3626544.52 7.30367
487586.96 3626544.52 7.75125 487606.96
3626544.52 8.28508
487626.96 3626544.52 8.78537 487646.96
3626544.52 9.34492
487666.96 3626544.52 10.00139 487686.96
3626544.52 10.70807
487706.96 3626544.52 11.56372 487726.96
3626544.52 12.49641
487746.96 3626544.52 13.54140 487766.96
3626544.52 14.72059
487786.96 3626544.52 16.06200 487806.96
3626544.52 17.70060
487826.96 3626544.52 19.27766 487426.96
3626564.52 5.12430
487446.96 3626564.52 5.33954 487466.96
3626564.52 5.60142
487486.96 3626564.52 5.88314 487506.96
3626564.52 6.18602
487526.96 3626564.52 6.52901 487546.96
3626564.52 6.81657
487566.96 3626564.52 7.16529 487586.96
3626564.52 7.60138
487606.96 3626564.52 8.26235 487626.96
3626564.52 8.60705
487646.96 3626564.52 9.18830 487666.96
3626564.52 9.81606
487686.96 3626564.52 10.53830 487706.96
3626564.52 11.34660
487726.96 3626564.52 12.25432 487746.96
3626564.52 13.27882
487766.96 3626564.52 14.43863 487786.96

3626564.52   15.83494
  *** AERMOD - VERSION 23132 ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton Parkway Bridge Project EIR\ ***   12/21/23
 *** AERMET - VERSION 22112 ***   ***
                       ***   14:45:58

                                  PAGE 54
 *** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

                              *** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
                                  INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
                 L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
                 L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
                 L0000022   , L0000023   , L0000024   ,

                                             ***   DISCRETE CARTESIAN RECEPTOR POINTS   ***

                                        **   CONC OF PM_10   IN MICROGRAMS/M**3   **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487806.96	3626564.52	17.35686	487826.96	3626564.52	19.08866
487846.96	3626564.52	21.07800	487866.96	3626564.52	23.38215
487426.96	3626584.52	5.01708	487446.96	3626584.52	5.24790
487466.96	3626584.52	5.50421	487486.96	3626584.52	5.74823
487506.96	3626584.52	6.04285	487526.96	3626584.52	6.38068
487546.96	3626584.52	6.65858	487566.96	3626584.52	7.04478
487586.96	3626584.52	7.46523	487606.96	3626584.52	8.04432
487626.96	3626584.52	8.44244	487646.96	3626584.52	9.01005
487666.96	3626584.52	9.63940	487686.96	3626584.52	10.34285
487706.96	3626584.52	11.12414	487726.96	3626584.52	12.02093
487746.96	3626584.52	13.02570	487766.96		

3626584.52 14.16840
487786.96 3626584.52 15.46652 487806.96
3626584.52 16.95721
487826.96 3626584.52 18.67468 487846.96
3626584.52 20.65932
487866.96 3626584.52 22.96084 487886.96
3626584.52 25.64887
487906.96 3626584.52 28.80249 487426.96
3626604.52 4.89812
487446.96 3626604.52 5.13034 487466.96
3626604.52 5.37943
487486.96 3626604.52 5.62524 487506.96
3626604.52 5.91311
487526.96 3626604.52 6.23109 487546.96
3626604.52 6.56522
487566.96 3626604.52 6.94047 487586.96
3626604.52 7.36333
487606.96 3626604.52 7.80236 487626.96
3626604.52 8.29500
487646.96 3626604.52 8.84110 487666.96
3626604.52 9.44902
487686.96 3626604.52 10.13026 487706.96
3626604.52 10.90045
487726.96 3626604.52 11.75367 487746.96
3626604.52 12.72177
487766.96 3626604.52 13.82821 487786.96
3626604.52 15.10072
487806.96 3626604.52 16.52312 487826.96
3626604.52 18.25569
487846.96 3626604.52 20.14831 487866.96
3626604.52 22.43174
487886.96 3626604.52 25.13100 487906.96
3626604.52 28.33750
487926.96 3626604.52 32.14442 487406.96
3626624.52 4.58255
487426.96 3626624.52 4.78892 487446.96
3626624.52 5.01424
487466.96 3626624.52 5.25453 487486.96
3626624.52 5.51458
487506.96 3626624.52 5.78578 487526.96
3626624.52 6.09426
487546.96 3626624.52 6.46388 487566.96
3626624.52 6.85237
487586.96 3626624.52 7.28391 487606.96
3626624.52 7.72093
487626.96 3626624.52 8.17323 487646.96
3626624.52 8.69176
487666.96 3626624.52 9.27606 487686.96
3626624.52 9.93433
487706.96 3626624.52 10.67161 487726.96

3626624.52 11.49819
487746.96 3626624.52 12.43424 487766.96
3626624.52 13.49899
487786.96 3626624.52 14.71358 487806.96
3626624.52 16.36511
487826.96 3626624.52 18.06393 487846.96
3626624.52 20.03412
487866.96 3626624.52 21.85983 487886.96
3626624.52 24.52404

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487906.96	3626624.52	27.74969	487926.96	3626624.52	31.59167
487946.96	3626624.52	36.18722	487406.96	3626644.52	4.47946
487426.96	3626644.52	4.68178	487446.96	3626644.52	4.89939
487466.96	3626644.52	5.13493	487486.96	3626644.52	5.38951
487506.96	3626644.52	5.66516	487526.96	3626644.52	5.96237
487546.96	3626644.52	6.36064	487566.96	3626644.52	6.79830
487586.96	3626644.52	7.21485	487606.96		

3626644.52 7.63848
487626.96 3626644.52 8.10641 487646.96
3626644.52 8.57275
487666.96 3626644.52 9.12558 487686.96
3626644.52 9.75818
487706.96 3626644.52 10.44117 487726.96
3626644.52 11.24125
487746.96 3626644.52 12.17909 487766.96
3626644.52 13.20373
487786.96 3626644.52 14.41291 487806.96
3626644.52 15.79288
487826.96 3626644.52 17.30465 487846.96
3626644.52 19.27796
487866.96 3626644.52 21.28080 487886.96
3626644.52 23.84011
487906.96 3626644.52 27.07521 487926.96
3626644.52 30.91611
487946.96 3626644.52 35.50360 487966.96
3626644.52 41.39047
487386.96 3626664.52 4.19520 487406.96
3626664.52 4.37872
487426.96 3626664.52 4.57575 487446.96
3626664.52 4.78703
487466.96 3626664.52 5.01793 487486.96
3626664.52 5.26680
487506.96 3626664.52 5.54115 487526.96
3626664.52 5.86310
487546.96 3626664.52 6.22821 487566.96
3626664.52 6.59105
487586.96 3626664.52 7.04346 487606.96
3626664.52 7.48732
487626.96 3626664.52 7.99865 487646.96
3626664.52 8.46036
487666.96 3626664.52 8.99189 487686.96
3626664.52 9.55971
487706.96 3626664.52 10.21578 487726.96
3626664.52 11.02595
487746.96 3626664.52 11.85863 487766.96
3626664.52 12.74403
487786.96 3626664.52 13.85384 487806.96
3626664.52 15.16136
487826.96 3626664.52 16.66045 487846.96
3626664.52 18.44232
487866.96 3626664.52 20.68004 487886.96
3626664.52 23.16538
487906.96 3626664.52 26.23491 487926.96
3626664.52 29.85924
487946.96 3626664.52 34.70616 487966.96
3626664.52 40.61418
487986.96 3626664.52 47.98436 487386.96

3626684.52 4.09814
487406.96 3626684.52 4.27619 487426.96
3626684.52 4.46868
487446.96 3626684.52 4.67778 487466.96
3626684.52 4.90227
487486.96 3626684.52 5.14826 487506.96
3626684.52 5.42562
487526.96 3626684.52 5.75934 487546.96
3626684.52 6.06739
487566.96 3626684.52 6.40227 487586.96
3626684.52 6.78290
487606.96 3626684.52 7.26025 487626.96
3626684.52 7.83095
487646.96 3626684.52 8.33659 487666.96
3626684.52 8.86515
487686.96 3626684.52 9.34846 487706.96
3626684.52 9.98777

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC X-COORD (M) Y-COORD (M) CONC
- -
487726.96 3626684.52 10.72925 487746.96
3626684.52 11.43719
487766.96 3626684.52 12.30099 487786.96
3626684.52 13.39850
487806.96 3626684.52 14.65932 487826.96

3626684.52 16.08904
487846.96 3626684.52 17.75119 487866.96
3626684.52 19.71792
487886.96 3626684.52 22.01553 487906.96
3626684.52 24.90134
487926.96 3626684.52 28.74585 487946.96
3626684.52 33.60426
487966.96 3626684.52 39.34589 487986.96
3626684.52 46.82149
488006.96 3626684.52 55.96397 487366.96
3626704.52 3.83912
487386.96 3626704.52 3.99813 487406.96
3626704.52 4.16682
487426.96 3626704.52 4.35246 487446.96
3626704.52 4.57114
487466.96 3626704.52 4.79152 487486.96
3626704.52 5.03919
487506.96 3626704.52 5.31466 487526.96
3626704.52 5.61991
487546.96 3626704.52 5.94624 487566.96
3626704.52 6.27760
487586.96 3626704.52 6.62588 487606.96
3626704.52 7.01144
487626.96 3626704.52 7.52900 487646.96
3626704.52 8.15084
487666.96 3626704.52 8.73878 487686.96
3626704.52 9.19389
487706.96 3626704.52 9.78676 487726.96
3626704.52 10.34597
487746.96 3626704.52 11.06103 487766.96
3626704.52 11.92666
487786.96 3626704.52 12.99293 487806.96
3626704.52 14.23510
487826.96 3626704.52 15.59515 487846.96
3626704.52 17.13218
487866.96 3626704.52 18.92337 487886.96
3626704.52 21.11636
487906.96 3626704.52 23.98471 487926.96
3626704.52 27.54778
487946.96 3626704.52 31.80205 487966.96
3626704.52 38.04539
487986.96 3626704.52 44.98633 488006.96
3626704.52 54.02384
488026.96 3626704.52 66.46987 487386.96
3626724.52 3.89882
487406.96 3626724.52 4.07175 487426.96
3626724.52 4.26027
487446.96 3626724.52 4.46250 487466.96
3626724.52 4.67650
487486.96 3626724.52 4.91035 487506.96

3626724.52   5.17051
487526.96   3626724.52   5.46794   487546.96
3626724.52   5.77453
487566.96   3626724.52   6.11836   487586.96
3626724.52   6.48945
487606.96   3626724.52   6.92738   487626.96
3626724.52   7.34606
487646.96   3626724.52   7.88721   487666.96
3626724.52   8.41931
487686.96   3626724.52   8.97453   487706.96
3626724.52   9.57666
487726.96   3626724.52   10.07296   487746.96
3626724.52   10.76739
487766.96   3626724.52   11.61628   487786.96
3626724.52   12.60368
487806.96   3626724.52   13.68167   487826.96
3626724.52   15.09519
487846.96   3626724.52   16.70700   487866.96
3626724.52   18.38159
487886.96   3626724.52   20.41945   487906.96
3626724.52   23.32670
487926.96   3626724.52   26.71022   487946.96
3626724.52   31.24298
487966.96   3626724.52   36.72285   487986.96
3626724.52   43.36357

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)   Y-COORD (M)   CONC   X-COORD (M)

Y-COORD (M)   CONC
 -
488006.96   3626724.52   52.02068   488026.96
3626724.52   63.78357
488046.96   3626724.52   80.60500   487406.96
3626744.52   3.97630
487426.96   3626744.52   4.17187   487446.96
3626744.52   4.35556
487466.96   3626744.52   4.56204   487486.96
3626744.52   4.78908
487506.96   3626744.52   5.04480   487526.96
3626744.52   5.33908
487546.96   3626744.52   5.62038   487566.96
3626744.52   5.93917
487586.96   3626744.52   6.35141   487606.96
3626744.52   6.81127
487626.96   3626744.52   7.20291   487646.96
3626744.52   7.66023
487666.96   3626744.52   8.16428   487686.96
3626744.52   8.71703
487706.96   3626744.52   9.32149   487726.96
3626744.52   9.85759
487746.96   3626744.52   10.53134   487766.96
3626744.52   11.33823
487786.96   3626744.52   12.17692   487806.96
3626744.52   13.15209
487826.96   3626744.52   14.59976   487846.96
3626744.52   16.21707
487866.96   3626744.52   17.91660   487886.96
3626744.52   19.86704
487906.96   3626744.52   22.64829   487926.96
3626744.52   26.07745
487946.96   3626744.52   30.54507   487966.96
3626744.52   35.32925
487986.96   3626744.52   41.48984   488006.96
3626744.52   49.51294
488026.96   3626744.52   60.31286   488046.96
3626744.52   75.48848
488066.96   3626744.52   98.69442   487446.96
3626764.52   4.25259
487466.96   3626764.52   4.44727   487486.96
3626764.52   4.68722
487506.96   3626764.52   4.95793   487526.96
3626764.52   5.22676
487546.96   3626764.52   5.48337   487566.96
3626764.52   5.80143
487586.96   3626764.52   6.16941   487606.96
3626764.52   6.60571
487626.96   3626764.52   7.04422   487646.96

3626764.52   7.47399
         487666.96   3626764.52   7.94325   487686.96
3626764.52   8.48033
         487706.96   3626764.52   9.11846   487726.96
3626764.52   9.72629
         487746.96   3626764.52   10.37316   487766.96
3626764.52   11.08328
         487786.96   3626764.52   11.80050   487806.96
3626764.52   12.82080
         487826.96   3626764.52   13.99027   487846.96
3626764.52   15.56934
         487866.96   3626764.52   17.47772   487886.96
3626764.52   19.44665
         487906.96   3626764.52   22.00934   487926.96
3626764.52   25.01642
         487946.96   3626764.52   29.25310   487966.96
3626764.52   33.01908
         487986.96   3626764.52   37.91098   488006.96
3626764.52   44.79554
         488026.96   3626764.52   55.79428   488046.96
3626764.52   69.92600
         488066.96   3626764.52   89.29516   488086.96
3626764.52   120.46093
         487466.96   3626784.52   4.37868   487486.96
3626784.52   4.61628
         487506.96   3626784.52   4.85351   487526.96
3626784.52   5.08692
         487546.96   3626784.52   5.36670   487566.96
3626784.52   5.67737
         487586.96   3626784.52   6.01524   487606.96
3626784.52   6.37554
         487626.96   3626784.52   6.75735   487646.96
3626784.52   7.20276

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002
, L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010
, L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018
, L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487666.96	3626784.52	7.73517	487686.96	3626784.52	8.24841
487706.96	3626784.52	8.80020	487726.96	3626784.52	9.47740
487746.96	3626784.52	10.16492	487766.96	3626784.52	10.86876
487786.96	3626784.52	11.52666	487806.96	3626784.52	12.51908
487826.96	3626784.52	13.64854	487846.96	3626784.52	14.98340
487866.96	3626784.52	16.75481	487886.96	3626784.52	18.81428
487906.96	3626784.52	21.14407	487926.96	3626784.52	23.92139
487946.96	3626784.52	27.12911	487966.96	3626784.52	31.03725
487986.96	3626784.52	35.82331	488006.96	3626784.52	41.99440
488026.96	3626784.52	50.12608	488046.96	3626784.52	62.72292
487506.96	3626804.52	4.75717	487526.96	3626804.52	4.96773
487546.96	3626804.52	5.25534	487566.96	3626804.52	5.55292
487586.96	3626804.52	5.87160	487606.96	3626804.52	6.21623
487626.96	3626804.52	6.54828	487646.96	3626804.52	6.99860
487666.96	3626804.52	7.48613	487686.96	3626804.52	7.97555
487706.96	3626804.52	8.45933	487726.96	3626804.52	9.12936
487746.96	3626804.52	9.89824	487766.96	3626804.52	10.52695
487786.96	3626804.52	11.29178	487806.96	3626804.52	12.23416
487826.96	3626804.52	13.33132	487846.96	3626804.52	14.55562
487866.96	3626804.52	15.93966	487886.96		

3626804.52 18.08393
487906.96 3626804.52 20.30917 487926.96
3626804.52 22.81555
487946.96 3626804.52 25.69661 487966.96
3626804.52 29.22397
487986.96 3626804.52 33.65390 487526.96
3626824.52 4.90055
487546.96 3626824.52 5.14084 487566.96
3626824.52 5.41778
487586.96 3626824.52 5.74336 487606.96
3626824.52 6.11897
487626.96 3626824.52 6.44787 487646.96
3626824.52 6.86667
487666.96 3626824.52 7.32526 487686.96
3626824.52 7.80342
487706.96 3626824.52 8.31887 487726.96
3626824.52 8.82045
487746.96 3626824.52 9.42247 487766.96
3626824.52 10.16596
487786.96 3626824.52 11.08629 487806.96
3626824.52 11.96080
487826.96 3626824.52 12.98008 487846.96
3626824.52 14.14347
487866.96 3626824.52 15.45893 487886.96
3626824.52 17.03823
487546.96 3626844.52 5.05105 487566.96
3626844.52 5.33354
487586.96 3626844.52 5.64710 487606.96
3626844.52 5.99815
487626.96 3626844.52 6.33635 487646.96
3626844.52 6.73923
487666.96 3626844.52 7.16039 487686.96
3626844.52 7.60009
487706.96 3626844.52 8.12359 487726.96
3626844.52 8.63043
487746.96 3626844.52 9.23913 487766.96
3626844.52 9.96076
487786.96 3626844.52 10.78161 487806.96
3626844.52 11.65076
487826.96 3626844.52 12.63714 487846.96
3626844.52 13.75491

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION

VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
487546.96	3626864.52	4.95866	487566.96	3626864.52	5.25315
487586.96	3626864.52	5.55717	487606.96	3626864.52	5.87648
487626.96	3626864.52	6.20835	487646.96	3626864.52	6.60264
487666.96	3626864.52	7.00335	487686.96	3626864.52	7.41640
487706.96	3626864.52	7.93712	487726.96	3626864.52	8.47114
487746.96	3626864.52	9.08934	487766.96	3626864.52	9.77172
487786.96	3626864.52	10.46380	487806.96	3626864.52	11.33113
487566.96	3626884.52	5.13513	487586.96	3626884.52	5.45618
487606.96	3626884.52	5.76316	487626.96	3626884.52	6.03621
487646.96	3626884.52	6.43846	487666.96	3626884.52	6.86379
487686.96	3626884.52	7.29288	487706.96	3626884.52	7.81113
487726.96	3626884.52	8.31405	487746.96	3626884.52	8.87923
487766.96	3626884.52	9.50229	487786.96	3626884.52	10.16485
487586.96	3626904.52	5.35228	487606.96	3626904.52	5.66669
487626.96	3626904.52	5.93242	487646.96	3626904.52	6.29131
487666.96	3626904.52	6.68442	487686.96		

3626904.52 7.10704
487706.96 3626904.52 7.61158 487726.96
3626904.52 8.10404
487746.96 3626904.52 8.65576 487766.96
3626904.52 9.26419
487626.96 3626924.52 5.85015 487646.96
3626924.52 6.16066
487666.96 3626924.52 6.51280 487686.96
3626924.52 6.91812
487706.96 3626924.52 7.39415 487726.96
3626924.52 7.87674
487746.96 3626924.52 8.42678 487646.96
3626944.52 6.06607
487666.96 3626944.52 6.42325 487686.96
3626944.52 6.80638
487706.96 3626944.52 7.20211 487726.96
3626944.52 7.65654
487666.96 3626964.52 6.30688 487686.96
3626964.52 6.67123
487706.96 3626964.52 7.04306 487686.96
3626984.52 6.52295
488242.19 3625436.42 1.08372 488262.19
3625436.42 1.07059
488242.19 3625456.42 1.11241 488262.19
3625456.42 1.09874
488282.19 3625456.42 1.08551 488302.19
3625456.42 1.07397
488322.19 3625456.42 1.06595 488242.19
3625476.42 1.14236
488262.19 3625476.42 1.12812 488282.19
3625476.42 1.11451
488302.19 3625476.42 1.10276 488322.19
3625476.42 1.09471
488342.19 3625476.42 1.09006 488362.19
3625476.42 1.08784
488242.19 3625496.42 1.17365 488262.19
3625496.42 1.15885
488282.19 3625496.42 1.14484 488302.19
3625496.42 1.13318
488322.19 3625496.42 1.12516 488342.19
3625496.42 1.12054
488362.19 3625496.42 1.11825 488382.19
3625496.42 1.11686
488402.19 3625496.42 1.11531 488422.19
3625496.42 1.11298
488242.19 3625516.42 1.20633 488262.19
3625516.42 1.19095
488282.19 3625516.42 1.17642 488302.19
3625516.42 1.16466

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488322.19	3625516.42	1.15667	488342.19	3625516.42	1.15210
488362.19	3625516.42	1.14979	488382.19	3625516.42	1.14827
488402.19	3625516.42	1.14647	488422.19	3625516.42	1.14393
488442.19	3625516.42	1.14065	488462.19	3625516.42	1.13700
488482.19	3625516.42	1.13366	488222.19	3625536.42	1.25557
488242.19	3625536.42	1.24053	488262.19	3625536.42	1.22457
488282.19	3625536.42	1.20944	488302.19	3625536.42	1.19747
488322.19	3625536.42	1.18953	488342.19	3625536.42	1.18504
488362.19	3625536.42	1.18270	488382.19	3625536.42	1.18107
488402.19	3625536.42	1.17901	488422.19	3625536.42	1.17625
488442.19	3625536.42	1.17281	488462.19	3625536.42	1.16906
488482.19	3625536.42	1.16585	488502.19		

3625536.42 1.16421
488522.19 3625536.42 1.16564 488542.19
3625536.42 1.17118
488222.19 3625556.42 1.29169 488242.19
3625556.42 1.27643
488262.19 3625556.42 1.25986 488282.19
3625556.42 1.24428
488302.19 3625556.42 1.23228 488322.19
3625556.42 1.22435
488342.19 3625556.42 1.21993 488362.19
3625556.42 1.21763
488382.19 3625556.42 1.21605 488402.19
3625556.42 1.21375
488422.19 3625556.42 1.21058 488442.19
3625556.42 1.20676
488462.19 3625556.42 1.20285 488482.19
3625556.42 1.19998
488502.19 3625556.42 1.19929 488522.19
3625556.42 1.20211
488542.19 3625556.42 1.20916 488562.19
3625556.42 1.21989
488202.19 3625576.42 1.34148 488222.19
3625576.42 1.32967
488242.19 3625576.42 1.31403 488262.19
3625576.42 1.29686
488282.19 3625576.42 1.28095 488302.19
3625576.42 1.26879
488322.19 3625576.42 1.26092 488342.19
3625576.42 1.25666
488362.19 3625576.42 1.25443 488382.19
3625576.42 1.25265
488402.19 3625576.42 1.24993 488422.19
3625576.42 1.24634
488442.19 3625576.42 1.24228 488462.19
3625576.42 1.23849
488482.19 3625576.42 1.23615 488502.19
3625576.42 1.23644
488522.19 3625576.42 1.24068 488542.19
3625576.42 1.24930
488562.19 3625576.42 1.26139 488582.19
3625576.42 1.27461
488122.19 3625596.42 1.38963 488142.19
3625596.42 1.38916
488162.19 3625596.42 1.38960 488182.19
3625596.42 1.38794
488202.19 3625596.42 1.38162 488222.19
3625596.42 1.36972
488242.19 3625596.42 1.35347 488262.19
3625596.42 1.33572
488282.19 3625596.42 1.31956 488302.19

3625596.42   1.30712
         488322.19   3625596.42   1.29934   488342.19
3625596.42   1.29534
         488362.19   3625596.42   1.29320   488382.19
3625596.42   1.29099
         488402.19   3625596.42   1.28771   488422.19
3625596.42   1.28372

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488522.19	3625596.42	1.28157	488542.19	3625596.42	1.29178
488562.19	3625596.42	1.30516	488582.19	3625596.42	1.31889
488602.19	3625596.42	1.33076	488062.19	3625616.42	1.45483
488082.19	3625616.42	1.44559	488102.19	3625616.42	1.43785
488122.19	3625616.42	1.43371	488142.19	3625616.42	1.43282
488162.19	3625616.42	1.43302	488182.19	3625616.42	1.43112
488202.19	3625616.42	1.42440	488222.19	3625616.42	1.41196
488242.19	3625616.42	1.39511	488262.19		

3625616.42 1.37680
488282.19 3625616.42 1.36024 488302.19
3625616.42 1.34769
488322.19 3625616.42 1.33986 488342.19
3625616.42 1.33583
488362.19 3625616.42 1.33355 488382.19
3625616.42 1.33100
488402.19 3625616.42 1.32920 488522.19
3625616.42 1.32515
488542.19 3625616.42 1.33703 488562.19
3625616.42 1.35125
488582.19 3625616.42 1.36514 488602.19
3625616.42 1.37661
488062.19 3625636.42 1.50269 488082.19
3625636.42 1.49311
488102.19 3625636.42 1.48488 488122.19
3625636.42 1.48010
488142.19 3625636.42 1.47880 488162.19
3625636.42 1.47878
488182.19 3625636.42 1.47672 488202.19
3625636.42 1.46965
488222.19 3625636.42 1.45659 488242.19
3625636.42 1.43905
488262.19 3625636.42 1.42007 488282.19
3625636.42 1.40301
488302.19 3625636.42 1.39033 488322.19
3625636.42 1.38254
488342.19 3625636.42 1.37848 488362.19
3625636.42 1.37597
488382.19 3625636.42 1.37302 488522.19
3625636.42 1.37161
488542.19 3625636.42 1.38505 488562.19
3625636.42 1.39989
488582.19 3625636.42 1.41368 488602.19
3625636.42 1.42464
488622.19 3625636.42 1.43285 488062.19
3625656.42 1.55330
488082.19 3625656.42 1.54318 488102.19
3625656.42 1.53440
488122.19 3625656.42 1.52897 488142.19
3625656.42 1.52725
488162.19 3625656.42 1.52708 488182.19
3625656.42 1.52493
488202.19 3625656.42 1.51756 488222.19
3625656.42 1.50380
488242.19 3625656.42 1.48546 488262.19
3625656.42 1.46570
488282.19 3625656.42 1.44803 488302.19
3625656.42 1.43516
488322.19 3625656.42 1.42755 488342.19

3625656.42   1.42347
         488362.19   3625656.42   1.42061   488382.19
3625656.42   1.41721
         488522.19   3625656.42   1.42114   488542.19
3625656.42   1.43596
         488582.19   3625656.42   1.46462   488602.19
3625656.42   1.47506
         488622.19   3625656.42   1.48292   488642.19
3625656.42   1.48938
         488062.19   3625676.42   1.60528   488082.19
3625676.42   1.59604
         488102.19   3625676.42   1.58698   488122.19
3625676.42   1.58099
         488142.19   3625676.42   1.57877   488162.19
3625676.42   1.57834

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S):   L0000001   , L0000002 , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010 , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018 , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)   Y-COORD (M)   CONC   X-COORD (M) Y-COORD (M)   CONC
- -
         488182.19   3625676.42   1.57592   488202.19
3625676.42   1.56803
         488222.19   3625676.42   1.55357   488242.19
3625676.42   1.53421
         488262.19   3625676.42   1.51358   488282.19
3625676.42   1.49552
         488302.19   3625676.42   1.48246   488322.19

3625676.42 1.47490
488342.19 3625676.42 1.47074 488362.19
3625676.42 1.46747
488382.19 3625676.42 1.46333 488582.19
3625676.42 1.51818
488602.19 3625676.42 1.52809 488622.19
3625676.42 1.53587
488642.19 3625676.42 1.54266 488062.19
3625696.42 1.66024
488082.19 3625696.42 1.65211 488102.19
3625696.42 1.64289
488122.19 3625696.42 1.63627 488142.19
3625696.42 1.63331
488162.19 3625696.42 1.63247 488182.19
3625696.42 1.62977
488202.19 3625696.42 1.62138 488222.19
3625696.42 1.60618
488242.19 3625696.42 1.58580 488262.19
3625696.42 1.56430
488282.19 3625696.42 1.54579 488302.19
3625696.42 1.53253
488322.19 3625696.42 1.52488 488342.19
3625696.42 1.52052
488362.19 3625696.42 1.51685 488382.19
3625696.42 1.51229
488582.19 3625696.42 1.57461 488602.19
3625696.42 1.58397
488622.19 3625696.42 1.59182 488642.19
3625696.42 1.59917
488662.19 3625696.42 1.60783 488042.19
3625716.42 1.71928
488142.19 3625716.42 1.69110 488162.19
3625716.42 1.68965
488182.19 3625716.42 1.68665 488202.19
3625716.42 1.67789
488222.19 3625716.42 1.66190 488242.19
3625716.42 1.64053
488262.19 3625716.42 1.61816 488282.19
3625716.42 1.59913
488302.19 3625716.42 1.58567 488322.19
3625716.42 1.57774
488342.19 3625716.42 1.57298 488362.19
3625716.42 1.56892
488382.19 3625716.42 1.56451 488602.19
3625716.42 1.64301
488622.19 3625716.42 1.65112 488642.19
3625716.42 1.65922
488662.19 3625716.42 1.66980 488682.19
3625716.42 1.68377
488022.19 3625736.42 1.76584 488042.19

3625736.42   1.78044
        488182.19   3625736.42   1.74683   488202.19
3625736.42   1.73746
        488222.19   3625736.42   1.72059   488242.19
3625736.42   1.69813
        488262.19   3625736.42   1.67475   488282.19
3625736.42   1.65512
        488302.19   3625736.42   1.64147   488322.19
3625736.42   1.63367
        488362.19   3625736.42   1.62574   488382.19
3625736.42   1.61951
        488402.19   3625736.42   1.61381   488602.19
3625736.42   1.70577
        488622.19   3625736.42   1.71449   488642.19
3625736.42   1.72405
        488662.19   3625736.42   1.73691   488682.19
3625736.42   1.75357
        488702.19   3625736.42   1.77268   488002.19
3625756.42   1.79755
        488022.19   3625756.42   1.82493   488182.19
3625756.42   1.81066
        488202.19   3625756.42   1.80062   488222.19
3625756.42   1.78286

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)   Y-COORD (M)   CONC   X-COORD (M)   Y-COORD (M)   CONC
- -

- -
488242.19 3625756.42 1.75921 488262.19
3625756.42 1.73478
488282.19 3625756.42 1.71455 488382.19
3625756.42 1.67803
488602.19 3625756.42 1.77265 488622.19
3625756.42 1.78239
488642.19 3625756.42 1.79410 488662.19
3625756.42 1.80962
488682.19 3625756.42 1.82873 488702.19
3625756.42 1.84875
487982.19 3625776.42 1.82353 488002.19
3625776.42 1.85753
488222.19 3625776.42 1.84917 488242.19
3625776.42 1.82430
488262.19 3625776.42 1.79876 488622.19
3625776.42 1.85546
488642.19 3625776.42 1.87007 488662.19
3625776.42 1.88834
488682.19 3625776.42 1.90917 488702.19
3625776.42 1.92853
488722.19 3625776.42 1.94151 487982.19
3625796.42 1.88515
488222.19 3625796.42 1.91964 488242.19
3625796.42 1.89338
488262.19 3625796.42 1.86680 488622.19
3625796.42 1.93652
488642.19 3625796.42 1.95249 488662.19
3625796.42 1.97320
488682.19 3625796.42 1.99444 488702.19
3625796.42 2.01112
488722.19 3625796.42 2.01851 488742.19
3625796.42 2.01371
488222.19 3625816.42 1.99469 488242.19
3625816.42 1.96692
488262.19 3625816.42 1.93947 488642.19
3625816.42 2.04162
488662.19 3625816.42 2.06393 488682.19
3625816.42 2.08376
488702.19 3625816.42 2.09547 488722.19
3625816.42 2.09518
488742.19 3625816.42 2.08109 488762.19
3625816.42 2.05395
488202.19 3625836.42 2.09833 488222.19
3625836.42 2.07487
488242.19 3625836.42 2.04546 488662.19
3625836.42 2.15985
488682.19 3625836.42 2.17600 488702.19
3625836.42 2.18042
488722.19 3625836.42 2.17042 488742.19

3625836.42   2.14600
488762.19   3625836.42   2.10916   488782.19
3625836.42   2.06353
488202.19   3625856.42   2.18538   488222.19
3625856.42   2.16011
488242.19   3625856.42   2.13093   488682.19
3625856.42   2.26963
488702.19   3625856.42   2.26456   488722.19
3625856.42   2.24349
488742.19   3625856.42   2.20816   488762.19
3625856.42   2.16205
488782.19   3625856.42   2.10982   488802.19
3625856.42   2.05635
488822.19   3625856.42   2.00582   488202.19
3625876.42   2.27763
488222.19   3625876.42   2.25105   488662.19
3625876.42   2.36276
488682.19   3625876.42   2.36329   488702.19
3625876.42   2.34673
488722.19   3625876.42   2.31372   488742.19
3625876.42   2.26767
488762.19   3625876.42   2.21353   488782.19
3625876.42   2.15670
488802.19   3625876.42   2.10217   488822.19
3625876.42   2.05338
488842.19   3625876.42   2.01229   488202.19
3625896.42   2.37541
488222.19   3625896.42   2.34819   488642.19
3625896.42   2.46071
488662.19   3625896.42   2.46727   488682.19
3625896.42   2.45577

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002
, L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010
, L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018
, L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS

***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488702.19	3625896.42	2.42595	488722.19	3625896.42	2.38089
488742.19	3625896.42	2.32531	488762.19	3625896.42	2.26522
488782.19	3625896.42	2.20633	488802.19	3625896.42	2.15304
488822.19	3625896.42	2.10790	488842.19	3625896.42	2.07143
488862.19	3625896.42	2.04289	488882.19	3625896.42	2.02046
488902.19	3625896.42	2.00187	488202.19	3625916.42	2.48162
488222.19	3625916.42	2.45266	488642.19	3625916.42	2.57659
488662.19	3625916.42	2.57120	488682.19	3625916.42	2.54562
488702.19	3625916.42	2.50209	488762.19	3625916.42	2.31971
488782.19	3625916.42	2.26094	488802.19	3625916.42	2.21112
488822.19	3625916.42	2.17083	488842.19	3625916.42	2.13917
488862.19	3625916.42	2.11429	488882.19	3625916.42	2.09372
488902.19	3625916.42	2.07505	488922.19	3625916.42	2.05618
488942.19	3625916.42	2.03555	488222.19	3625936.42	2.56541
488622.19	3625936.42	2.69192	488642.19	3625936.42	2.69339
488662.19	3625936.42	2.67303	488682.19	3625936.42	2.63221
488782.19	3625936.42	2.32302	488802.19	3625936.42	2.27818
488822.19	3625936.42	2.24307	488842.19	3625936.42	2.21551
488862.19	3625936.42	2.19282	488882.19	3625936.42	2.17229
488902.19	3625936.42	2.15165	488922.19	3625936.42	2.12925
488942.19	3625936.42	2.10437	488962.19		

3625936.42 2.07695
488982.19 3625936.42 2.04743 489002.19
3625936.42 2.01716
488602.19 3625956.42 2.81376 488622.19
3625956.42 2.82248
488642.19 3625956.42 2.80882 488662.19
3625956.42 2.77182
488782.19 3625956.42 2.39498 488802.19
3625956.42 2.35553
488822.19 3625956.42 2.32480 488842.19
3625956.42 2.29964
488862.19 3625956.42 2.27709 488882.19
3625956.42 2.25459
488902.19 3625956.42 2.23028 488922.19
3625956.42 2.20337
488942.19 3625956.42 2.17384 488962.19
3625956.42 2.14225
488982.19 3625956.42 2.10953 489002.19
3625956.42 2.07695
489022.19 3625956.42 2.04542 489042.19
3625956.42 2.01589
489062.19 3625956.42 1.98914 489082.19
3625956.42 1.96552
488622.19 3625976.42 2.95383 488802.19
3625976.42 2.44320
488822.19 3625976.42 2.41529 488842.19
3625976.42 2.39060
488862.19 3625976.42 2.36606 488882.19
3625976.42 2.33965
488902.19 3625976.42 2.31052 488922.19
3625976.42 2.27842
488942.19 3625976.42 2.24430 488962.19
3625976.42 2.20923
488982.19 3625976.42 2.17439 489002.19
3625976.42 2.14104
489022.19 3625976.42 2.11007 489042.19
3625976.42 2.08227
489062.19 3625976.42 2.05815 489082.19
3625976.42 2.03789

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002

, L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010
, L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018
, L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
489102.19	3625976.42	2.02158	489122.19	3625976.42	2.00895
488802.19	3625996.42	2.54059	488822.19	3625996.42	2.51317
488842.19	3625996.42	2.48673	488922.19	3625996.42	2.35512
488942.19	3625996.42	2.31713	488962.19	3625996.42	2.27979
488982.19	3625996.42	2.24439	489002.19	3625996.42	2.21201
489022.19	3625996.42	2.18330	489042.19	3625996.42	2.15864
489062.19	3625996.42	2.13811	489082.19	3625996.42	2.12181
489102.19	3625996.42	2.10929	489122.19	3625996.42	2.10000
489142.19	3625996.42	2.09321	488802.19	3626016.42	2.64648
488822.19	3626016.42	2.61665	488842.19	3626016.42	2.58597
488982.19	3626016.42	2.32316	489002.19	3626016.42	2.29346
489022.19	3626016.42	2.26824	489042.19	3626016.42	2.24754
489062.19	3626016.42	2.23116	489082.19	3626016.42	2.21880
489102.19	3626016.42	2.20931	489122.19	3626016.42	2.20220
489142.19	3626016.42	2.19656	488782.19	3626036.42	2.79207
488802.19	3626036.42	2.75877	488822.19	3626036.42	2.72405
488842.19	3626036.42	2.68750	489042.19		

3626036.42   2.35045
         489062.19   3626036.42   2.33769   489082.19
3626036.42   2.32822
         489102.19   3626036.42   2.32043   489122.19
3626036.42   2.31363
         489142.19   3626036.42   2.30694   488782.19
3626056.42   2.91436
         488802.19   3626056.42   2.87561   488822.19
3626056.42   2.83434
         488842.19   3626056.42   2.79138   489042.19
3626056.42   2.46782
         489062.19   3626056.42   2.45714   489082.19
3626056.42   2.44867
         489102.19   3626056.42   2.44057   489122.19
3626056.42   2.43178
         489142.19   3626056.42   2.42158   489162.19
3626056.42   2.40988
         488782.19   3626076.42   3.04404   488802.19
3626076.42   2.99603
         488822.19   3626076.42   2.94781   488842.19
3626076.42   2.89873
         488862.19   3626076.42   2.85090   489062.19
3626076.42   2.58788
         489082.19   3626076.42   2.57774   489102.19
3626076.42   2.56684
         489122.19   3626076.42   2.55383   489142.19
3626076.42   2.53821
         489162.19   3626076.42   2.52050   488782.19
3626096.42   3.17681
         488802.19   3626096.42   3.12054   488822.19
3626096.42   3.06652
         488842.19   3626096.42   3.01353   488862.19
3626096.42   2.96375
         489062.19   3626096.42   2.72673   489082.19
3626096.42   2.71215
         489102.19   3626096.42   2.69570   489122.19
3626096.42   2.67628
         489142.19   3626096.42   2.65361   489162.19
3626096.42   2.62811
         488782.19   3626116.42   3.31166   488802.19
3626116.42   3.25175
         488822.19   3626116.42   3.19453   488842.19
3626116.42   3.14099
         488862.19   3626116.42   3.09342   489062.19
3626116.42   2.86995
         489082.19   3626116.42   2.84830   489102.19
3626116.42   2.82371
*** AERMOD - VERSION 23132 ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton Parkway Bridge Project EIR\ ***   12/21/23
*** AERMET - VERSION 22112 ***   ***

*** 14:45:58

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*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***

INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 , L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 , L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
489122.19	3626116.42	2.79602	489142.19	3626116.42	2.76503
489162.19	3626116.42	2.73023	489182.19	3626116.42	2.69298
488782.19	3626136.42	3.45614	488802.19	3626136.42	3.39417
488822.19	3626136.42	3.33789	488842.19	3626136.42	3.28735
488862.19	3626136.42	3.24448	489082.19	3626136.42	2.98305
489102.19	3626136.42	2.94831	489122.19	3626136.42	2.91059
489142.19	3626136.42	2.86972	489162.19	3626136.42	2.82492
489182.19	3626136.42	2.77813	488782.19	3626156.42	3.61570
488802.19	3626156.42	3.55517	488822.19	3626156.42	3.50350
488842.19	3626156.42	3.45845	488862.19	3626156.42	3.42139
488882.19	3626156.42	3.39168	489102.19	3626156.42	3.06610
489122.19	3626156.42	3.01667	489142.19	3626156.42	2.96484
489162.19	3626156.42	2.90971	489182.19		

3626156.42 2.85302
488782.19 3626176.42 3.79865 488802.19
3626176.42 3.74280
488822.19 3626176.42 3.69762 488842.19
3626176.42 3.65815
488862.19 3626176.42 3.62560 488882.19
3626176.42 3.59860
489122.19 3626176.42 3.11125 489142.19
3626176.42 3.04780
489162.19 3626176.42 2.98258 489182.19
3626176.42 2.91603
488782.19 3626196.42 4.01299 488802.19
3626196.42 3.96307
488822.19 3626196.42 3.92355 488842.19
3626196.42 3.88706
488862.19 3626196.42 3.85466 488882.19
3626196.42 3.82492
488902.19 3626196.42 3.79442 489142.19
3626196.42 3.11708
489162.19 3626196.42 3.04153 489182.19
3626196.42 2.96570
489202.19 3626196.42 2.88993 488782.19
3626216.42 4.26424
488802.19 3626216.42 4.21837 488822.19
3626216.42 4.17999
488842.19 3626216.42 4.14144 488862.19
3626216.42 4.10353
488882.19 3626216.42 4.06512 488902.19
3626216.42 4.02371
489142.19 3626216.42 3.17105 489162.19
3626216.42 3.08567
489182.19 3626216.42 3.00116 489202.19
3626216.42 2.91744
489222.19 3626216.42 2.83458 489242.19
3626216.42 2.75261
489262.19 3626216.42 2.67248 488782.19
3626236.42 4.55318
488802.19 3626236.42 4.50660 488822.19
3626236.42 4.46161
488842.19 3626236.42 4.41508 488862.19
3626236.42 4.36586
488882.19 3626236.42 4.31263 488902.19
3626236.42 4.25419
489142.19 3626236.42 3.20855 489162.19
3626236.42 3.11428
489182.19 3626236.42 3.02172 489202.19
3626236.42 2.93040
489222.19 3626236.42 2.84053 489242.19
3626236.42 2.75246
489262.19 3626236.42 2.66763 488782.19

3626256.42   4.87450
        488802.19   3626256.42   4.82134   488822.19
3626256.42   4.76246
        488842.19   3626256.42   4.69827   488862.19
3626256.42   4.62913

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002 , L0000003   , L0000004 ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010 , L0000011   , L0000012 ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018 , L0000019   , L0000020 ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)	Y-COORD (M)	CONC
488882.19	3626256.42	4.55523	488902.19	3626256.42	4.47521
488922.19	3626256.42	4.38797	489142.19	3626256.42	3.22893
489162.19	3626256.42	3.12920	489222.19	3626256.42	2.83238
489242.19	3626256.42	2.73906	489262.19	3626256.42	2.64973
488882.19	3626276.42	4.78201	488902.19	3626276.42	4.67574
488922.19	3626276.42	4.56408	489142.19	3626276.42	3.23187
489162.19	3626276.42	3.12956	489242.19	3626276.42	2.71384
489262.19	3626276.42	2.62070	488882.19	3626296.42	4.98186
488902.19	3626296.42	4.84536	489262.19		

3626296.42 2.58373
489282.19 3626296.42 2.49343 488902.19
3626316.42 4.97710
489282.19 3626316.42 2.44962 489302.19
3626316.42 2.36418
488902.19 3626336.42 5.06696 488922.19
3626336.42 4.87738
489302.19 3626336.42 2.31703 489322.19
3626336.42 2.23680
488922.19 3626356.42 4.90280 488942.19
3626356.42 4.70096
489322.19 3626356.42 2.19006 488942.19
3626376.42 4.67332
488962.19 3626376.42 4.46454 489322.19
3626376.42 2.14285
489342.19 3626376.42 2.07310 488962.19
3626396.42 4.39782
489322.19 3626396.42 2.09660 489342.19
3626396.42 2.02732
489342.19 3626416.42 1.98682 489342.19
3626436.42 1.95027
488086.20 3626768.13 31.83489 488077.21
3626746.82 33.17494
488075.79 3626778.08 29.14022 488002.86
3626694.73 28.50951
487535.35 3626865.62 4.77978 487693.75
3626992.77 6.58788
487795.04 3626883.94 10.49825 487871.55
3626830.06 15.65534
487958.83 3626811.74 27.15871 488041.80
3626794.50 54.86386
488094.61 3626765.41 136.76779 488046.12
3626714.76 81.94906
488007.32 3626665.19 58.07612 487941.59
3626599.46 35.31469
487911.42 3626574.68 29.72928 487815.52
3626540.19 18.32934
487709.91 3626504.63 11.94891 487555.82
3626439.98 7.82359
487490.09 3626487.39 6.49658 487428.67
3626556.36 5.15896
487358.63 3626713.68 3.72751 487522.42
3626827.90 4.83816
488235.45 3625424.52 1.07124 488562.08
3625540.85 1.18902
488747.03 3625794.41 2.00395 488857.40
3625879.42 1.99540
489054.28 3625949.52 1.97798 489134.82
3625964.44 1.95230
489178.07 3626085.25 2.54973 489203.43

3626198.60 2.88887
489260.10 3626203.08 2.67695 489276.51
3626217.99 2.61647
489267.56 3626265.72 2.61348 489336.17
3626346.26 2.16490
489361.53 3626432.77 1.89989 489331.70
3626449.18 1.96254
489309.32 3626361.18 2.23168 489258.61
3626298.53 2.59636
489190.00 3626228.43 2.98082 489149.73
3626317.92 3.14903
489130.34 3626250.81 3.28736 489137.80
3626216.50 3.19015

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE PERIOD (26304 HRS) AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC X-COORD (M) Y-COORD (M) CONC
- -
489054.28 3626106.13 2.80268 489036.38
3626036.03 2.35272
488921.53 3625997.25 2.35982 488846.96
3625983.83 2.41977
488872.31 3626110.61 3.03176 488902.14
3626194.13 3.76867
488931.97 3626270.20 4.45829 488908.77
3626298.76 4.81826
488936.81 3626348.34 4.75515 488971.36

```
3626378.01        4.37019
         488968.11    3626409.72        4.29062                       488903.08
3626355.25        5.10437
         488864.87    3626256.49        4.62049                       488763.27
3626259.34        4.98095
         488787.87    3625962.95        2.40912                       488735.67
3625906.27        2.37353
         488620.82    3625988.31        3.03346                       488588.00
3625956.98        2.80228
         488671.53    3625861.52        2.29119                       488629.77
3625813.79        2.01861
         488588.00    3625746.67        1.73303                       488571.59
3625648.23        1.43655
         488516.41    3625666.13        1.44387                       488522.37
3625581.11        1.25010
         488431.39    3625576.63        1.24488                       488447.79
3625615.41        1.31738
         488388.13    3625616.90        1.33150                       488398.57
3625706.40        1.53392
         488406.03    3625745.18        1.63801                       488392.60
3625776.50        1.73762
         488350.84    3625722.81        1.58890                       488279.24
3625769.05        1.75673
         488282.23    3625807.83        1.88654                       488246.43
3625851.08        2.10100
         488230.02    3625946.54        2.61202                       488188.26
3625924.17        2.54068
         488213.62    3625757.11        1.79362                       488170.36
3625779.49        1.89355
         488170.36    3625733.25        1.73981                       488077.88
3625697.45        1.65709
         487973.47    3625822.74        1.95663                       487955.57
3625809.32        1.88192
         488058.49    3625678.06        1.61099                       488057.00
3625618.40        1.46161
         488107.71    3625596.02        1.39107                       488185.27
3625576.63        1.34732
         488228.53    3625528.90        1.23745                       488233.01
3625482.66        1.15827
```


```
                              *** THE   1ST HIGHEST  1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP:  PASS      ***
                                  INCLUDING SOURCE(S):     L0000001    , L0000002
```

, L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010
, L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
487526.96	3626464.52	60.29338	(19021102)	487546.96	3626464.52	61.63857	(19021102)
487566.96	3626464.52	62.37402	(19021102)	487586.96	3626464.52	63.81547	(19021102)
487606.96	3626464.52	63.83958	(19021102)	487506.96	3626484.52	62.52737	(19040823)
487526.96	3626484.52	63.49831	(19040823)	487546.96	3626484.52	63.50391	(19040823)
487566.96	3626484.52	63.82835	(19040823)	487586.96	3626484.52	64.20692	(19040823)
487606.96	3626484.52	62.96053	(19021102)	487626.96	3626484.52	64.44791	(19021102)
487646.96	3626484.52	66.09525	(19021102)	487486.96	3626504.52	61.09226	(19040823)
487506.96	3626504.52	63.38474	(19040823)	487526.96	3626504.52	65.05669	(19040823)
487546.96	3626504.52	63.91483	(19040823)	487566.96	3626504.52	64.57318	(19040823)
487586.96	3626504.52	65.86046	(19040823)	487606.96	3626504.52	65.08102	(19040823)
487626.96	3626504.52	65.72755	(19040823)	487646.96	3626504.52	66.96504	(19040823)
487666.96	3626504.52	67.97377	(19040823)	487686.96	3626504.52	68.58728	(19021102)
487706.96	3626504.52	68.63086	(19021102)	487466.96	3626524.52	56.12717	(19040823)
487486.96	3626524.52	58.59330	(19040823)	487506.96	3626524.52	61.75103	(19040823)
487526.96	3626524.52	63.83137	(19040823)	487546.96	3626524.52	61.61476	(19040823)
487566.96	3626524.52	62.49591	(19040823)	487586.96	3626524.52	64.58067	(19040823)
487606.96	3626524.52	66.19071	(19040823)	487626.96	3626524.52	66.36080	(19040823)
487646.96	3626524.52	68.51721	(19040823)	487666.96	3626524.52	70.06532	(19040823)

487686.96   3626524.52   69.77710 (19040823)   487706.96
3626524.52   71.20270 (19040823)
487726.96   3626524.52   73.64310 (19040823)   487746.96
3626524.52   79.86014 (19040823)
487766.96   3626524.52   83.76142 (19021102)   487446.96
3626544.52   56.63638 (19022001)
487466.96   3626544.52   56.66054 (19041421)   487486.96
3626544.52   58.18336 (19041421)
487506.96   3626544.52   59.21916 (19041421)   487526.96
3626544.52   58.12995 (19040823)
487546.96   3626544.52   60.57560 (19040823)   487566.96
3626544.52   58.74838 (19040823)
487586.96   3626544.52   61.60243 (19040823)   487606.96
3626544.52   66.27240 (19040823)
487626.96   3626544.52   67.30781 (19040823)   487646.96
3626544.52   67.92952 (19040823)
487666.96   3626544.52   69.93591 (19040823)   487686.96
3626544.52   70.38937 (19040823)
487706.96   3626544.52   75.41709 (19040823)   487726.96
3626544.52   79.47869 (19040823)
487746.96   3626544.52   83.15458 (19040823)   487766.96
3626544.52   87.06761 (19040823)
487786.96   3626544.52   92.00008 (19040823)   487806.96
3626544.52   97.78458 (19040823)
487826.96   3626544.52   99.65192 (19040823)   487426.96
3626564.52   58.33188 (19022001)
487446.96   3626564.52   58.48732 (19022001)   487466.96
3626564.52   59.06719 (19022001)
487486.96   3626564.52   59.40251 (19022001)   487506.96
3626564.52   59.32983 (19022001)
487526.96   3626564.52   58.11706 (19022001)   487546.96
3626564.52   55.57163 (19022001)
487566.96   3626564.52   54.01967 (19022001)   487586.96
3626564.52   56.47082 (19022001)
487606.96   3626564.52   65.20387 (19040823)   487626.96
3626564.52   62.48509 (19040823)
487646.96   3626564.52   65.38781 (19040823)   487666.96
3626564.52   67.06673 (19040823)
487686.96   3626564.52   70.30596 (19040823)   487706.96
3626564.52   73.77510 (19040823)
487726.96   3626564.52   78.06771 (19040823)   487746.96
3626564.52   81.95518 (19040823)
487766.96   3626564.52   85.99235 (19040823)   487786.96
3626564.52   93.74043 (19040823)

```
 *** MODELOPTs:    CONC  ELEV   FLGPOL  URBAN  SigA Data

                              *** THE   1ST HIGHEST  1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP:  PASS      ***
                                 INCLUDING SOURCE(S):     L0000001    , L0000002
, L0000003    , L0000004   ,   L0000005    ,
                 L0000006    , L0000007    , L0000008    , L0000009    , L0000010
, L0000011    , L0000012   ,

                                                 ***   DISCRETE CARTESIAN RECEPTOR POINTS
***

                                            **   CONC OF PM_10    IN MICROGRAMS/M**3
                    **

      X-COORD (M)  Y-COORD (M)        CONC      (YYMMDDHH)              X-COORD (M)
Y-COORD (M)        CONC      (YYMMDDHH)
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - - - -
        487806.96   3626564.52       98.74829  (19040823)                487826.96
3626564.52      102.98559  (19040823)
        487846.96   3626564.52      107.59746  (19040823)                487866.96
3626564.52      113.62710  (19040823)
        487426.96   3626584.52       62.78425  (21012122)                487446.96
3626584.52       62.77376  (21012122)
        487466.96   3626584.52       63.36755  (21012122)                487486.96
3626584.52       62.62571  (21012122)
        487506.96   3626584.52       62.27960  (21012122)                487526.96
3626584.52       64.50704  (21012122)
        487546.96   3626584.52       56.48593  (21012122)                487566.96
3626584.52       55.92010  (19050803)
        487586.96   3626584.52       59.00222  (21012122)                487606.96
3626584.52       65.44758  (21012122)
        487626.96   3626584.52       61.25320  (21012122)                487646.96
3626584.52       62.89512  (19050803)
        487666.96   3626584.52       65.97578  (21012122)                487686.96
3626584.52       68.54632  (21012122)
        487706.96   3626584.52       69.17740  (19040823)                487726.96
3626584.52       75.12694  (19040823)
        487746.96   3626584.52       79.43942  (19040823)                487766.96
3626584.52       83.70313  (19040823)
        487786.96   3626584.52       89.09516  (19040823)                487806.96
3626584.52       94.39537  (19040823)
        487826.96   3626584.52       99.81036  (19040823)                487846.96
3626584.52      105.84191  (19040823)
        487866.96   3626584.52      112.75509  (19040823)                487886.96
3626584.52      119.34228  (19040823)
        487906.96   3626584.52      124.96915  (19040823)                487426.96
3626604.52       65.59337  (21012122)
        487446.96   3626604.52       66.68483  (21012122)                487466.96
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3626604.52       67.54545  (21012122)
        487486.96   3626604.52       67.08917  (21012122)                487506.96
3626604.52       66.74762  (21012122)
        487526.96   3626604.52       67.74055  (21012122)                487546.96
3626604.52       61.21974  (21012122)
        487566.96   3626604.52       57.72263  (19050803)                487586.96
3626604.52       57.11944  (19020205)
        487606.96   3626604.52       61.47523  (19050803)                487626.96
3626604.52       64.67550  (19050803)
        487646.96   3626604.52       67.85112  (19050803)                487666.96
3626604.52       70.95327  (21012122)
        487686.96   3626604.52       73.52960  (21012122)                487706.96
3626604.52       74.90377  (19050803)
        487726.96   3626604.52       79.09032  (21012122)                487746.96
3626604.52       83.02857  (21012122)
        487766.96   3626604.52       86.25170  (21012122)                487786.96
3626604.52       88.63807  (21012122)
        487806.96   3626604.52       96.93847  (21012122)                487826.96
3626604.52      102.92444  (21012122)
        487846.96   3626604.52      106.57332  (21012122)                487866.96
3626604.52      111.76401  (21012122)
        487886.96   3626604.52      116.47194  (21012122)                487906.96
3626604.52      120.82306  (21012122)
        487926.96   3626604.52      127.23444  (19040823)                487406.96
3626624.52       65.89245  (21012122)
        487426.96   3626624.52       66.30840  (21012122)                487446.96
3626624.52       67.69331  (21012122)
        487466.96   3626624.52       68.15747  (21012122)                487486.96
3626624.52       68.45823  (21012122)
        487506.96   3626624.52       68.31991  (21012122)                487526.96
3626624.52       68.49591  (21012122)
        487546.96   3626624.52       62.58188  (21012122)                487566.96
3626624.52       57.93490  (19020205)
        487586.96   3626624.52       57.01594  (19020205)                487606.96
3626624.52       59.39655  (19020205)
        487626.96   3626624.52       64.59530  (19020205)                487646.96
3626624.52       68.67970  (19020205)
        487666.96   3626624.52       72.03476  (19020205)                487686.96
3626624.52       74.88162  (19020205)
        487706.96   3626624.52       77.87609  (19020205)                487726.96
3626624.52       81.28711  (19020205)
        487746.96   3626624.52       84.80783  (19020205)                487766.96
3626624.52       88.54209  (19020205)
        487786.96   3626624.52       92.74538  (19020205)                487806.96
3626624.52      103.84080  (21012122)
        487826.96   3626624.52      109.65642  (21012122)                487846.96
3626624.52      113.37089  (21012122)
        487866.96   3626624.52      113.18776  (21012122)                487886.96
3626624.52      118.50628  (21012122)
```

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002 , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010 , L0000011   , L0000012   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
487906.96	3626624.52	122.57514	(19050803)	487926.96	3626624.52	129.05762	(19050803)
487946.96	3626624.52	138.59302	(21012122)	487406.96	3626644.52	65.66360	(20101601)
487426.96	3626644.52	66.97981	(20101601)	487446.96	3626644.52	67.79832	(20101601)
487466.96	3626644.52	67.17349	(20101601)	487486.96	3626644.52	68.03933	(20101601)
487506.96	3626644.52	69.28702	(20101601)	487526.96	3626644.52	68.36938	(20101601)
487546.96	3626644.52	61.04934	(21102401)	487566.96	3626644.52	56.73023	(21102401)
487586.96	3626644.52	57.02483	(21102401)	487606.96	3626644.52	59.76681	(21102401)
487626.96	3626644.52	62.52590	(21102401)	487646.96	3626644.52	68.56960	(21102401)
487666.96	3626644.52	72.91935	(21102401)	487686.96	3626644.52	76.29562	(21102401)
487706.96	3626644.52	81.39020	(21102401)	487726.96	3626644.52	84.84261	(21102401)
487746.96	3626644.52	86.51262	(21102401)	487766.96	3626644.52	90.58416	(21102401)
487786.96	3626644.52	100.22577	(21102401)	487806.96	3626644.52	104.66729	(21102401)
487826.96	3626644.52	110.93770	(20101601)	487846.96	3626644.52	114.55539	(21102401)

487866.96 3626644.52 115.37469 (21102401) 487886.96
3626644.52 121.77551 (21102401)
487906.96 3626644.52 127.13099 (21112423) 487926.96
3626644.52 134.69163 (21112423)
487946.96 3626644.52 144.99260 (21112423) 487966.96
3626644.52 153.57675 (21112423)
487386.96 3626664.52 64.09764 (20101601) 487406.96
3626664.52 64.75301 (20101601)
487426.96 3626664.52 65.50725 (20101601) 487446.96
3626664.52 66.59543 (20101601)
487466.96 3626664.52 66.75726 (20101601) 487486.96
3626664.52 67.28888 (20101601)
487506.96 3626664.52 67.66352 (21102401) 487526.96
3626664.52 65.74284 (21102401)
487546.96 3626664.52 65.57961 (21102401) 487566.96
3626664.52 65.88620 (21102401)
487586.96 3626664.52 63.24483 (21102401) 487606.96
3626664.52 64.00960 (21112423)
487626.96 3626664.52 64.58866 (21112423) 487646.96
3626664.52 69.49807 (21112423)
487666.96 3626664.52 74.32187 (21112423) 487686.96
3626664.52 79.71863 (21112423)
487706.96 3626664.52 84.54994 (21102401) 487726.96
3626664.52 87.34844 (21112423)
487746.96 3626664.52 92.94314 (21112423) 487766.96
3626664.52 99.70913 (21112423)
487786.96 3626664.52 104.87513 (21112423) 487806.96
3626664.52 109.61887 (21112423)
487826.96 3626664.52 115.01812 (21112423) 487846.96
3626664.52 120.32013 (21112423)
487866.96 3626664.52 125.12040 (21112423) 487886.96
3626664.52 131.98173 (21112423)
487906.96 3626664.52 138.51874 (21112423) 487926.96
3626664.52 143.71013 (21112423)
487946.96 3626664.52 148.90403 (21112423) 487966.96
3626664.52 155.08162 (21112423)
487986.96 3626664.52 165.47275 (21112423) 487386.96
3626684.52 63.64644 (20013121)
487406.96 3626684.52 64.47025 (20013121) 487426.96
3626684.52 65.02229 (20013121)
487446.96 3626684.52 65.96702 (19110823) 487466.96
3626684.52 67.12822 (19110823)
487486.96 3626684.52 68.07317 (19110823) 487506.96
3626684.52 68.15513 (19110823)
487526.96 3626684.52 67.02000 (21112423) 487546.96
3626684.52 69.26177 (21112423)
487566.96 3626684.52 71.64414 (21112423) 487586.96
3626684.52 73.35477 (21112423)
487606.96 3626684.52 73.32127 (21112423) 487626.96
3626684.52 71.99155 (21112423)

487646.96 3626684.52 74.39341 (21112423) 487666.96
3626684.52 78.38239 (21112423)
487686.96 3626684.52 85.44703 (21112423) 487706.96
3626684.52 89.88342 (21112423)

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002
, L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010
, L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS
***

** CONC OF PM_10 IN MICROGRAMS/M**3
**

X-COORD (M) Y-COORD (M) CONC (YYMMDDHH) X-COORD (M)
Y-COORD (M) CONC (YYMMDDHH)
- -
- -
487726.96 3626684.52 93.92448 (21112423) 487746.96
3626684.52 100.59833 (21112423)
487766.96 3626684.52 106.42562 (21112423) 487786.96
3626684.52 110.18101 (21112423)
487806.96 3626684.52 114.20897 (21112423) 487826.96
3626684.52 118.97502 (21112423)
487846.96 3626684.52 124.12125 (21112423) 487866.96
3626684.52 129.52142 (21112423)
487886.96 3626684.52 135.63328 (21112423) 487906.96
3626684.52 141.52572 (21112423)
487926.96 3626684.52 146.75807 (21112423) 487946.96
3626684.52 147.06475 (21112423)
487966.96 3626684.52 154.87415 (21112423) 487986.96
3626684.52 159.85963 (21112423)
488006.96 3626684.52 178.36297 (21020701) 487366.96
3626704.52 64.52288 (20012319)
487386.96 3626704.52 65.90538 (20012319) 487406.96
3626704.52 67.48610 (20012319)
487426.96 3626704.52 68.58734 (20012319) 487446.96
3626704.52 68.22090 (21112423)
487466.96 3626704.52 69.68541 (21112423) 487486.96

3626704.52 70.70242 (21112423)
487506.96 3626704.52 71.36297 (21112423) 487526.96
3626704.52 72.22910 (21112423)
487546.96 3626704.52 72.86710 (21112423) 487566.96
3626704.52 74.77769 (21112423)
487586.96 3626704.52 77.39921 (21112423) 487606.96
3626704.52 79.91818 (21112423)
487626.96 3626704.52 80.06090 (21112423) 487646.96
3626704.52 77.58077 (21112423)
487666.96 3626704.52 78.33127 (21112423) 487686.96
3626704.52 85.54885 (21112423)
487706.96 3626704.52 90.47193 (21112423) 487726.96
3626704.52 97.33214 (21112423)
487746.96 3626704.52 102.77430 (21112423) 487766.96
3626704.52 107.03546 (21112423)
487786.96 3626704.52 110.20245 (21112423) 487806.96
3626704.52 113.32086 (21112423)
487826.96 3626704.52 117.87763 (21112423) 487846.96
3626704.52 123.37825 (21112423)
487866.96 3626704.52 129.36843 (21112423) 487886.96
3626704.52 135.29400 (21112423)
487906.96 3626704.52 140.12416 (21112423) 487926.96
3626704.52 146.02952 (21112423)
487946.96 3626704.52 152.83764 (21112423) 487966.96
3626704.52 152.82780 (21020701)
487986.96 3626704.52 166.82589 (21020701) 488006.96
3626704.52 188.45079 (21101502)
488026.96 3626704.52 211.81699 (21101502) 487386.96
3626724.52 66.84907 (20012319)
487406.96 3626724.52 67.79975 (21112423) 487426.96
3626724.52 68.98073 (21112423)
487446.96 3626724.52 70.14740 (21112423) 487466.96
3626724.52 71.44914 (21112423)
487486.96 3626724.52 72.65814 (21112423) 487506.96
3626724.52 73.58480 (21112423)
487526.96 3626724.52 73.87543 (21112423) 487546.96
3626724.52 74.86682 (21112423)
487566.96 3626724.52 75.90178 (21112423) 487586.96
3626724.52 76.78451 (21112423)
487606.96 3626724.52 76.51948 (21112423) 487626.96
3626724.52 78.61489 (21112423)
487646.96 3626724.52 79.31208 (21112423) 487666.96
3626724.52 80.90070 (21112423)
487686.96 3626724.52 83.89267 (21112423) 487706.96
3626724.52 87.53934 (21112423)
487726.96 3626724.52 94.25579 (21112423) 487746.96
3626724.52 98.88421 (21112423)
487766.96 3626724.52 102.46476 (21112423) 487786.96
3626724.52 105.95864 (21112423)
487806.96 3626724.52 110.48842 (21112423) 487826.96

3626724.52   113.20810 (21112423)
        487846.96   3626724.52   116.67329 (21112423)   487866.96
3626724.52   125.16942 (21120107)
        487886.96   3626724.52   133.96222 (21120107)   487906.96
3626724.52   137.72231 (21020701)
        487926.96   3626724.52   144.80635 (21020701)   487946.96
3626724.52   151.21990 (21020701)
        487966.96   3626724.52   162.82500 (21101502)   487986.96
3626724.52   177.76726 (21101502)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488006.96	3626724.52	194.46534	(21101502)	488026.96	3626724.52	222.87358	(19121406)
488046.96	3626724.52	258.88029	(19121406)	487406.96	3626744.52	67.00896	(21112423)
487426.96	3626744.52	67.60405	(21112423)	487446.96	3626744.52	68.94219	(21112423)
487466.96	3626744.52	70.04443	(21112423)	487486.96	3626744.52	71.02035	(21112423)
487506.96	3626744.52	71.64448	(21112423)	487526.96	3626744.52	71.60456	(21112423)
487546.96	3626744.52	72.93596	(21112423)	487566.96	3626744.52	73.87074	(21112423)
487586.96	3626744.52	72.77494	(21112423)	487606.96	3626744.52	71.39906	(21112423)
487626.96	3626744.52	73.56233	(21112423)	487646.96	3626744.52	75.02663	(21112423)

487666.96   3626744.52   76.60540 (21112423)   487686.96
3626744.52   78.44319 (21112423)
487706.96   3626744.52   80.66096 (21112423)   487726.96
3626744.52   86.44527 (19040206)
487746.96   3626744.52   94.09584 (21120107)   487766.96
3626744.52   100.75382 (21120107)
487786.96   3626744.52   108.02277 (21120107)   487806.96
3626744.52   116.02562 (21120107)
487826.96   3626744.52   118.34650 (21120107)   487846.96
3626744.52   121.67732 (21020701)
487866.96   3626744.52   130.22766 (21020701)   487886.96
3626744.52   139.62466 (21020701)
487906.96   3626744.52   142.46139 (21020701)   487926.96
3626744.52   149.38052 (21101502)
487946.96   3626744.52   157.13530 (21101502)   487966.96
3626744.52   168.54778 (21101502)
487986.96   3626744.52   183.05832 (19121406)   488006.96
3626744.52   208.17139 (19121406)
488026.96   3626744.52   233.15920 (19121406)   488046.96
3626744.52   277.45324 (19120405)
488066.96   3626744.52   333.62691 (19120405)   487446.96
3626764.52   67.37543 (19091906)
487466.96   3626764.52   68.77733 (19091906)   487486.96
3626764.52   68.68849 (19091906)
487506.96   3626764.52   67.72788 (19091906)   487526.96
3626764.52   67.97926 (19091906)
487546.96   3626764.52   70.09113 (19091906)   487566.96
3626764.52   70.22608 (19091906)
487586.96   3626764.52   69.26796 (19091906)   487606.96
3626764.52   69.59681 (19040206)
487626.96   3626764.52   70.43519 (19040206)   487646.96
3626764.52   72.97600 (19040206)
487666.96   3626764.52   77.37233 (21120107)   487686.96
3626764.52   81.20196 (21120107)
487706.96   3626764.52   83.21532 (21120107)   487726.96
3626764.52   89.42350 (21120107)
487746.96   3626764.52   96.86673 (21120107)   487766.96
3626764.52   104.66508 (21120107)
487786.96   3626764.52   112.89039 (21120107)   487806.96
3626764.52   119.56057 (21020701)
487826.96   3626764.52   126.53547 (21020701)   487846.96
3626764.52   131.11836 (21020701)
487866.96   3626764.52   131.66510 (21020701)   487886.96
3626764.52   139.62342 (21101502)
487906.96   3626764.52   147.68691 (21101502)   487926.96
3626764.52   155.82951 (21101502)
487946.96   3626764.52   159.41558 (21101502)   487966.96
3626764.52   181.78229 (19121406)
487986.96   3626764.52   205.26870 (19121406)   488006.96
3626764.52   227.74838 (19121406)

488026.96 3626764.52 256.35480 (19120405) 488046.96 3626764.52 284.38799 (19120405)
488066.96 3626764.52 366.50157 (19120716) 488086.96 3626764.52 515.94284 (19120716)
487466.96 3626784.52 65.76944 (19091906) 487486.96 3626784.52 65.11185 (19091906)
487506.96 3626784.52 65.28598 (19091906) 487526.96 3626784.52 67.10365 (19040206)
487546.96 3626784.52 68.56860 (21120107) 487566.96 3626784.52 71.40356 (21120107)
487586.96 3626784.52 74.16773 (21120107) 487606.96 3626784.52 77.16402 (21120107)
487626.96 3626784.52 80.57843 (21120107) 487646.96 3626784.52 82.81980 (21120107)

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
487666.96	3626784.52	84.62952	(21120107)	487686.96	3626784.52	87.68796	(21120107)
487706.96	3626784.52	91.32588	(21120107)	487726.96	3626784.52	94.90028	(21020701)
487746.96	3626784.52	100.83767	(21020701)	487766.96	3626784.52	108.57525	(21020701)
487786.96	3626784.52	117.44443	(21020701)	487806.96	3626784.52	122.43033	(21020701)
487826.96	3626784.52	127.29092	(21020701)	487846.96	3626784.52	131.65457	(21101502)
487866.96	3626784.52	139.21342	(21101502)	487886.96			

3626784.52 144.65482 (21101502)
487906.96 3626784.52 150.41978 (21101502) 487926.96
3626784.52 159.43409 (19121406)
487946.96 3626784.52 178.10102 (19121406) 487966.96
3626784.52 195.94688 (19121406)
487986.96 3626784.52 214.39533 (20010904) 488006.96
3626784.52 243.30556 (20010904)
488026.96 3626784.52 279.35869 (19120405) 488046.96
3626784.52 301.15326 (19013006)
487506.96 3626804.52 69.81143 (21120107) 487526.96
3626804.52 74.15072 (21120107)
487546.96 3626804.52 76.08935 (21120107) 487566.96
3626804.52 78.39631 (21120107)
487586.96 3626804.52 80.74094 (21120107) 487606.96
3626804.52 83.05466 (21120107)
487626.96 3626804.52 87.06901 (21120107) 487646.96
3626804.52 87.44076 (21120107)
487666.96 3626804.52 89.07252 (21020701) 487686.96
3626804.52 93.61912 (21020701)
487706.96 3626804.52 99.69984 (21020701) 487726.96
3626804.52 101.72846 (21020701)
487746.96 3626804.52 104.12058 (21020701) 487766.96
3626804.52 109.78207 (21020701)
487786.96 3626804.52 115.46948 (19050905) 487806.96
3626804.52 121.65433 (21101502)
487826.96 3626804.52 128.36813 (21101502) 487846.96
3626804.52 134.96425 (21101502)
487866.96 3626804.52 143.90279 (20122119) 487886.96
3626804.52 146.97290 (19121406)
487906.96 3626804.52 160.91507 (19121406) 487926.96
3626804.52 174.74272 (19121406)
487946.96 3626804.52 188.71337 (19121406) 487966.96
3626804.52 207.85747 (20010904)
487986.96 3626804.52 230.44217 (19120405) 487526.96
3626824.52 77.71536 (21120107)
487546.96 3626824.52 80.48866 (21120107) 487566.96
3626824.52 82.38582 (21120107)
487586.96 3626824.52 82.97197 (21120107) 487606.96
3626824.52 83.35682 (21020701)
487626.96 3626824.52 88.16790 (21020701) 487646.96
3626824.52 90.82724 (21020701)
487666.96 3626824.52 93.14733 (21020701) 487686.96
3626824.52 95.99918 (21020701)
487706.96 3626824.52 98.92914 (21020701) 487726.96
3626824.52 104.12932 (19050905)
487746.96 3626824.52 108.04169 (19050905) 487766.96
3626824.52 113.19102 (21101502)
487786.96 3626824.52 116.81880 (21101502) 487806.96
3626824.52 122.09151 (21101502)
487826.96 3626824.52 129.93716 (20122119) 487846.96

3626824.52   138.32701 (20122119)
        487866.96   3626824.52   149.55845 (19121406)   487886.96
3626824.52   163.75612 (19121406)
        487546.96   3626844.52   80.46659 (21020701)   487566.96
3626844.52   83.31692 (21020701)
        487586.96   3626844.52   85.57958 (21020701)   487606.96
3626844.52   87.05756 (21020701)
        487626.96   3626844.52   89.81995 (21020701)   487646.96
3626844.52   91.00077 (21020701)
        487666.96   3626844.52   92.99890 (19050905)   487686.96
3626844.52   95.75207 (19050905)
        487706.96   3626844.52   99.57443 (21101502)   487726.96
3626844.52   105.05152 (21101502)
        487746.96   3626844.52   109.21701 (21101502)   487766.96
3626844.52   113.02990 (21090905)
        487786.96   3626844.52   118.90475 (20122119)   487806.96
3626844.52   125.51172 (20122119)
        487826.96   3626844.52   133.85810 (19121406)   487846.96
3626844.52   146.52128 (19121406)

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

      X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M)
Y-COORD (M)   CONC   (YYMMDDHH)
 -
- -
        487546.96   3626864.52   83.96582 (21020701)   487566.96
3626864.52   84.71205 (21020701)
        487586.96   3626864.52   85.54295 (21020701)   487606.96
3626864.52   86.92035 (19050905)
        487626.96   3626864.52   88.80123 (19050905)   487646.96
3626864.52   89.74479 (21101502)

487666.96   3626864.52   93.85723 (21101502)   487686.96
3626864.52   97.99406 (21101502)
487706.96   3626864.52   100.57348 (21090905)   487726.96
3626864.52   104.91825 (21090905)
487746.96   3626864.52   110.56397 (20122119)   487766.96
3626864.52   115.35863 (20122119)
487786.96   3626864.52   122.16035 (19121406)   487806.96
3626864.52   132.87680 (19121406)
487566.96   3626884.52   84.71093 (19050905)   487586.96
3626884.52   83.84977 (19050905)
487606.96   3626884.52   85.76546 (21101502)   487626.96
3626884.52   90.13039 (21101502)
487646.96   3626884.52   92.34541 (21090905)   487666.96
3626884.52   95.07950 (21090905)
487686.96   3626884.52   98.49720 (20122119)   487706.96
3626884.52   102.27524 (20122119)
487726.96   3626884.52   107.38459 (20122119)   487746.96
3626884.52   111.13458 (19121406)
487766.96   3626884.52   121.68369 (19121406)   487786.96
3626884.52   131.54120 (19121406)
487586.96   3626904.52   84.44162 (21101502)   487606.96
3626904.52   87.55378 (21090905)
487626.96   3626904.52   93.12581 (21090905)   487646.96
3626904.52   95.27596 (21090905)
487666.96   3626904.52   99.60298 (20122119)   487686.96
3626904.52   103.11726 (20122119)
487706.96   3626904.52   103.76170 (20122119)   487726.96
3626904.52   111.93251 (19121406)
487746.96   3626904.52   120.05041 (19121406)   487766.96
3626904.52   126.42722 (19121406)
487626.96   3626924.52   94.40835 (20122119)   487646.96
3626924.52   98.68872 (20122119)
487666.96   3626924.52   101.35994 (20122119)   487686.96
3626924.52   105.48438 (19121406)
487706.96   3626924.52   112.30119 (19121406)   487726.96
3626924.52   118.27543 (19121406)
487746.96   3626924.52   121.61399 (19121406)   487646.96
3626944.52   97.51015 (19121406)
487666.96   3626944.52   104.64435 (19121406)   487686.96
3626944.52   110.48176 (19121406)
487706.96   3626944.52   115.11568 (19121406)   487726.96
3626944.52   116.97501 (19121406)
487666.96   3626964.52   106.90103 (19121406)   487686.96
3626964.52   109.01385 (19121406)
487706.96   3626964.52   114.86886 (19020306)   487686.96
3626984.52   111.58352 (19120404)
488242.19   3625436.42   58.75116 (19032623)   488262.19
3625436.42   59.62338 (19032623)
488242.19   3625456.42   60.19817 (19032623)   488262.19
3625456.42   60.63954 (19032623)

488282.19 3625456.42 54.98387 (20012720) 488302.19
3625456.42 55.98555 (21082704)
488322.19 3625456.42 57.65478 (21082704) 488242.19
3625476.42 61.68667 (19032623)
488262.19 3625476.42 61.66257 (19032623) 488282.19
3625476.42 56.27002 (19022722)
488302.19 3625476.42 57.75926 (21082704) 488322.19
3625476.42 58.50921 (21082704)
488342.19 3625476.42 57.56555 (21010519) 488362.19
3625476.42 64.64324 (19080704)
488242.19 3625496.42 63.21871 (19032623) 488262.19
3625496.42 62.68628 (19032623)
488282.19 3625496.42 57.83284 (19022722) 488302.19
3625496.42 59.49450 (21082704)
488322.19 3625496.42 59.23169 (21082704) 488342.19
3625496.42 58.29744 (21010519)
488362.19 3625496.42 67.18132 (19080704) 488382.19
3625496.42 67.64018 (19080704)
488402.19 3625496.42 59.77643 (20070402) 488422.19
3625496.42 60.73983 (20070402)
488242.19 3625516.42 64.79846 (19032623) 488262.19
3625516.42 63.71412 (19032623)
488282.19 3625516.42 59.42680 (19022722) 488302.19
3625516.42 61.25916 (21082704)

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC (YYMMDDHH) X-COORD (M) Y-COORD (M) CONC (YYMMDDHH)
- -
488322.19 3625516.42 60.22195 (21010519) 488342.19

3625516.42 59.47954 (19021120)
488362.19 3625516.42 69.60498 (19080704) 488382.19
3625516.42 68.04817 (19080704)
488402.19 3625516.42 62.09856 (20070402) 488422.19
3625516.42 61.16191 (20070402)
488442.19 3625516.42 59.49588 (20060224) 488462.19
3625516.42 60.31775 (20021420)
488482.19 3625516.42 61.46400 (21082705) 488222.19
3625536.42 60.88331 (20070303)
488242.19 3625536.42 66.42395 (19032623) 488262.19
3625536.42 64.74090 (19032623)
488282.19 3625536.42 61.04195 (19022722) 488302.19
3625536.42 63.02449 (21082704)
488322.19 3625536.42 61.98092 (21010519) 488342.19
3625536.42 62.56456 (19080704)
488362.19 3625536.42 71.86238 (19080704) 488382.19
3625536.42 68.11137 (19080704)
488402.19 3625536.42 64.19126 (20070402) 488422.19
3625536.42 61.18857 (20070402)
488442.19 3625536.42 61.70490 (20060224) 488462.19
3625536.42 62.67881 (20021420)
488482.19 3625536.42 64.19646 (21082705) 488502.19
3625536.42 65.55791 (21110719)
488522.19 3625536.42 68.56243 (19052822) 488542.19
3625536.42 67.35203 (19052822)
488222.19 3625556.42 62.40742 (20070303) 488242.19
3625556.42 68.09073 (19032623)
488262.19 3625556.42 65.75979 (19032623) 488282.19
3625556.42 62.64874 (19022722)
488302.19 3625556.42 64.70887 (21082704) 488322.19
3625556.42 63.64308 (21010519)
488342.19 3625556.42 66.07602 (19080704) 488362.19
3625556.42 73.84956 (19080704)
488382.19 3625556.42 67.74090 (19080704) 488402.19
3625556.42 65.91686 (20070402)
488422.19 3625556.42 62.50265 (21122219) 488442.19
3625556.42 63.45639 (20060224)
488462.19 3625556.42 64.53942 (20021420) 488482.19
3625556.42 66.25528 (21082705)
488502.19 3625556.42 67.74604 (21110719) 488522.19
3625556.42 71.14566 (19052822)
488542.19 3625556.42 66.09764 (19052822) 488562.19
3625556.42 63.86085 (20021320)
488202.19 3625576.42 63.39360 (20091504) 488222.19
3625576.42 63.96428 (20070303)
488242.19 3625576.42 69.80874 (19032623) 488262.19
3625576.42 66.77339 (19032623)
488282.19 3625576.42 64.25115 (19022722) 488302.19
3625576.42 66.35262 (21082704)
488322.19 3625576.42 65.22521 (21010519) 488342.19

3625576.42   69.56845 (19080704)
        488362.19   3625576.42   75.54408 (19080704)   488382.19
3625576.42   66.98039 (19080704)
        488402.19   3625576.42   67.31574 (20070402)   488422.19
3625576.42   63.80918 (21122219)
        488442.19   3625576.42   64.71605 (20060224)   488462.19
3625576.42   65.80761 (20021420)
        488482.19   3625576.42   67.51932 (21082705)   488502.19
3625576.42   69.10730 (21110719)
        488522.19   3625576.42   72.65311 (19052822)   488542.19
3625576.42   65.08254 (19032522)
        488562.19   3625576.42   65.52418 (20021320)   488582.19
3625576.42   66.05348 (19091303)
        488122.19   3625596.42   64.25284 (21102122)   488142.19
3625596.42   63.78170 (19082103)
        488162.19   3625596.42   64.89557 (19082103)   488182.19
3625596.42   65.06080 (20113019)
        488202.19   3625596.42   64.95862 (20091504)   488222.19
3625596.42   65.56432 (20070303)
        488242.19   3625596.42   71.57839 (19032623)   488262.19
3625596.42   67.77762 (19032623)
        488282.19   3625596.42   65.84441 (19022722)   488302.19
3625596.42   67.94112 (21082704)
        488322.19   3625596.42   66.71062 (21010519)   488342.19
3625596.42   73.00088 (19080704)
        488362.19   3625596.42   76.90114 (19080704)   488382.19
3625596.42   66.65626 (20070402)
        488402.19   3625596.42   68.32981 (20070402)   488422.19
3625596.42   64.79485 (20060224)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488522.19	3625596.42	72.92364	(19052822)	488542.19	3625596.42	65.81618	(20021320)
488562.19	3625596.42	66.13523	(19091303)	488582.19	3625596.42	66.58892	(19091303)
488602.19	3625596.42	66.44398	(20060721)	488062.19	3625616.42	62.97403	(20090823)
488082.19	3625616.42	64.55269	(20021323)	488102.19	3625616.42	64.63969	(21121021)
488122.19	3625616.42	65.79751	(21102122)	488142.19	3625616.42	64.96830	(19082103)
488162.19	3625616.42	66.51411	(19082103)	488182.19	3625616.42	66.65979	(20113019)
488202.19	3625616.42	66.53943	(20091504)	488222.19	3625616.42	67.21054	(20070303)
488242.19	3625616.42	73.37922	(19032623)	488262.19	3625616.42	68.75105	(19032623)
488282.19	3625616.42	67.42253	(19022722)	488302.19	3625616.42	69.42105	(21082704)
488322.19	3625616.42	68.06687	(21010519)	488342.19	3625616.42	76.35412	(19080704)
488362.19	3625616.42	77.93361	(19080704)	488382.19	3625616.42	69.56881	(20070402)
488402.19	3625616.42	68.65455	(20070402)	488522.19	3625616.42	71.83332	(19052822)
488542.19	3625616.42	68.88091	(20021320)	488562.19	3625616.42	69.34209	(19091303)
488582.19	3625616.42	68.85057	(20060721)	488602.19	3625616.42	65.73269	(20060721)
488062.19	3625636.42	64.11364	(20090823)	488082.19	3625636.42	65.85645	(20021323)
488102.19	3625636.42	65.99609	(21121021)	488122.19	3625636.42	67.35378	(21102122)
488142.19	3625636.42	66.34835	(19100421)	488162.19	3625636.42	68.18499	(19082103)
488182.19	3625636.42	68.31539	(20113019)	488202.19	3625636.42	68.16639	(20091504)
488222.19	3625636.42	68.89944	(20070303)	488242.19	3625636.42	75.21565	(19032623)
488262.19	3625636.42	69.70397	(19032623)	488282.19	3625636.42	68.98952	(19022722)
488302.19	3625636.42	70.82184	(21082704)	488322.19	3625636.42	69.28253	(21010519)
488342.19	3625636.42	79.55784	(19080704)	488362.19	3625636.42	78.55401	(19080704)
488382.19	3625636.42	72.21208	(20070402)	488522.19	3625636.42	70.31680	(19032522)

488542.19 3625636.42 70.66517 (20021320) 488562.19
3625636.42 71.15776 (19091303)
488582.19 3625636.42 70.70298 (20060721) 488602.19
3625636.42 67.42955 (20081905)
488622.19 3625636.42 67.52695 (21041522) 488062.19
3625656.42 65.11643 (20090823)
488082.19 3625656.42 67.09070 (20021323) 488102.19
3625656.42 67.31223 (21121021)
488122.19 3625656.42 68.91973 (21102122) 488142.19
3625656.42 68.00070 (19100421)
488162.19 3625656.42 69.91005 (19082103) 488182.19
3625656.42 70.02952 (20113019)
488202.19 3625656.42 69.83911 (20091504) 488222.19
3625656.42 70.62983 (20070303)
488242.19 3625656.42 77.08581 (19032623) 488262.19
3625656.42 70.63169 (19032623)
488282.19 3625656.42 70.53915 (19022722) 488302.19
3625656.42 72.12866 (21082704)
488322.19 3625656.42 70.33396 (21010519) 488342.19
3625656.42 82.55330 (19080704)
488362.19 3625656.42 78.71765 (19080704) 488382.19
3625656.42 74.51204 (20070402)
488522.19 3625656.42 71.20891 (20021320) 488542.19
3625656.42 71.95649 (19091303)
488582.19 3625656.42 70.92493 (20060721) 488602.19
3625656.42 68.29294 (21041522)
488622.19 3625656.42 68.90836 (20051104) 488642.19
3625656.42 75.79742 (20102522)
488062.19 3625676.42 66.10095 (20090823) 488082.19
3625676.42 68.24093 (20021323)
488102.19 3625676.42 68.55384 (21121021) 488122.19
3625676.42 70.46175 (21102122)
488142.19 3625676.42 69.66774 (19100421) 488162.19
3625676.42 71.67497 (19082103)

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS

***

** CONC OF PM_10 IN MICROGRAMS/M**3
**

X-COORD (M) Y-COORD (M) CONC (YYMMDDHH) X-COORD (M)
Y-COORD (M) CONC (YYMMDDHH)
- -
- -
488182.19 3625676.42 71.80591 (20113019) 488202.19
3625676.42 71.58881 (20091504)
488222.19 3625676.42 72.42699 (20070303) 488242.19
3625676.42 79.02146 (19032623)
488262.19 3625676.42 71.77269 (20012720) 488282.19
3625676.42 72.52585 (19110723)
488302.19 3625676.42 73.31222 (21082704) 488322.19
3625676.42 74.04633 (19080704)
488342.19 3625676.42 85.30622 (19080704) 488362.19
3625676.42 78.39908 (19080704)
488382.19 3625676.42 76.44445 (20070402) 488582.19
3625676.42 71.30980 (20081905)
488602.19 3625676.42 71.31210 (21041522) 488622.19
3625676.42 72.16276 (20051104)
488642.19 3625676.42 79.82916 (20102522) 488062.19
3625696.42 67.90419 (20091324)
488082.19 3625696.42 69.28678 (20021323) 488102.19
3625696.42 69.70973 (21121021)
488122.19 3625696.42 71.98187 (21102122) 488142.19
3625696.42 71.36496 (19100421)
488162.19 3625696.42 73.50109 (19082103) 488182.19
3625696.42 73.65780 (20113019)
488202.19 3625696.42 73.40767 (20091504) 488222.19
3625696.42 74.28526 (20070303)
488242.19 3625696.42 80.99302 (19032623) 488262.19
3625696.42 73.49285 (20012720)
488282.19 3625696.42 75.10368 (21082704) 488302.19
3625696.42 75.06282 (21010519)
488322.19 3625696.42 78.62293 (19080704) 488342.19
3625696.42 87.74511 (19080704)
488362.19 3625696.42 77.54911 (19080704) 488382.19
3625696.42 77.83410 (20070402)
488582.19 3625696.42 72.44256 (20081905) 488602.19
3625696.42 72.29714 (21041522)
488622.19 3625696.42 79.29432 (20102522) 488642.19
3625696.42 80.79833 (20102522)
488662.19 3625696.42 77.08402 (19082901) 488042.19
3625716.42 68.11456 (19032423)
488142.19 3625716.42 73.09119 (19100421) 488162.19
3625716.42 75.39485 (19082103)
488182.19 3625716.42 75.59314 (20113019) 488202.19

3625716.42   75.29513 (20091504)
        488222.19   3625716.42   76.35485 (19032623)   488242.19
3625716.42   82.98957 (19032623)
        488262.19   3625716.42   75.20571 (20012720)   488282.19
3625716.42   77.67592 (21082704)
        488302.19   3625716.42   77.44605 (21010519)   488322.19
3625716.42   83.20344 (19080704)
        488342.19   3625716.42   89.80592 (19080704)   488362.19
3625716.42   78.87397 (20070402)
        488382.19   3625716.42   78.57286 (20070402)   488602.19
3625716.42   76.18677 (20051104)
        488622.19   3625716.42   84.28256 (20102522)   488642.19
3625716.42   78.39673 (20102522)
        488662.19   3625716.42   82.27462 (19082901)   488682.19
3625716.42   77.03834 (19082901)
        488022.19   3625736.42   68.50248 (20111904)   488042.19
3625736.42   69.18260 (19032423)
        488182.19   3625736.42   77.61580 (20113019)   488202.19
3625736.42   77.29097 (20091504)
        488222.19   3625736.42   78.88047 (19032623)   488242.19
3625736.42   85.06621 (19032623)
        488262.19   3625736.42   77.24066 (21080305)   488282.19
3625736.42   80.29990 (21082704)
        488302.19   3625736.42   79.79523 (21010519)   488322.19
3625736.42   87.73386 (19080704)
        488362.19   3625736.42   82.07895 (20070402)   488382.19
3625736.42   78.85414 (21122219)
        488402.19   3625736.42   80.08735 (20060224)   488602.19
3625736.42   83.05343 (20102522)
        488622.19   3625736.42   85.87147 (20102522)   488642.19
3625736.42   81.61774 (19082901)
        488662.19   3625736.42   83.73472 (19082901)   488682.19
3625736.42   71.44359 (20091521)
        488702.19   3625736.42   72.38356 (21103121)   488002.19
3625756.42   68.34379 (19110122)
        488022.19   3625756.42   70.41396 (20111904)   488182.19
3625756.42   79.72478 (20113019)
        488202.19   3625756.42   79.37622 (20091504)   488222.19
3625756.42   81.50953 (19032623)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002

```
, L0000003    , L0000004   ,   L0000005    ,
                 L0000006    , L0000007    , L0000008    , L0000009    , L0000010
, L0000011    , L0000012   ,

                                           ***   DISCRETE CARTESIAN RECEPTOR POINTS
***

                                      **   CONC OF PM_10    IN MICROGRAMS/M**3
                   **

      X-COORD (M)  Y-COORD (M)       CONC      (YYMMDDHH)             X-COORD (M)
Y-COORD (M)       CONC      (YYMMDDHH)
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - - - -
        488242.19   3625756.42       87.18421  (19032623)               488262.19
3625756.42       79.83959  (21080305)
        488282.19   3625756.42       82.87928  (21082704)               488382.19
3625756.42       81.08988  (21122219)
        488602.19   3625756.42       89.10680  (20102522)               488622.19
3625756.42       83.63311  (20102522)
        488642.19   3625756.42       87.18985  (19082901)               488662.19
3625756.42       81.02896  (19082901)
        488682.19   3625756.42       75.10862  (21103121)               488702.19
3625756.42       74.17962  (20050620)
        487982.19   3625776.42       68.52237  (21120123)               488002.19
3625776.42       69.54979  (19110122)
        488222.19   3625776.42       84.23150  (19032623)               488242.19
3625776.42       89.31989  (19032623)
        488262.19   3625776.42       82.46992  (21080305)               488622.19
3625776.42       86.55050  (19082901)
        488642.19   3625776.42       88.56247  (19082901)               488662.19
3625776.42       75.57795  (21103121)
        488682.19   3625776.42       76.20554  (21103121)               488702.19
3625776.42       75.29363  (20050620)
        488722.19   3625776.42       72.68339  (21091802)               487982.19
3625796.42       69.01926  (21120123)
        488222.19   3625796.42       87.07098  (19032623)               488242.19
3625796.42       91.50697  (19032623)
        488262.19   3625796.42       85.14434  (21080305)               488622.19
3625796.42       92.27739  (19082901)
        488642.19   3625796.42       85.27329  (19082901)               488662.19
3625796.42       79.80004  (21103121)
        488682.19   3625796.42       78.83828  (20050620)               488702.19
3625796.42       75.86275  (21091802)
        488722.19   3625796.42       76.36289  (19100221)               488742.19
3625796.42       78.35519  (21081502)
        488222.19   3625816.42       90.02930  (19032623)               488242.19
3625816.42       93.73420  (19032623)
        488262.19   3625816.42       87.83659  (21080305)               488642.19
3625816.42       80.90801  (21103121)
```

488662.19   3625816.42   80.15780 (21103121)   488682.19
3625816.42   78.76059 (20050620)
488702.19   3625816.42   77.94535 (19100221)   488722.19
3625816.42   79.76721 (21081502)
488742.19   3625816.42   78.60610 (21081502)   488762.19
3625816.42   75.86051 (19072703)
488202.19   3625836.42   88.39000 (20091504)   488222.19
3625836.42   93.09945 (19032623)
488242.19   3625836.42   95.98539 (19032623)   488662.19
3625836.42   83.58786 (20050620)
488682.19   3625836.42   80.34416 (21091802)   488702.19
3625836.42   80.81777 (19100221)
488722.19   3625836.42   82.88380 (21081502)   488742.19
3625836.42   79.67565 (19072703)
488762.19   3625836.42   74.88107 (19040321)   488782.19
3625836.42   75.82941 (20112002)
488202.19   3625856.42   90.93995 (20091504)   488222.19
3625856.42   96.34260 (19032623)
488242.19   3625856.42   98.04816 (19032623)   488682.19
3625856.42   83.75754 (19100221)
488702.19   3625856.42   85.86549 (21081502)   488722.19
3625856.42   82.42779 (19072703)
488742.19   3625856.42   77.37671 (19040321)   488762.19
3625856.42   78.16578 (20112002)
488782.19   3625856.42   74.66990 (20112002)   488802.19
3625856.42   72.37814 (19101421)
488822.19   3625856.42   70.87051 (19101421)   488202.19
3625876.42   93.70901 (20091504)
488222.19   3625876.42   99.75589 (19032623)   488662.19
3625876.42   84.98964 (19100221)
488682.19   3625876.42   87.27425 (21081502)   488702.19
3625876.42   86.53010 (21081502)
488722.19   3625876.42   82.81304 (19072703)   488742.19
3625876.42   79.79795 (20112002)
488762.19   3625876.42   78.97626 (20112002)   488782.19
3625876.42   75.77685 (19100520)
488802.19   3625876.42   74.11742 (19101421)   488822.19
3625876.42   73.02657 (20121618)
488842.19   3625876.42   68.40208 (21110505)   488202.19
3625896.42   96.77823 (20091504)
488222.19   3625896.42   103.35973 (19032623)   488642.19
3625896.42   89.04575 (21091802)
488662.19   3625896.42   89.44175 (19100221)   488682.19
3625896.42   91.38955 (21081502)

```
 *** MODELOPTs:    CONC  ELEV  FLGPOL  URBAN  SigA Data

                              *** THE   1ST HIGHEST  1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: PASS      ***
                                  INCLUDING SOURCE(S):     L0000001    , L0000002
, L0000003    , L0000004   ,   L0000005    ,
                 L0000006    , L0000007    , L0000008    , L0000009    , L0000010
, L0000011    , L0000012   ,

                                            ***   DISCRETE CARTESIAN RECEPTOR POINTS
***

                                       **   CONC OF PM_10    IN MICROGRAMS/M**3
                   **

      X-COORD (M)  Y-COORD (M)       CONC      (YYMMDDHH)              X-COORD (M)
Y-COORD (M)       CONC      (YYMMDDHH)
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - - - -
        488702.19   3625896.42       87.45656  (19072703)                488722.19
3625896.42       82.00869  (19040321)
        488742.19   3625896.42       82.86410  (20112002)                488762.19
3625896.42       79.20946  (19100520)
        488782.19   3625896.42       77.21347  (19101421)                488802.19
3625896.42       75.76504  (20121618)
        488822.19   3625896.42       70.80012  (21110505)                488842.19
3625896.42       72.31118  (21073103)
        488862.19   3625896.42       69.23073  (21073103)                488882.19
3625896.42       66.95560  (20081323)
        488902.19   3625896.42       66.49366  (21092305)                488202.19
3625916.42       99.88367  (20091504)
        488222.19   3625916.42      107.11480  (19032623)                488642.19
3625916.42       92.25198  (19100221)
        488662.19   3625916.42       94.67727  (21081502)                488682.19
3625916.42       90.84709  (19072703)
        488702.19   3625916.42       85.35597  (19040321)                488762.19
3625916.42       80.04031  (19101421)
        488782.19   3625916.42       78.33745  (20121618)                488802.19
3625916.42       73.82388  (20121618)
        488822.19   3625916.42       74.48865  (21073103)                488842.19
3625916.42       72.16214  (21073103)
        488862.19   3625916.42       69.50912  (20081323)                488882.19
3625916.42       68.78076  (21092305)
        488902.19   3625916.42       66.99489  (19101420)                488922.19
3625916.42       65.02025  (21040420)
        488942.19   3625916.42       66.03050  (19042003)                488222.19
3625936.42      111.00731  (19032623)
        488622.19   3625936.42       94.86380  (21091802)                488642.19
3625936.42       95.95662  (21081502)
        488662.19   3625936.42       95.90607  (21081502)                488682.19
```

3625936.42   90.90242 (19072703)
        488782.19   3625936.42   77.74345 (20121618)   488802.19
3625936.42   76.65982 (21073103)
        488822.19   3625936.42   75.19609 (21073103)   488842.19
3625936.42   72.18026 (20081323)
        488862.19   3625936.42   71.17236 (21092305)   488882.19
3625936.42   69.23099 (19101420)
        488902.19   3625936.42   67.10126 (21040420)   488922.19
3625936.42   68.19876 (19042003)
        488942.19   3625936.42   66.88555 (19042003)   488962.19
3625936.42   63.15321 (20041924)
        488982.19   3625936.42   61.23686 (21091202)   489002.19
3625936.42   59.37123 (21120219)
        488602.19   3625956.42   98.59992 (21091802)   488622.19
3625956.42   99.44633 (19100221)
        488642.19   3625956.42   101.41359 (21081502)   488662.19
3625956.42   96.52365 (19072703)
        488782.19   3625956.42   78.76613 (21073103)   488802.19
3625956.42   78.32297 (21073103)
        488822.19   3625956.42   74.98356 (20081323)   488842.19
3625956.42   73.69781 (21092305)
        488862.19   3625956.42   71.59840 (19101420)   488882.19
3625956.42   69.29742 (21040420)
        488902.19   3625956.42   70.47929 (19042003)   488922.19
3625956.42   68.89900 (19042003)
        488942.19   3625956.42   65.05821 (20041924)   488962.19
3625956.42   63.12483 (21091202)
        488982.19   3625956.42   61.37594 (21120219)   489002.19
3625956.42   60.20995 (21120219)
        489022.19   3625956.42   60.11638 (21070304)   489042.19
3625956.42   57.44105 (21070304)
        489062.19   3625956.42   57.01969 (19030322)   489082.19
3625956.42   57.48089 (19030322)
        488622.19   3625976.42   104.83622 (21081502)   488802.19
3625976.42   77.91895 (20081323)
        488822.19   3625976.42   76.34983 (21092305)   488842.19
3625976.42   74.09088 (19101420)
        488862.19   3625976.42   71.60341 (21040420)   488882.19
3625976.42   72.87065 (19042003)
        488902.19   3625976.42   70.99319 (19042003)   488922.19
3625976.42   67.03338 (20041924)
        488942.19   3625976.42   65.06893 (21091202)   488962.19
3625976.42   63.40302 (21120219)
        488982.19   3625976.42   62.16679 (21070304)   489002.19
3625976.42   61.75015 (21070304)
        489022.19   3625976.42   58.92308 (20101020)   489042.19
3625976.42   59.19721 (19030322)
        489062.19   3625976.42   58.89482 (19030322)   489082.19
3625976.42   56.00762 (19030322)

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
489102.19	3625976.42	53.50966	(20012621)	489122.19	3625976.42	53.42909	(21020920)
488802.19	3625996.42	79.15026	(21092305)	488822.19	3625996.42	76.75489	(19101420)
488842.19	3625996.42	74.04611	(21040420)	488922.19	3625996.42	67.03770	(21091202)
488942.19	3625996.42	65.44439	(21120219)	488962.19	3625996.42	64.41812	(21070304)
488982.19	3625996.42	63.33591	(21070304)	489002.19	3625996.42	60.69543	(20101020)
489022.19	3625996.42	61.26391	(19030322)	489042.19	3625996.42	60.14165	(19030322)
489062.19	3625996.42	56.41848	(19030322)	489082.19	3625996.42	55.45989	(21020920)
489102.19	3625996.42	54.73527	(21020920)	489122.19	3625996.42	53.78895	(20062624)
489142.19	3625996.42	52.64209	(20062624)	488802.19	3626016.42	79.57118	(19101420)
488822.19	3626016.42	76.69406	(21040420)	488842.19	3626016.42	78.07982	(19042003)
488982.19	3626016.42	62.37676	(20101020)	489002.19	3626016.42	63.18708	(19030322)
489022.19	3626016.42	61.19266	(19030322)	489042.19	3626016.42	57.84884	(20012621)
489062.19	3626016.42	57.30668	(21020920)	489082.19	3626016.42	55.80321	(21020920)

489102.19 3626016.42 55.28893 (20062624) 489122.19
3626016.42 53.33682 (20062624)
489142.19 3626016.42 51.81209 (20082724) 488782.19
3626036.42 82.54350 (19101420)
488802.19 3626036.42 79.46206 (21040420) 488822.19
3626036.42 80.96461 (19042003)
488842.19 3626036.42 77.95396 (19042003) 489042.19
3626036.42 58.94598 (21020920)
489062.19 3626036.42 57.52993 (20062624) 489082.19
3626036.42 56.50029 (20062624)
489102.19 3626036.42 54.04828 (20082724) 489122.19
3626036.42 54.03616 (19050724)
489142.19 3626036.42 53.98047 (19050724) 488782.19
3626056.42 82.37832 (21040420)
488802.19 3626056.42 83.97712 (19042003) 488822.19
3626056.42 80.56931 (19042003)
488842.19 3626056.42 75.75121 (20041924) 489042.19
3626056.42 59.31383 (20062624)
489062.19 3626056.42 57.40459 (20062624) 489082.19
3626056.42 55.37726 (20082724)
489102.19 3626056.42 55.98251 (19050724) 489122.19
3626056.42 55.02400 (19050724)
489142.19 3626056.42 54.44597 (19042005) 489162.19
3626056.42 53.21209 (19042005)
488782.19 3626076.42 87.03981 (19042003) 488802.19
3626076.42 83.27331 (19042003)
488822.19 3626076.42 78.20697 (20041924) 488842.19
3626076.42 75.49543 (21091202)
488862.19 3626076.42 73.75394 (21070304) 489062.19
3626076.42 57.74918 (19050724)
489082.19 3626076.42 57.51975 (19050724) 489102.19
3626076.42 56.45532 (19042005)
489122.19 3626076.42 55.72999 (19042005) 489142.19
3626076.42 53.60951 (19042005)
489162.19 3626076.42 52.02741 (20041204) 488782.19
3626096.42 85.97109 (19042003)
488802.19 3626096.42 80.74534 (21091202) 488822.19
3626096.42 78.10987 (19082501)
488842.19 3626096.42 76.84158 (21070304) 488862.19
3626096.42 75.38813 (21070304)
489062.19 3626096.42 58.59452 (19050724) 489082.19
3626096.42 58.20400 (19042005)
489102.19 3626096.42 56.52511 (19042005) 489122.19
3626096.42 54.24011 (20041204)
489142.19 3626096.42 52.56478 (20031420) 489162.19
3626096.42 51.95211 (20031420)
488782.19 3626116.42 83.79373 (21091202) 488802.19
3626116.42 81.15286 (19082501)
488822.19 3626116.42 79.88668 (21070304) 488842.19
3626116.42 77.47196 (21070304)

488862.19   3626116.42   74.64691 (19030322)   489062.19
3626116.42   59.43185 (19042005)
488082.19   3626116.42   56.78852 (19042005)   489102.19
3626116.42   55.12140 (20041204)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002 , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010 , L0000011   , L0000012   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M)
Y-COORD (M)   CONC   (YYMMDDHH)
- -
489122.19   3626116.42   54.16534 (20031420)   489142.19
3626116.42   52.67639 (20031420)
489162.19   3626116.42   50.30124 (20102421)   489182.19
3626116.42   49.01905 (20090222)
488782.19   3626136.42   84.25902 (19082501)   488802.19
3626136.42   82.93583 (21070304)
488822.19   3626136.42   79.44771 (21070304)   488842.19
3626136.42   77.65920 (19030322)
488862.19   3626136.42   76.03802 (19030322)   489082.19
3626136.42   56.42385 (20031420)
489102.19   3626136.42   55.17837 (20031420)   489122.19
3626136.42   52.79774 (20031420)
489142.19   3626136.42   51.14537 (20102421)   489162.19
3626136.42   50.64590 (20090222)
489182.19   3626136.42   49.45565 (20090222)   488782.19
3626156.42   85.96422 (21070304)
488802.19   3626156.42   81.75855 (20101020)   488822.19
3626156.42   80.49610 (19030322)
488842.19   3626156.42   77.69302 (19030322)   488862.19
3626156.42   74.56808 (21020920)
488882.19   3626156.42   73.13842 (21020920)   489102.19

3626156.42 53.49897 (20102421)
489122.19 3626156.42 52.77858 (20090222) 489142.19
3626156.42 51.61235 (20090222)
489162.19 3626156.42 49.91353 (20072623) 489182.19
3626156.42 49.32168 (19050723)
488782.19 3626176.42 84.61080 (20101020) 488802.19
3626176.42 83.18155 (19030322)
488822.19 3626176.42 79.09640 (19030322) 488842.19
3626176.42 77.48932 (21020920)
488862.19 3626176.42 74.84197 (21020920) 488882.19
3626176.42 72.90855 (20062624)
489122.19 3626176.42 51.90528 (20090222) 489142.19
3626176.42 51.22705 (19050723)
489162.19 3626176.42 51.19112 (19050723) 489182.19
3626176.42 50.43875 (19050723)
488782.19 3626196.42 85.63219 (19030322) 488802.19
3626196.42 81.27629 (20012621)
488822.19 3626196.42 80.08798 (21020920) 488842.19
3626196.42 77.28093 (20062624)
488862.19 3626196.42 74.31677 (20062624) 488882.19
3626196.42 71.60737 (19050724)
488902.19 3626196.42 70.60932 (19050724) 489142.19
3626196.42 52.31037 (19050723)
489162.19 3626196.42 51.13742 (19042004) 489182.19
3626196.42 49.85419 (19042004)
489202.19 3626196.42 47.98402 (19042004) 488782.19
3626216.42 84.65984 (21020920)
488802.19 3626216.42 82.37646 (21020920) 488822.19
3626216.42 79.51771 (20062624)
488842.19 3626216.42 75.56858 (20102322) 488862.19
3626216.42 74.09747 (19050724)
488882.19 3626216.42 73.48663 (19042005) 488902.19
3626216.42 71.86610 (19042005)
489142.19 3626216.42 51.83439 (19042004) 489162.19
3626216.42 49.77866 (19042004)
489182.19 3626216.42 48.58853 (21071622) 489202.19
3626216.42 47.50855 (21100604)
489222.19 3626216.42 47.01545 (21100604) 489242.19
3626216.42 46.06862 (21100604)
489262.19 3626216.42 44.72248 (21072324) 488782.19
3626236.42 84.29427 (20062624)
488802.19 3626236.42 81.32607 (20062624) 488822.19
3626236.42 77.47542 (20102322)
488842.19 3626236.42 76.73556 (19042005) 488862.19
3626236.42 75.77847 (19042005)
488882.19 3626236.42 72.91625 (19042005) 488902.19
3626236.42 69.85557 (20120918)
489142.19 3626236.42 50.46417 (21071622) 489162.19
3626236.42 49.56815 (21100604)
489182.19 3626236.42 48.84194 (21100604) 489202.19

3626236.42   47.64994 (21100604)
        489222.19   3626236.42   46.46595 (21072324)   489242.19
3626236.42   45.66037 (21072324)
        489262.19   3626236.42   45.04848 (19092701)   488782.19
3626256.42   82.75755 (20102322)
        488802.19   3626256.42   80.00091 (19050724)   488822.19
3626256.42   79.65410 (19042005)
        488842.19   3626256.42   77.44649 (19042005)   488862.19
3626256.42   73.91887 (20120918)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488882.19	3626256.42	71.40844	(20031420)	488902.19	3626256.42	68.99496	(20031420)
488922.19	3626256.42	65.93884	(19083123)	489142.19	3626256.42	50.72273	(21100604)
489162.19	3626256.42	49.19946	(21100604)	489222.19	3626256.42	46.91111	(19092701)
489242.19	3626256.42	46.12470	(19092701)	489262.19	3626256.42	44.96821	(19092701)
488882.19	3626276.42	69.60333	(19083123)	488902.19	3626276.42	68.01894	(20090222)
488922.19	3626276.42	65.91341	(20090222)	489142.19	3626276.42	49.93472	(21072324)
489162.19	3626276.42	49.27642	(19092701)	489242.19	3626276.42	46.04795	(19060822)
489262.19	3626276.42	45.00519	(19060822)	488882.19	3626296.42	69.43147	(20090222)

488902.19 3626296.42 66.97664 (21083022) 489262.19
3626296.42 44.63044 (20072422)
489282.19 3626296.42 43.94006 (19050722) 488902.19
3626316.42 68.10028 (19042004)
489282.19 3626316.42 43.56779 (19050722) 489302.19
3626316.42 42.52198 (20081822)
488902.19 3626336.42 66.89128 (19042004) 488922.19
3626336.42 63.52070 (21100604)
489302.19 3626336.42 42.70710 (21070101) 489322.19
3626336.42 42.00652 (21070101)
488922.19 3626356.42 63.57731 (21100604) 488942.19
3626356.42 61.36465 (19092701)
489322.19 3626356.42 41.98406 (19073123) 488942.19
3626376.42 61.74824 (19092701)
488962.19 3626376.42 60.23720 (19060822) 489322.19
3626376.42 42.05061 (19072303)
489342.19 3626376.42 41.26526 (19072303) 488962.19
3626396.42 59.69531 (19083024)
489322.19 3626396.42 41.82438 (19043020) 489342.19
3626396.42 41.10760 (19043020)
489342.19 3626416.42 40.60286 (21072101) 489342.19
3626436.42 40.22231 (21062324)
488086.20 3626768.13 246.43140 (19120716) 488077.21
3626746.82 221.20230 (19120716)
488075.79 3626778.08 247.71398 (21040602) 488002.86
3626694.73 145.12888 (19042203)
487535.35 3626865.62 83.85833 (21020701) 487693.75
3626992.77 120.49002 (19120404)
487795.04 3626883.94 134.17969 (19121406) 487871.55
3626830.06 156.18789 (19121406)
487958.83 3626811.74 203.97261 (20010904) 488041.80
3626794.50 309.03522 (19011707)
488094.61 3626765.41 597.84336 (19120716) 488046.12
3626714.76 249.56292 (19121406)
488007.32 3626665.19 176.11742 (21112423) 487941.59
3626599.46 131.00732 (19040823)
487911.42 3626574.68 126.78517 (19040823) 487815.52
3626540.19 96.56096 (19040823)
487709.91 3626504.63 68.95854 (19021102) 487555.82
3626439.98 59.47821 (19021102)
487490.09 3626487.39 61.81310 (19040823) 487428.67
3626556.36 57.32772 (19022001)
487358.63 3626713.68 65.52772 (20012319) 487522.42
3626827.90 77.29830 (21120107)
488235.45 3625424.52 55.63608 (19032623) 488562.08
3625540.85 61.77999 (20021320)
488747.03 3625794.41 78.04872 (21081502) 488857.40
3625879.42 70.45324 (21073103)
489054.28 3625949.52 56.42979 (20101020) 489134.82
3625964.44 52.53361 (21020920)

489178.07   3626085.25   51.09993 (20031420)   489203.43
3626198.60   47.54886 (19042004)
489260.10   3626203.08   45.42611 (21100604)   489276.51
3626217.99   44.34396 (21072324)
489267.56   3626265.72   45.05430 (19060822)   489336.17
3626346.26   41.41164 (19073123)
489361.53   3626432.77   39.58735 (21062324)   489331.70
3626449.18   40.69125 (20012420)
489309.32   3626361.18   42.34125 (19073123)   489258.61
3626298.53   44.70309 (20072422)
489190.00   3626228.43   48.41925 (21100604)   489149.73
3626317.92   49.46218 (19060822)
489130.34   3626250.81   51.12332 (21100604)   489137.80
3626216.50   52.19883 (19042004)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: PASS   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)
- -
489054.28   3626106.13   59.49878 (19042005)   489036.38
3626036.03   59.23357 (21020920)
488921.53   3625997.25   67.09439 (21091202)   488846.96
3625983.83   73.15419 (19101420)
488872.31   3626110.61   74.00794 (19030322)   488902.14
3626194.13   70.62878 (19050724)
488931.97   3626270.20   65.23758 (20090222)   488908.77
3626298.76   66.03816 (21083022)
488936.81   3626348.34   62.61304 (21100604)   488971.36
3626378.01   59.56686 (19060822)
488968.11   3626409.72   58.20971 (21081521)   488903.08

3626355.25   65.36888 (21100604)
        488864.87   3626256.49   73.55672 (20120918)   488763.27
3626259.34   86.67430 (20062624)
        488787.87   3625962.95   80.44327 (21073103)   488735.67
3625906.27   84.05735 (20112002)
        488620.82   3625988.31   107.18456 (21081502)   488588.00
3625956.98   102.39480 (20050620)
        488671.53   3625861.52   82.96315 (19100221)   488629.77
3625813.79   89.75986 (19082901)
        488588.00   3625746.67   79.49307 (20051104)   488571.59
3625648.23   71.95161 (20060721)
        488516.41   3625666.13   72.38350 (19032522)   488522.37
3625581.11   72.79885 (19052822)
        488431.39   3625576.63   64.42211 (20060224)   488447.79
3625615.41   69.17322 (20021420)
        488388.13   3625616.90   70.69432 (20070402)   488398.57
3625706.40   75.06067 (20060224)
        488406.03   3625745.18   80.62729 (20021420)   488392.60
3625776.50   84.63238 (20060224)
        488350.84   3625722.81   86.19831 (19080704)   488279.24
3625769.05   83.99144 (21082704)
        488282.23   3625807.83   88.88813 (21082704)   488246.43
3625851.08   94.89167 (19032623)
        488230.02   3625946.54   115.06630 (19032623)   488188.26
3625924.17   99.98115 (20113019)
        488213.62   3625757.11   79.26183 (20091504)   488170.36
3625779.49   81.80869 (20113019)
        488170.36   3625733.25   77.37507 (20113019)   488077.88
3625697.45   68.98086 (20090823)
        487973.47   3625822.74   69.63758 (19041502)   487955.57
3625809.32   67.87047 (19111401)
        488058.49   3625678.06   66.54806 (20091324)   488057.00
3625618.40   62.48899 (20090823)
        488107.71   3625596.02   63.23029 (21102122)   488185.27
3625576.63   62.86487 (20050606)
        488228.53   3625528.90   61.12792 (20070303)   488233.01
3625482.66   59.01960 (19032623)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK   ***
INCLUDING SOURCE(S):   L0000013   , L0000014   , L0000015   , L0000016   ,   L0000017   ,
L0000018   , L0000019   , L0000020   , L0000021   , L0000022

, L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
487526.96	3626464.52	57.30789	(19021102)	487546.96	3626464.52	57.96440	(19021102)
487566.96	3626464.52	57.97216	(19021102)	487586.96	3626464.52	59.84927	(19021102)
487606.96	3626464.52	59.34496	(19021102)	487506.96	3626484.52	59.55869	(19040823)
487526.96	3626484.52	60.71906	(19040823)	487546.96	3626484.52	59.29483	(19040823)
487566.96	3626484.52	59.13648	(19040823)	487586.96	3626484.52	60.19483	(19040823)
487606.96	3626484.52	58.95881	(19040823)	487626.96	3626484.52	60.40055	(19021102)
487646.96	3626484.52	62.66129	(19021102)	487486.96	3626504.52	63.40283	(20122123)
487506.96	3626504.52	65.04830	(20122123)	487526.96	3626504.52	65.55319	(20122123)
487546.96	3626504.52	59.66619	(19040823)	487566.96	3626504.52	59.62806	(19040823)
487586.96	3626504.52	61.37920	(19040823)	487606.96	3626504.52	60.43308	(19040823)
487626.96	3626504.52	61.90082	(19040823)	487646.96	3626504.52	63.71908	(19040823)
487666.96	3626504.52	65.43704	(19040823)	487686.96	3626504.52	64.35460	(19040823)
487706.96	3626504.52	62.74092	(19021102)	487466.96	3626524.52	63.16898	(20122123)
487486.96	3626524.52	65.15409	(20122123)	487506.96	3626524.52	70.56514	(20122123)
487526.96	3626524.52	69.50129	(20122123)	487546.96	3626524.52	59.48428	(20122123)
487566.96	3626524.52	57.86107	(19040823)	487586.96	3626524.52	60.17893	(19040823)
487606.96	3626524.52	62.30580	(19040823)	487626.96	3626524.52	61.89018	(19040823)
487646.96	3626524.52	64.39720	(19040823)	487666.96	3626524.52	66.64753	(19040823)
487686.96	3626524.52	65.87391	(19040823)	487706.96	3626524.52	66.72486	(19040823)

487726.96   3626524.52   69.37798 (19040823)   487746.96
3626524.52   77.97921 (19040823)
487766.96   3626524.52   81.44319 (19040823)   487446.96
3626544.52   65.78255 (20122123)
487466.96   3626544.52   66.10508 (20122123)   487486.96
3626544.52   67.92013 (20122123)
487506.96   3626544.52   69.08605 (20122123)   487526.96
3626544.52   64.69232 (20122123)
487546.96   3626544.52   66.27702 (20122123)   487566.96
3626544.52   54.49690 (19040823)
487586.96   3626544.52   57.28170 (19040823)   487606.96
3626544.52   64.29752 (20122123)
487626.96   3626544.52   63.11367 (19040823)   487646.96
3626544.52   62.99801 (19040823)
487666.96   3626544.52   65.61159 (19040823)   487686.96
3626544.52   65.37209 (19040823)
487706.96   3626544.52   71.94985 (19040823)   487726.96
3626544.52   75.94286 (19040823)
487746.96   3626544.52   79.81830 (19040823)   487766.96
3626544.52   83.88444 (19040823)
487786.96   3626544.52   88.50060 (19040823)   487806.96
3626544.52   95.94059 (19040823)
487826.96   3626544.52   96.77537 (19040823)   487426.96
3626564.52   64.25373 (20122123)
487446.96   3626564.52   62.16339 (20122123)   487466.96
3626564.52   63.36578 (20122123)
487486.96   3626564.52   64.21751 (20122123)   487506.96
3626564.52   64.45300 (20122123)
487526.96   3626564.52   62.91133 (20122123)   487546.96
3626564.52   55.66878 (19022001)
487566.96   3626564.52   52.65828 (21012122)   487586.96
3626564.52   54.92122 (19022001)
487606.96   3626564.52   72.38662 (20122123)   487626.96
3626564.52   58.79699 (19022001)
487646.96   3626564.52   61.62635 (19040823)   487666.96
3626564.52   62.17115 (19040823)
487686.96   3626564.52   65.58850 (19040823)   487706.96
3626564.52   69.26398 (19040823)
487726.96   3626564.52   73.49048 (19040823)   487746.96
3626564.52   77.66699 (19040823)
487766.96   3626564.52   82.06929 (19040823)   487786.96
3626564.52   91.26237 (19040823)

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
487806.96	3626564.52	96.48851	(19040823)	487826.96	3626564.52	101.48483	(19040823)
487846.96	3626564.52	106.74269	(19040823)	487866.96	3626564.52	112.67009	(19040823)
487426.96	3626584.52	60.71670	(21012122)	487446.96	3626584.52	61.28396	(21012122)
487466.96	3626584.52	62.25407	(21012122)	487486.96	3626584.52	62.03788	(21012122)
487506.96	3626584.52	62.54957	(21012122)	487526.96	3626584.52	64.62644	(21012122)
487546.96	3626584.52	55.08554	(21012122)	487566.96	3626584.52	55.63180	(21012122)
487586.96	3626584.52	58.33052	(21012122)	487606.96	3626584.52	66.72571	(21012122)
487626.96	3626584.52	61.64706	(21012122)	487646.96	3626584.52	63.68274	(21012122)
487666.96	3626584.52	66.59750	(21012122)	487686.96	3626584.52	69.28733	(21012122)
487706.96	3626584.52	67.46725	(21012122)	487726.96	3626584.52	74.31948	(21012122)
487746.96	3626584.52	77.09358	(21012122)	487766.96	3626584.52	80.64727	(19040823)
487786.96	3626584.52	86.09497	(19040823)	487806.96	3626584.52	91.74284	(19040823)
487826.96	3626584.52	97.67979	(19040823)	487846.96	3626584.52	104.08041	(19040823)
487866.96	3626584.52	112.85497	(20122123)	487886.96	3626584.52	122.36987	(20122123)
487906.96	3626584.52	127.45982	(20122123)	487426.96	3626604.52	63.39425	(21012122)
487446.96	3626604.52	64.72931	(21012122)	487466.96	3626604.52	65.95188	(21012122)
487486.96	3626604.52	65.69645	(21012122)	487506.96			

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3626604.52       66.30028  (21012122)
        487526.96   3626604.52       67.76146  (21012122)                 487546.96
3626604.52       61.08864  (21012122)
        487566.96   3626604.52       56.86529  (21012122)                 487586.96
3626604.52       55.14880  (21012122)
        487606.96   3626604.52       61.12438  (21012122)                 487626.96
3626604.52       64.16228  (21012122)
        487646.96   3626604.52       67.25996  (21012122)                 487666.96
3626604.52       70.36538  (21012122)
        487686.96   3626604.52       73.25926  (21012122)                 487706.96
3626604.52       75.56568  (21012122)
        487726.96   3626604.52       79.59537  (21012122)                 487746.96
3626604.52       83.57769  (21012122)
        487766.96   3626604.52       87.30226  (21012122)                 487786.96
3626604.52       90.73008  (21012122)
        487806.96   3626604.52       97.47831  (21012122)                 487826.96
3626604.52      105.20158  (21012122)
        487846.96   3626604.52      107.76612  (21012122)                 487866.96
3626604.52      113.42208  (21012122)
        487886.96   3626604.52      119.09900  (21012122)                 487906.96
3626604.52      124.93060  (21012122)
        487926.96   3626604.52      131.73052  (21012122)                 487406.96
3626624.52       63.36094  (21012122)
        487426.96   3626624.52       64.29647  (21012122)                 487446.96
3626624.52       65.87414  (21012122)
        487466.96   3626624.52       66.91677  (21012122)                 487486.96
3626624.52       67.90793  (21012122)
        487506.96   3626624.52       67.64581  (21012122)                 487526.96
3626624.52       68.68924  (21012122)
        487546.96   3626624.52       65.29240  (21012122)                 487566.96
3626624.52       55.30902  (21012122)
        487586.96   3626624.52       53.68645  (19020205)                 487606.96
3626624.52       55.99319  (19020205)
        487626.96   3626624.52       62.53249  (21012122)                 487646.96
3626624.52       66.39671  (21012122)
        487666.96   3626624.52       69.83739  (21012122)                 487686.96
3626624.52       73.00599  (21012122)
        487706.96   3626624.52       76.37914  (21012122)                 487726.96
3626624.52       80.16019  (21012122)
        487746.96   3626624.52       84.14003  (21012122)                 487766.96
3626624.52       88.40545  (21012122)
        487786.96   3626624.52       93.15410  (21012122)                 487806.96
3626624.52      109.35209  (21012122)
        487826.96   3626624.52      114.86748  (21012122)                 487846.96
3626624.52      119.48034  (21012122)
        487866.96   3626624.52      115.97993  (21012122)                 487886.96
3626624.52      122.46702  (21012122)
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*** 14:45:58

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*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
487906.96	3626624.52	128.74449	(21012122)	487926.96	3626624.52	136.66202	(21012122)
487946.96	3626624.52	146.58631	(21012122)	487406.96	3626644.52	62.72423	(20101601)
487426.96	3626644.52	64.21505	(20101601)	487446.96	3626644.52	65.43095	(20101601)
487466.96	3626644.52	65.79557	(20101601)	487486.96	3626644.52	67.13260	(20101601)
487506.96	3626644.52	68.75070	(20101601)	487526.96	3626644.52	68.04452	(20101601)
487546.96	3626644.52	58.57506	(20101601)	487566.96	3626644.52	52.46880	(21102401)
487586.96	3626644.52	53.57969	(21102401)	487606.96	3626644.52	56.05651	(21102401)
487626.96	3626644.52	58.61693	(21102401)	487646.96	3626644.52	64.80725	(21102401)
487666.96	3626644.52	68.44494	(21102401)	487686.96	3626644.52	71.66942	(21102401)
487706.96	3626644.52	77.85011	(20101601)	487726.96	3626644.52	81.53406	(20101601)
487746.96	3626644.52	82.12259	(21102401)	487766.96	3626644.52	86.23627	(21102401)
487786.96	3626644.52	106.37797	(21012122)	487806.96	3626644.52	111.41956	(21012122)
487826.96	3626644.52	118.05770	(21012122)	487846.96	3626644.52	122.54739	(21012122)
487866.96	3626644.52	112.00152	(21102401)	487886.96	3626644.52	118.59503	(21102401)

487906.96   3626644.52   124.70489 (21102401)   487926.96
3626644.52   132.16453 (21102401)
487946.96   3626644.52   141.42929 (21112423)   487966.96
3626644.52   148.90685 (21112423)
487386.96   3626664.52   61.12085 (20101601)   487406.96
3626664.52   62.17782 (20101601)
487426.96   3626664.52   63.33238 (20101601)   487446.96
3626664.52   64.73016 (20101601)
487466.96   3626664.52   65.60577 (20101601)   487486.96
3626664.52   66.75521 (20101601)
487506.96   3626664.52   67.32177 (20101601)   487526.96
3626664.52   64.14153 (20101601)
487546.96   3626664.52   63.73154 (20101601)   487566.96
3626664.52   64.38479 (20101601)
487586.96   3626664.52   59.10613 (21112423)   487606.96
3626664.52   60.77156 (21112423)
487626.96   3626664.52   60.89466 (21112423)   487646.96
3626664.52   66.20704 (21112423)
487666.96   3626664.52   70.14484 (21112423)   487686.96
3626664.52   75.72351 (21112423)
487706.96   3626664.52   84.58744 (20101601)   487726.96
3626664.52   83.25296 (21112423)
487746.96   3626664.52   93.12138 (20101601)   487766.96
3626664.52   100.36584 (20101601)
487786.96   3626664.52   105.65303 (20101601)   487806.96
3626664.52   110.29689 (20101601)
487826.96   3626664.52   115.83349 (20101601)   487846.96
3626664.52   121.09599 (20101601)
487866.96   3626664.52   125.68619 (20101601)   487886.96
3626664.52   133.11771 (20101601)
487906.96   3626664.52   139.59434 (20101601)   487926.96
3626664.52   139.89673 (21112423)
487946.96   3626664.52   148.00810 (21112423)   487966.96
3626664.52   151.59039 (21112423)
487986.96   3626664.52   161.79324 (21112423)   487386.96
3626684.52   59.99176 (20013121)
487406.96   3626684.52   61.12936 (20013121)   487426.96
3626684.52   62.13560 (20013121)
487446.96   3626684.52   62.96325 (20013121)   487466.96
3626684.52   63.96780 (20013121)
487486.96   3626684.52   64.73569 (20013121)   487506.96
3626684.52   64.60978 (20013121)
487526.96   3626684.52   63.33300 (21112423)   487546.96
3626684.52   65.56808 (21112423)
487566.96   3626684.52   67.94316 (21112423)   487586.96
3626684.52   70.02614 (21112423)
487606.96   3626684.52   70.14211 (21112423)   487626.96
3626684.52   66.76304 (21112423)
487646.96   3626684.52   69.34461 (21112423)   487666.96
3626684.52   72.84155 (21112423)

487686.96   3626684.52   82.11691 (21112423)   487706.96
3626684.52   86.76491 (21112423)

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK   ***
INCLUDING SOURCE(S):   L0000013   , L0000014 , L0000015   , L0000016   ,   L0000017   ,
L0000018   , L0000019   , L0000020   , L0000021   , L0000022 , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
487726.96	3626684.52	90.81446	(21112423)	487746.96	3626684.52	97.14384	(21112423)
487766.96	3626684.52	102.06874	(21112423)	487786.96	3626684.52	106.34099	(21112423)
487806.96	3626684.52	110.92317	(21112423)	487826.96	3626684.52	115.95596	(21112423)
487846.96	3626684.52	121.31245	(21112423)	487866.96	3626684.52	126.98101	(21112423)
487886.96	3626684.52	133.15309	(20012319)	487906.96	3626684.52	139.59941	(20012319)
487926.96	3626684.52	147.17043	(21112423)	487946.96	3626684.52	144.91302	(21112423)
487966.96	3626684.52	153.75066	(21112423)	487986.96	3626684.52	156.54269	(21020701)
488006.96	3626684.52	182.35347	(21020701)	487366.96	3626704.52	59.57740	(20012319)
487386.96	3626704.52	61.03931	(20012319)	487406.96	3626704.52	62.65578	(20012319)
487426.96	3626704.52	64.00975	(20012319)	487446.96	3626704.52	64.02621	(20012319)
487466.96	3626704.52	65.13388	(20012319)	487486.96	3626704.52	65.63429	(20012319)
487506.96	3626704.52	66.12187	(21112423)	487526.96			

3626704.52 66.97857 (21112423)
487546.96 3626704.52 68.32663 (21112423) 487566.96
3626704.52 70.44357 (21112423)
487586.96 3626704.52 73.01280 (21112423) 487606.96
3626704.52 75.59309 (21112423)
487626.96 3626704.52 76.23065 (21112423) 487646.96
3626704.52 72.33706 (21112423)
487666.96 3626704.52 72.11877 (21112423) 487686.96
3626704.52 82.77188 (21112423)
487706.96 3626704.52 88.22797 (21112423) 487726.96
3626704.52 94.05259 (21112423)
487746.96 3626704.52 98.60380 (21112423) 487766.96
3626704.52 102.70561 (21112423)
487786.96 3626704.52 106.59840 (21112423) 487806.96
3626704.52 110.69855 (21112423)
487826.96 3626704.52 115.49803 (21112423) 487846.96
3626704.52 120.77154 (21112423)
487866.96 3626704.52 126.35303 (21112423) 487886.96
3626704.52 132.30521 (21112423)
487906.96 3626704.52 138.88033 (21112423) 487926.96
3626704.52 146.94358 (21112423)
487946.96 3626704.52 155.26170 (21112423) 487966.96
3626704.52 156.96914 (21020701)
487986.96 3626704.52 172.44897 (21020701) 488006.96
3626704.52 189.90576 (21020701)
488026.96 3626704.52 207.96375 (21020701) 487386.96
3626724.52 61.79130 (20012319)
487406.96 3626724.52 62.72663 (20012319) 487426.96
3626724.52 63.51410 (20012319)
487446.96 3626724.52 64.32992 (20012319) 487466.96
3626724.52 65.37666 (20012319)
487486.96 3626724.52 66.32720 (21112423) 487506.96
3626724.52 67.71067 (21112423)
487526.96 3626724.52 68.78858 (21112423) 487546.96
3626724.52 70.29880 (21112423)
487566.96 3626724.52 70.90352 (21112423) 487586.96
3626724.52 72.43906 (21112423)
487606.96 3626724.52 73.44213 (21112423) 487626.96
3626724.52 75.76203 (21112423)
487646.96 3626724.52 77.06458 (21112423) 487666.96
3626724.52 79.34655 (21112423)
487686.96 3626724.52 82.41591 (21112423) 487706.96
3626724.52 85.87958 (21112423)
487726.96 3626724.52 90.86038 (21112423) 487746.96
3626724.52 94.67142 (21112423)
487766.96 3626724.52 98.14792 (21112423) 487786.96
3626724.52 101.74088 (21112423)
487806.96 3626724.52 105.91366 (21120107) 487826.96
3626724.52 112.12079 (21120107)
487846.96 3626724.52 118.92205 (21120107) 487866.96

3626724.52   128.44620 (21120107)
        487886.96   3626724.52   137.74043 (21120107)   487906.96
3626724.52   141.99148 (21120107)
        487926.96   3626724.52   149.60839 (21120107)   487946.96
3626724.52   155.61231 (21020701)
        487966.96   3626724.52   158.03771 (21101502)   487986.96
3626724.52   173.85776 (21101502)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK   ***
INCLUDING SOURCE(S):   L0000013   , L0000014   , L0000015   , L0000016   ,   L0000017   ,
L0000018   , L0000019   , L0000020   , L0000021   , L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488006.96	3626724.52	190.62860	(21101502)	488026.96	3626724.52	217.99730	(19121406)
488046.96	3626724.52	259.37833	(19120404)	487406.96	3626744.52	60.75129	(20012319)
487426.96	3626744.52	61.00284	(21112423)	487446.96	3626744.52	62.39025	(21112423)
487466.96	3626744.52	63.70328	(21112423)	487486.96	3626744.52	64.99010	(21112423)
487506.96	3626744.52	66.14056	(21112423)	487526.96	3626744.52	66.97908	(21112423)
487546.96	3626744.52	68.54340	(21112423)	487566.96	3626744.52	69.94754	(21112423)
487586.96	3626744.52	68.92464	(21112423)	487606.96	3626744.52	69.20705	(21112423)
487626.96	3626744.52	71.32487	(21112423)	487646.96	3626744.52	73.13809	(21112423)
487666.96	3626744.52	75.05890	(21112423)	487686.96	3626744.52	77.15638	(21112423)

487706.96   3626744.52   79.48188 (21112423)   487726.96
3626744.52   87.29759 (21120107)
487746.96   3626744.52   94.28185 (21120107)   487766.96
3626744.52   100.70799 (21120107)
487786.96   3626744.52   108.37562 (21120107)   487806.96
3626744.52   115.95939 (21120107)
487826.96   3626744.52   119.93858 (21120107)   487846.96
3626744.52   124.51661 (21120107)
487866.96   3626744.52   132.00998 (21020701)   487886.96
3626744.52   142.00661 (21020701)
487906.96   3626744.52   147.66787 (21020701)   487926.96
3626744.52   153.67440 (21020701)
487946.96   3626744.52   150.30046 (21101502)   487966.96
3626744.52   161.94414 (21101502)
487986.96   3626744.52   179.63742 (19121406)   488006.96
3626744.52   204.70885 (19121406)
488026.96   3626744.52   234.58668 (19120404)   488046.96
3626744.52   278.08940 (19120405)
488066.96   3626744.52   333.52918 (19120405)   487446.96
3626764.52   62.30649 (19122507)
487466.96   3626764.52   63.77539 (19122507)   487486.96
3626764.52   63.94499 (19122507)
487506.96   3626764.52   64.15136 (19091906)   487526.96
3626764.52   65.14711 (19091906)
487546.96   3626764.52   67.26238 (19091906)   487566.96
3626764.52   68.27732 (19091906)
487586.96   3626764.52   68.72582 (19091906)   487606.96
3626764.52   66.90488 (21120107)
487626.96   3626764.52   69.68472 (21120107)   487646.96
3626764.52   73.84030 (21120107)
487666.96   3626764.52   78.26913 (21120107)   487686.96
3626764.52   82.41619 (21120107)
487706.96   3626764.52   85.68377 (21120107)   487726.96
3626764.52   91.42192 (21120107)
487746.96   3626764.52   97.96335 (21120107)   487766.96
3626764.52   104.79204 (21120107)
487786.96   3626764.52   113.58423 (21120107)   487806.96
3626764.52   118.96029 (21120107)
487826.96   3626764.52   125.29899 (21020701)   487846.96
3626764.52   130.85402 (21020701)
487866.96   3626764.52   135.42012 (21020701)   487886.96
3626764.52   142.47057 (21020701)
487906.96   3626764.52   147.43520 (21020701)   487926.96
3626764.52   154.31475 (21101502)
487946.96   3626764.52   155.52277 (19121406)   487966.96
3626764.52   180.97443 (19121406)
487986.96   3626764.52   205.76309 (19121406)   488006.96
3626764.52   231.95953 (19121406)
488026.96   3626764.52   260.28190 (19120405)   488046.96
3626764.52   287.94620 (19120405)

488066.96   3626764.52   337.78230 (19120716)   488086.96
3626764.52   463.83893 (19120716)
487466.96   3626784.52   61.45432 (19122507)   487486.96
3626784.52   61.49102 (19091906)
487506.96   3626784.52   62.29528 (19091906)   487526.96
3626784.52   63.73985 (19091906)
487546.96   3626784.52   66.36601 (21120107)   487566.96
3626784.52   69.34255 (21120107)
487586.96   3626784.52   72.36145 (21120107)   487606.96
3626784.52   75.60843 (21120107)
487626.96   3626784.52   79.19602 (21120107)   487646.96
3626784.52   82.20274 (21120107)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK   ***
INCLUDING SOURCE(S):   L0000013   , L0000014   , L0000015   , L0000016   ,   L0000017   ,
L0000018   , L0000019   , L0000020   , L0000021   , L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M)
Y-COORD (M)   CONC   (YYMMDDHH)
- -
487666.96   3626784.52   83.72465 (21120107)   487686.96
3626784.52   87.24441 (21120107)
487706.96   3626784.52   91.16141 (21120107)   487726.96
3626784.52   93.90387 (21020701)
487746.96   3626784.52   99.78312 (21020701)   487766.96
3626784.52   106.76813 (21020701)
487786.96   3626784.52   115.83299 (21020701)   487806.96
3626784.52   121.69177 (21020701)
487826.96   3626784.52   127.53477 (21020701)   487846.96
3626784.52   132.97331 (21020701)
487866.96   3626784.52   134.51722 (19050905)   487886.96
3626784.52   141.55427 (21090905)
487906.96   3626784.52   151.52951 (20122119)   487926.96

3626784.52   160.24250 (20122119)
        487946.96   3626784.52   176.84352 (19121406)   487966.96
3626784.52   197.04458 (19121406)
        487986.96   3626784.52   221.72060 (19120404)   488006.96
3626784.52   257.06949 (19120404)
        488026.96   3626784.52   296.49407 (19120405)   488046.96
3626784.52   294.16560 (19120405)
        487506.96   3626804.52   66.16565 (21120107)   487526.96
3626804.52   69.86382 (21120107)
        487546.96   3626804.52   72.19766 (21120107)   487566.96
3626804.52   74.81306 (21120107)
        487586.96   3626804.52   77.51688 (21120107)   487606.96
3626804.52   80.26727 (21120107)
        487626.96   3626804.52   84.07517 (21120107)   487646.96
3626804.52   85.80219 (21120107)
        487666.96   3626804.52   87.55848 (21120107)   487686.96
3626804.52   91.28373 (21020701)
        487706.96   3626804.52   96.92631 (21020701)   487726.96
3626804.52   100.33972 (21020701)
        487746.96   3626804.52   102.23052 (21020701)   487766.96
3626804.52   109.58102 (21020701)
        487786.96   3626804.52   114.87204 (21020701)   487806.96
3626804.52   119.55552 (19050905)
        487826.96   3626804.52   124.02689 (21090905)   487846.96
3626804.52   133.16678 (21090905)
        487866.96   3626804.52   142.44772 (20122119)   487886.96
3626804.52   147.53118 (20122119)
        487906.96   3626804.52   158.19060 (19121406)   487926.96
3626804.52   173.23149 (19121406)
        487946.96   3626804.52   189.67823 (19120404)   487966.96
3626804.52   217.78755 (19120404)
        487986.96   3626804.52   239.16710 (19120404)   487526.96
3626824.52   72.82071 (21120107)
        487546.96   3626824.52   75.55567 (21120107)   487566.96
3626824.52   77.80107 (21120107)
        487586.96   3626824.52   79.30319 (21120107)   487606.96
3626824.52   80.07365 (21120107)
        487626.96   3626824.52   83.87410 (21020701)   487646.96
3626824.52   87.07153 (21020701)
        487666.96   3626824.52   90.12908 (21020701)   487686.96
3626824.52   93.53836 (21020701)
        487706.96   3626824.52   96.99971 (21020701)   487726.96
3626824.52   101.44047 (21020701)
        487746.96   3626824.52   105.55752 (19050905)   487766.96
3626824.52   108.33519 (19050905)
        487786.96   3626824.52   112.61792 (21090905)   487806.96
3626824.52   120.32165 (21090905)
        487826.96   3626824.52   128.05136 (20122119)   487846.96
3626824.52   137.00394 (20122119)
        487866.96   3626824.52   145.41958 (20122119)   487886.96

3626824.52   157.04355 (19121406)
        487546.96   3626844.52   75.26575 (21120107)   487566.96
3626844.52   77.59901 (21020701)
        487586.96   3626844.52   80.21869 (21020701)   487606.96
3626844.52   82.40911 (21020701)
        487626.96   3626844.52   85.38566 (21020701)   487646.96
3626844.52   87.43576 (21020701)
        487666.96   3626844.52   89.66114 (19050905)   487686.96
3626844.52   92.77352 (19050905)
        487706.96   3626844.52   94.81415 (19050905)   487726.96
3626844.52   99.03140 (21090905)
        487746.96   3626844.52   105.32017 (21090905)   487766.96
3626844.52   110.51081 (21090905)
        487786.96   3626844.52   116.18915 (20122119)   487806.96
3626844.52   123.28321 (20122119)
        487826.96   3626844.52   129.48285 (20122119)   487846.96
3626844.52   139.64601 (19121406)

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK   ***
INCLUDING SOURCE(S):   L0000013   , L0000014   , L0000015   , L0000016   ,   L0000017   ,
L0000018   , L0000019   , L0000020   , L0000021   , L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)
- -
        487546.96   3626864.52   77.24798 (21020701)   487566.96
3626864.52   78.74840 (21020701)
        487586.96   3626864.52   80.30367 (21020701)   487606.96
3626864.52   81.89820 (19050905)
        487626.96   3626864.52   84.19645 (19050905)   487646.96
3626864.52   85.47264 (19050905)
        487666.96   3626864.52   87.05700 (19050905)   487686.96
3626864.52   92.47497 (21090905)

487706.96 3626864.52 96.81823 (21090905) 487726.96
3626864.52 101.47385 (21090905)
487746.96 3626864.52 106.67068 (20122119) 487766.96
3626864.52 112.09033 (20122119)
487786.96 3626864.52 117.88314 (20122119) 487806.96
3626864.52 125.52279 (19121406)
487566.96 3626884.52 78.17957 (19050905) 487586.96
3626884.52 78.62285 (19050905)
487606.96 3626884.52 79.63844 (19050905) 487626.96
3626884.52 83.35934 (21090905)
487646.96 3626884.52 86.95969 (21090905) 487666.96
3626884.52 90.30722 (21090905)
487686.96 3626884.52 93.94853 (21090905) 487706.96
3626884.52 97.90555 (20122119)
487726.96 3626884.52 102.99484 (20122119) 487746.96
3626884.52 107.11481 (20122119)
487766.96 3626884.52 113.87606 (19121406) 487786.96
3626884.52 122.53242 (19121406)
487586.96 3626904.52 78.30909 (21090905) 487606.96
3626904.52 81.60472 (21090905)
487626.96 3626904.52 86.26333 (21090905) 487646.96
3626904.52 88.91824 (21090905)
487666.96 3626904.52 92.92127 (20122119) 487686.96
3626904.52 96.70480 (20122119)
487706.96 3626904.52 98.76508 (20122119) 487726.96
3626904.52 103.93707 (19121406)
487746.96 3626904.52 111.15930 (19121406) 487766.96
3626904.52 117.22486 (19121406)
487626.96 3626924.52 87.00051 (20122119) 487646.96
3626924.52 90.91334 (20122119)
487666.96 3626924.52 93.79728 (20122119) 487686.96
3626924.52 96.48260 (19121406)
487706.96 3626924.52 102.60316 (19121406) 487726.96
3626924.52 108.07481 (19121406)
487746.96 3626924.52 112.08587 (19020306) 487646.96
3626944.52 88.87505 (19083006)
487666.96 3626944.52 94.78199 (19121406) 487686.96
3626944.52 99.87730 (19121406)
487706.96 3626944.52 104.08400 (19121406) 487726.96
3626944.52 111.39479 (19020306)
487666.96 3626964.52 96.07804 (19121406) 487686.96
3626964.52 101.28886 (19020306)
487706.96 3626964.52 108.34926 (19020306) 487686.96
3626984.52 106.13088 (19120404)
488242.19 3625436.42 45.21656 (19032623) 488262.19
3625436.42 45.54911 (19032623)
488242.19 3625456.42 46.25033 (19032623) 488262.19
3625456.42 46.36244 (19032623)
488282.19 3625456.42 42.16746 (21080305) 488302.19
3625456.42 42.84118 (19110723)

488322.19 3625456.42 43.35128 (19110723) 488242.19
3625476.42 47.31148 (19032623)
488262.19 3625476.42 47.18507 (19032623) 488282.19
3625476.42 43.24065 (21080305)
488302.19 3625476.42 43.98337 (19110723) 488322.19
3625476.42 44.15139 (19110723)
488342.19 3625476.42 43.45678 (20091122) 488362.19
3625476.42 48.95862 (19080704)
488242.19 3625496.42 48.40080 (19032623) 488262.19
3625496.42 48.01396 (19032623)
488282.19 3625496.42 44.33839 (21080305) 488302.19
3625496.42 45.12801 (19110723)
488322.19 3625496.42 44.91927 (19110723) 488342.19
3625496.42 45.11188 (19080704)
488362.19 3625496.42 50.47978 (19080704) 488382.19
3625496.42 50.54332 (19080704)
488402.19 3625496.42 45.24039 (19080704) 488422.19
3625496.42 45.22246 (20070402)
488242.19 3625516.42 49.52116 (19032623) 488262.19
3625516.42 48.85072 (19032623)
488282.19 3625516.42 45.46774 (21080305) 488302.19
3625516.42 46.30431 (19110723)

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC (YYMMDDHH) X-COORD (M) Y-COORD (M) CONC (YYMMDDHH)
- -
488322.19 3625516.42 45.68370 (19110723) 488342.19
3625516.42 47.13593 (19080704)
488362.19 3625516.42 51.93858 (19080704) 488382.19

3625516.42 51.08021 (19080704)
488402.19 3625516.42 46.30331 (20070402) 488422.19
3625516.42 45.78200 (20070402)
488442.19 3625516.42 43.51827 (20060224) 488462.19
3625516.42 44.85761 (20021420)
488482.19 3625516.42 45.25496 (21082705) 488222.19
3625536.42 46.42846 (19032623)
488242.19 3625536.42 50.66983 (19032623) 488262.19
3625536.42 49.69340 (19032623)
488282.19 3625536.42 46.62483 (21080305) 488302.19
3625536.42 47.50184 (19110723)
488322.19 3625536.42 46.73784 (20091122) 488342.19
3625536.42 49.16954 (19080704)
488362.19 3625536.42 53.31449 (19080704) 488382.19
3625536.42 51.46237 (19080704)
488402.19 3625536.42 47.63183 (20070402) 488422.19
3625536.42 46.17406 (20070402)
488442.19 3625536.42 44.77548 (20060224) 488462.19
3625536.42 46.26274 (20021420)
488482.19 3625536.42 46.76497 (21082705) 488502.19
3625536.42 48.39921 (21110719)
488522.19 3625536.42 50.72851 (19052822) 488542.19
3625536.42 50.06651 (19052822)
488222.19 3625556.42 47.69974 (19032623) 488242.19
3625556.42 51.84568 (19032623)
488262.19 3625556.42 50.53883 (19032623) 488282.19
3625556.42 47.79590 (21080305)
488302.19 3625556.42 48.68975 (19110723) 488322.19
3625556.42 47.91191 (20091122)
488342.19 3625556.42 51.20372 (19080704) 488362.19
3625556.42 54.59442 (19080704)
488382.19 3625556.42 51.68108 (19080704) 488402.19
3625556.42 48.79415 (20070402)
488422.19 3625556.42 46.34735 (20070402) 488442.19
3625556.42 45.84485 (20060224)
488462.19 3625556.42 47.45048 (20021420) 488482.19
3625556.42 47.98817 (21082705)
488502.19 3625556.42 49.73447 (21110719) 488522.19
3625556.42 52.25654 (19052822)
488542.19 3625556.42 49.90729 (19052822) 488562.19
3625556.42 47.21400 (19101221)
488202.19 3625576.42 48.78459 (20091504) 488222.19
3625576.42 49.00161 (19032623)
488242.19 3625576.42 53.04731 (19032623) 488262.19
3625576.42 51.38674 (19032623)
488282.19 3625576.42 48.98464 (21080305) 488302.19
3625576.42 49.88582 (19110723)
488322.19 3625576.42 49.07572 (20091122) 488342.19
3625576.42 53.22631 (19080704)
488362.19 3625576.42 55.76282 (19080704) 488382.19

3625576.42   51.72314 (19080704)
        488402.19   3625576.42   49.82269 (20070402)   488422.19
3625576.42   47.08594 (21122219)
        488442.19   3625576.42   47.22208 (20021420)   488462.19
3625576.42   48.38670 (20021420)
        488482.19   3625576.42   49.49145 (21110719)   488502.19
3625576.42   51.78837 (19052822)
        488522.19   3625576.42   53.32376 (19052822)   488542.19
3625576.42   49.20967 (19052822)
        488562.19   3625576.42   48.33669 (19101221)   488582.19
3625576.42   48.50827 (20011720)
        488122.19   3625596.42   50.22831 (21102122)   488142.19
3625596.42   50.20195 (19082103)
        488162.19   3625596.42   50.73139 (20113019)   488182.19
3625596.42   50.79120 (20113019)
        488202.19   3625596.42   49.97761 (20091504)   488222.19
3625596.42   50.33707 (19032623)
        488242.19   3625596.42   54.27566 (19032623)   488262.19
3625596.42   52.23809 (19032623)
        488282.19   3625596.42   50.19024 (21080305)   488302.19
3625596.42   51.08588 (19110723)
        488322.19   3625596.42   50.22393 (20091122)   488342.19
3625596.42   55.22007 (19080704)
        488362.19   3625596.42   56.80105 (19080704)   488382.19
3625596.42   51.57573 (19080704)
        488402.19   3625596.42   50.68491 (20070402)   488422.19
3625596.42   47.87504 (21122219)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK   ***
INCLUDING SOURCE(S):   L0000013   , L0000014   , L0000015   , L0000016   ,   L0000017   ,
L0000018   , L0000019   , L0000020   , L0000021   , L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)

- -
488522.19 3625596.42 53.86458 (19052822) 488542.19
3625596.42 49.14425 (19101221)
488562.19 3625596.42 49.15675 (20011720) 488582.19
3625596.42 49.17707 (20011720)
488602.19 3625596.42 48.70339 (20060721) 488062.19
3625616.42 50.06833 (20090823)
488082.19 3625616.42 50.90255 (20021323) 488102.19
3625616.42 49.81087 (21102122)
488122.19 3625616.42 51.41031 (21102122) 488142.19
3625616.42 51.23407 (19082103)
488162.19 3625616.42 51.91575 (19082103) 488182.19
3625616.42 52.03637 (20113019)
488202.19 3625616.42 51.18414 (20091504) 488222.19
3625616.42 51.71896 (19032623)
488242.19 3625616.42 55.53682 (19032623) 488262.19
3625616.42 53.09518 (19032623)
488282.19 3625616.42 51.41136 (21080305) 488302.19
3625616.42 52.27047 (19110723)
488322.19 3625616.42 51.34419 (20091122) 488342.19
3625616.42 57.16946 (19080704)
488362.19 3625616.42 57.68699 (19080704) 488382.19
3625616.42 51.78504 (20070402)
488402.19 3625616.42 51.24945 (20070402) 488522.19
3625616.42 53.81713 (19052822)
488542.19 3625616.42 50.84545 (19101221) 488562.19
3625616.42 50.95484 (20011720)
488582.19 3625616.42 50.26374 (20060721) 488602.19
3625616.42 48.76986 (20060721)
488062.19 3625636.42 51.08997 (20090823) 488082.19
3625636.42 51.98560 (20021323)
488102.19 3625636.42 50.58218 (21102122) 488122.19
3625636.42 52.61062 (21102122)
488142.19 3625636.42 52.28634 (19082103) 488162.19
3625636.42 53.19316 (19082103)
488182.19 3625636.42 53.31576 (20113019) 488202.19
3625636.42 52.41498 (20091504)
488222.19 3625636.42 53.15011 (19032623) 488242.19
3625636.42 56.83174 (19032623)
488262.19 3625636.42 53.95630 (19032623) 488282.19
3625636.42 52.65179 (21080305)
488302.19 3625636.42 53.45256 (19110723) 488322.19
3625636.42 52.47039 (19080704)
488342.19 3625636.42 59.05627 (19080704) 488362.19
3625636.42 58.40268 (19080704)
488382.19 3625636.42 53.40473 (20070402) 488522.19
3625636.42 53.14123 (19052822)
488542.19 3625636.42 52.08107 (19101221) 488562.19
3625636.42 52.19421 (20011720)

488582.19   3625636.42   51.44273 (20060721)   488602.19
3625636.42   49.49726 (20081905)
488622.19   3625636.42   49.26012 (21082623)   488062.19
3625656.42   52.04569 (20090823)
488082.19   3625656.42   53.04262 (20021323)   488102.19
3625656.42   51.68187 (20021323)
488122.19   3625656.42   53.82470 (21102122)   488142.19
3625656.42   53.38514 (19100801)
488162.19   3625656.42   54.50926 (19082103)   488182.19
3625656.42   54.63438 (20113019)
488202.19   3625656.42   53.67928 (20091504)   488222.19
3625656.42   54.63601 (19032623)
488242.19   3625656.42   58.16263 (19032623)   488262.19
3625656.42   54.82026 (19032623)
488282.19   3625656.42   53.95794 (19110723)   488302.19
3625656.42   54.62771 (19110723)
488322.19   3625656.42   55.04513 (19080704)   488342.19
3625656.42   60.85935 (19080704)
488362.19   3625656.42   58.92787 (19080704)   488382.19
3625656.42   54.87443 (20070402)
488522.19   3625656.42   53.07723 (19101221)   488542.19
3625656.42   53.22106 (20011720)
488582.19   3625656.42   51.93281 (20060721)   488602.19
3625656.42   50.31814 (21082623)
488622.19   3625656.42   50.65516 (19100803)   488642.19
3625656.42   55.70386 (20102522)
488062.19   3625676.42   53.00808 (20090823)   488082.19
3625676.42   54.07013 (20021323)
488102.19   3625676.42   53.23515 (20021323)   488122.19
3625676.42   55.05118 (21102122)
488142.19   3625676.42   54.50941 (19100801)   488162.19
3625676.42   55.86461 (19082103)

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK   ***
INCLUDING SOURCE(S):   L0000013   , L0000014   , L0000015   , L0000016   ,   L0000017   ,
L0000018   , L0000019   , L0000020   , L0000021   , L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488182.19	3625676.42	56.00074	(20113019)	488202.19	3625676.42	54.99390	(20091504)
488222.19	3625676.42	56.17977	(19032623)	488242.19	3625676.42	59.52911	(19032623)
488262.19	3625676.42	55.68379	(19032623)	488282.19	3625676.42	55.66404	(19110723)
488302.19	3625676.42	55.78554	(19110723)	488322.19	3625676.42	57.64694	(19080704)
488342.19	3625676.42	62.55425	(19080704)	488362.19	3625676.42	59.24126	(19080704)
488382.19	3625676.42	56.17638	(20070402)	488582.19	3625676.42	52.23224	(20081905)
488602.19	3625676.42	51.99545	(21082623)	488622.19	3625676.42	54.55821	(20102522)
488642.19	3625676.42	57.85926	(20102522)	488062.19	3625696.42	54.26112	(20021423)
488082.19	3625696.42	55.06524	(20021323)	488102.19	3625696.42	54.80487	(20021323)
488122.19	3625696.42	56.29251	(21102122)	488142.19	3625696.42	55.77699	(20111220)
488162.19	3625696.42	57.28194	(19100801)	488182.19	3625696.42	57.42186	(20113019)
488202.19	3625696.42	56.35545	(20091504)	488222.19	3625696.42	57.78478	(19032623)
488242.19	3625696.42	60.93382	(19032623)	488262.19	3625696.42	56.54719	(19032623)
488282.19	3625696.42	57.39917	(19110723)	488302.19	3625696.42	56.91184	(19110723)
488322.19	3625696.42	60.25974	(19080704)	488342.19	3625696.42	64.11600	(19080704)
488362.19	3625696.42	59.32342	(19080704)	488382.19	3625696.42	57.25366	(20070402)
488582.19	3625696.42	53.17255	(20081905)	488602.19	3625696.42	53.22423	(19100803)
488622.19	3625696.42	58.27412	(20102522)	488642.19	3625696.42	58.71496	(20102522)
488662.19	3625696.42	56.97254	(19082901)	488042.19	3625716.42	54.51461	(19111203)
488142.19	3625716.42	57.17870	(20111220)	488162.19	3625716.42	58.76295	(19100801)
488182.19	3625716.42	58.90281	(20113019)	488202.19	3625716.42	57.77001	(20091504)
488222.19	3625716.42	59.45454	(19032623)	488242.19			

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3625716.42       62.37831  (19032623)
        488262.19   3625716.42       57.73564  (21080305)                488282.19
3625716.42       59.15586  (19110723)
        488302.19   3625716.42       58.55234  (20091122)                488322.19
3625716.42       62.86416  (19080704)
        488342.19   3625716.42       65.51726  (19080704)                488362.19
3625716.42       59.15521  (19080704)
        488382.19   3625716.42       58.07283  (20070402)                488602.19
3625716.42       56.73516  (20102522)
        488622.19   3625716.42       60.83752  (20102522)                488642.19
3625716.42       58.12878  (20102522)
        488662.19   3625716.42       59.61337  (19082901)                488682.19
3625716.42       57.18076  (19082901)
        488022.19   3625736.42       55.44285  (20111904)                488042.19
3625736.42       55.62598  (19111203)
        488182.19   3625736.42       60.44327  (20113019)                488202.19
3625736.42       59.24480  (20091504)
        488222.19   3625736.42       61.18988  (19032623)                488242.19
3625736.42       63.85973  (19032623)
        488262.19   3625736.42       59.55859  (21080305)                488282.19
3625736.42       60.97010  (19110723)
        488302.19   3625736.42       60.24883  (20091122)                488322.19
3625736.42       65.43741  (19080704)
        488362.19   3625736.42       60.38141  (20070402)                488382.19
3625736.42       58.61711  (20070402)
        488402.19   3625736.42       57.03248  (20021420)                488602.19
3625736.42       61.00756  (20102522)
        488622.19   3625736.42       61.98884  (20102522)                488642.19
3625736.42       59.99868  (19082901)
        488662.19   3625736.42       60.68804  (19082901)                488682.19
3625736.42       55.02456  (19082901)
        488702.19   3625736.42       53.34535  (21103121)                488002.19
3625756.42       55.86344  (19110122)
        488022.19   3625756.42       57.01092  (20111904)                488182.19
3625756.42       62.04799  (20113019)
        488202.19   3625756.42       60.77683  (20091504)                488222.19
3625756.42       62.99640  (19032623)
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                                      *** THE   1ST HIGHEST  1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP:  TRUCK    ***
                                          INCLUDING SOURCE(S):     L0000013    , L0000014
, L0000015    , L0000016   ,   L0000017    ,
                 L0000018    , L0000019    , L0000020    , L0000021    , L0000022
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, L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488242.19	3625756.42	65.38125	(19032623)	488262.19	3625756.42	61.43608	(21080305)
488282.19	3625756.42	62.80123	(19110723)	488382.19	3625756.42	59.24789	(20072602)
488602.19	3625756.42	64.05471	(20102522)	488622.19	3625756.42	61.54782	(20102522)
488642.19	3625756.42	62.84123	(19082901)	488662.19	3625756.42	60.00938	(19082901)
488682.19	3625756.42	55.18472	(21103121)	488702.19	3625756.42	53.65151	(21042721)
487982.19	3625776.42	56.99242	(21120123)	488002.19	3625776.42	57.06288	(19110122)
488222.19	3625776.42	64.87918	(19032623)	488242.19	3625776.42	66.94511	(19032623)
488262.19	3625776.42	63.35500	(21080305)	488622.19	3625776.42	63.31768	(19082901)
488642.19	3625776.42	63.93920	(19082901)	488662.19	3625776.42	57.53504	(19082901)
488682.19	3625776.42	56.10630	(21103121)	488702.19	3625776.42	54.62906	(21042721)
488722.19	3625776.42	54.24266	(19100221)	487982.19	3625796.42	57.77668	(21120123)
488222.19	3625796.42	66.84075	(19032623)	488242.19	3625796.42	68.54954	(19032623)
488262.19	3625796.42	65.32636	(21080305)	488622.19	3625796.42	66.38339	(19082901)
488642.19	3625796.42	63.08391	(19082901)	488662.19	3625796.42	58.37325	(21103121)
488682.19	3625796.42	56.85681	(21042721)	488702.19	3625796.42	55.00423	(21091802)
488722.19	3625796.42	56.56447	(19100221)	488742.19	3625796.42	57.78276	(21081502)
488222.19	3625816.42	68.88583	(19032623)	488242.19	3625816.42	70.19568	(19032623)
488262.19	3625816.42	67.33663	(21080305)	488642.19	3625816.42	60.23670	(19082901)
488662.19	3625816.42	59.01489	(21103121)	488682.19	3625816.42	57.44155	(21042721)

488702.19   3625816.42   57.97078 (19100221)   488722.19
3625816.42   59.07454 (21081502)
488742.19   3625816.42   58.32160 (21081502)   488762.19
3625816.42   54.46518 (19032804)
488202.19   3625836.42   67.56984 (21011221)   488222.19
3625836.42   71.02013 (19032623)
488242.19   3625836.42   71.88497 (19032623)   488662.19
3625836.42   60.21422 (21042721)
488682.19   3625836.42   58.64988 (19100221)   488702.19
3625836.42   59.72362 (19100221)
488722.19   3625836.42   60.91203 (21081502)   488742.19
3625836.42   56.78231 (19032804)
488762.19   3625836.42   55.49905 (20071101)   488782.19
3625836.42   56.37033 (20112002)
488202.19   3625856.42   69.61113 (21011221)   488222.19
3625856.42   73.24427 (19032623)
488242.19   3625856.42   73.61481 (19032623)   488682.19
3625856.42   61.78805 (19100221)
488702.19   3625856.42   62.95938 (21081502)   488722.19
3625856.42   60.33752 (21081502)
488742.19   3625856.42   57.47674 (20071101)   488762.19
3625856.42   58.06777 (20112002)
488782.19   3625856.42   56.45184 (19100520)   488802.19
3625856.42   54.97512 (19100520)
488822.19   3625856.42   53.83657 (19101421)   488202.19
3625876.42   71.78224 (21011221)
488222.19   3625876.42   75.56437 (19032623)   488662.19
3625876.42   63.10169 (19100221)
488682.19   3625876.42   64.32990 (21081502)   488702.19
3625876.42   63.75053 (21081502)
488722.19   3625876.42   59.54144 (19032804)   488742.19
3625876.42   59.47659 (20112002)
488762.19   3625876.42   58.85423 (20112002)   488782.19
3625876.42   57.42504 (19100520)
488802.19   3625876.42   56.03360 (19101421)   488822.19
3625876.42   53.48068 (20100520)
488842.19   3625876.42   52.20994 (20071102)   488202.19
3625896.42   74.10978 (21011221)
488222.19   3625896.42   77.98501 (19032623)   488642.19
3625896.42   63.57921 (21091802)
488662.19   3625896.42   65.62929 (19100221)   488682.19
3625896.42   66.68029 (21081502)

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488702.19	3625896.42	62.28761	(19032804)	488722.19	3625896.42	60.97441	(20071101)
488742.19	3625896.42	61.32393	(20112002)	488762.19	3625896.42	59.78982	(19100520)
488782.19	3625896.42	58.18182	(19101421)	488802.19	3625896.42	55.48863	(20100520)
488822.19	3625896.42	53.64652	(21110505)	488842.19	3625896.42	54.95302	(20071102)
488862.19	3625896.42	53.21857	(20081323)	488882.19	3625896.42	52.02980	(20081323)
488902.19	3625896.42	51.17202	(20021319)	488202.19	3625916.42	76.50034	(21011221)
488222.19	3625916.42	80.51630	(19032623)	488642.19	3625916.42	67.72910	(19100221)
488662.19	3625916.42	68.96289	(21081502)	488682.19	3625916.42	66.15899	(21081502)
488702.19	3625916.42	63.46596	(20071101)	488762.19	3625916.42	60.24719	(19101421)
488782.19	3625916.42	57.56518	(19101421)	488802.19	3625916.42	55.43179	(21110505)
488822.19	3625916.42	56.71924	(20071102)	488842.19	3625916.42	55.24111	(20071102)
488862.19	3625916.42	53.97498	(20081323)	488882.19	3625916.42	52.89758	(20021319)
488902.19	3625916.42	52.09765	(19101420)	488922.19	3625916.42	50.88009	(19042003)
488942.19	3625916.42	52.27684	(19042003)	488222.19	3625936.42	83.16704	(19032623)
488622.19	3625936.42	68.89613	(19100221)	488642.19	3625936.42	70.42647	(21081502)
488662.19	3625936.42	70.09323	(21081502)	488682.19	3625936.42	65.65351	(20071101)
488782.19	3625936.42	57.79158	(20100520)	488802.19			

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3625936.42       58.51237  (20071102)
        488822.19   3625936.42       57.42269  (20071102)                488842.19
3625936.42       56.02240  (20081323)
        488862.19   3625936.42       54.71814  (19092021)                488882.19
3625936.42       53.87929  (19101420)
        488902.19   3625936.42       52.64789  (19042003)                488922.19
3625936.42       54.04076  (19042003)
        488942.19   3625936.42       52.96369  (19042003)                488962.19
3625936.42       49.80546  (20041924)
        488982.19   3625936.42       48.23048  (21091202)                489002.19
3625936.42       46.87006  (19082501)
        488602.19   3625956.42       71.30703  (21042721)                488622.19
3625956.42       72.47258  (19100221)
        488642.19   3625956.42       73.45091  (21081502)                488662.19
3625956.42       68.69659  (19032804)
        488782.19   3625956.42       60.31951  (20071102)                488802.19
3625956.42       59.68682  (20071102)
        488822.19   3625956.42       58.18461  (20081323)                488842.19
3625956.42       56.72245  (19092021)
        488862.19   3625956.42       55.76310  (19101420)                488882.19
3625956.42       54.52083  (19042003)
        488902.19   3625956.42       55.90171  (19042003)                488922.19
3625956.42       54.65364  (19042003)
        488942.19   3625956.42       51.38782  (20041924)                488962.19
3625956.42       49.75878  (21091202)
        488982.19   3625956.42       48.46847  (19082501)                489002.19
3625956.42       48.04380  (21070304)
        489022.19   3625956.42       47.83441  (21070304)                489042.19
3625956.42       46.02949  (21070304)
        489062.19   3625956.42       45.66928  (19030322)                489082.19
3625956.42       45.73933  (19030322)
        488622.19   3625976.42       76.01545  (21081502)                488802.19
3625976.42       60.46400  (20081323)
        488822.19   3625976.42       58.83863  (19092021)                488842.19
3625976.42       57.73696  (19101420)
        488862.19   3625976.42       56.50067  (19042003)                488882.19
3625976.42       57.86030  (19042003)
        488902.19   3625976.42       56.42026  (19042003)                488922.19
3625976.42       53.03999  (20041924)
        488942.19   3625976.42       51.34445  (21091202)                488962.19
3625976.42       50.11357  (19082501)
        488982.19   3625976.42       49.79197  (21070304)                489002.19
3625976.42       49.22190  (21070304)
        489022.19   3625976.42       47.12317  (20101020)                489042.19
3625976.42       47.27295  (19030322)
        489062.19   3625976.42       46.88994  (19030322)                489082.19
3625976.42       44.96964  (19030322)
```

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014 , L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
489102.19	3625976.42	43.18615	(21020920)	489122.19	3625976.42	42.90556	(21020920)
488802.19	3625996.42	61.06373	(19092021)	488822.19	3625996.42	59.82812	(19101420)
488842.19	3625996.42	58.60552	(19042003)	488922.19	3625996.42	52.96284	(21091202)
488942.19	3625996.42	51.80255	(19082501)	488962.19	3625996.42	51.57385	(21070304)
488982.19	3625996.42	50.60556	(21070304)	489002.19	3625996.42	48.60026	(20101020)
489022.19	3625996.42	48.83259	(19030322)	489042.19	3625996.42	47.95111	(19030322)
489062.19	3625996.42	45.51439	(19030322)	489082.19	3625996.42	44.75002	(21020920)
489102.19	3625996.42	44.04494	(21020920)	489122.19	3625996.42	43.59119	(20062624)
489142.19	3625996.42	42.64154	(20062624)	488802.19	3626016.42	62.03268	(19101420)
488822.19	3626016.42	60.87511	(19042003)	488842.19	3626016.42	62.14575	(19042003)
488982.19	3626016.42	50.04907	(20101020)	489002.19	3626016.42	50.33402	(19030322)
489022.19	3626016.42	48.91127	(19030322)	489042.19	3626016.42	46.57674	(20012621)
489062.19	3626016.42	46.23417	(21020920)	489082.19	3626016.42	45.24375	(20062624)
489102.19	3626016.42	44.84727	(20062624)	489122.19	3626016.42	43.40017	(20062624)

489142.19 3626016.42 42.53964 (19050724) 488782.19
3626036.42 64.36148 (19101420)
488802.19 3626036.42 63.25993 (19042003) 488822.19
3626036.42 64.52415 (19042003)
488842.19 3626036.42 62.33348 (19042003) 489042.19
3626036.42 47.62050 (21020920)
489062.19 3626036.42 46.87261 (20062624) 489082.19
3626036.42 45.94499 (20062624)
489102.19 3626036.42 43.97072 (20062624) 489122.19
3626036.42 44.27490 (19050724)
489142.19 3626036.42 44.05269 (19050724) 488782.19
3626056.42 65.76550 (19042003)
488802.19 3626056.42 66.99878 (19042003) 488822.19
3626056.42 64.56023 (19042003)
488842.19 3626056.42 60.45689 (20041924) 489042.19
3626056.42 48.35308 (20062624)
489062.19 3626056.42 46.86842 (20062624) 489082.19
3626056.42 45.48890 (19050724)
489102.19 3626056.42 45.78483 (19050724) 489122.19
3626056.42 45.15542 (19042005)
489142.19 3626056.42 44.99957 (19042005) 489162.19
3626056.42 43.93149 (19042005)
488782.19 3626076.42 69.55176 (19042003) 488802.19
3626076.42 66.86560 (19042003)
488822.19 3626076.42 62.54595 (20041924) 488842.19
3626076.42 60.27612 (19082501)
488862.19 3626076.42 59.56987 (21070304) 489062.19
3626076.42 47.37116 (19050724)
489082.19 3626076.42 47.02746 (19050724) 489102.19
3626076.42 46.89631 (19042005)
489122.19 3626076.42 46.13067 (19042005) 489142.19
3626076.42 44.47035 (19042005)
489162.19 3626076.42 42.85692 (20041204) 488782.19
3626096.42 69.20432 (19042003)
488802.19 3626096.42 64.69558 (20041924) 488822.19
3626096.42 62.65446 (19082501)
488842.19 3626096.42 61.95659 (21070304) 488862.19
3626096.42 60.70569 (21070304)
489062.19 3626096.42 48.77119 (19042005) 489082.19
3626096.42 48.36538 (19042005)
489102.19 3626096.42 46.94575 (19042005) 489122.19
3626096.42 44.77355 (20041204)
489142.19 3626096.42 43.60880 (20031420) 489162.19
3626096.42 42.94892 (20031420)
488782.19 3626116.42 66.92287 (20041924) 488802.19
3626116.42 65.10208 (19082501)
488822.19 3626116.42 64.37311 (21070304) 488842.19
3626116.42 62.51844 (21070304)
488862.19 3626116.42 60.14842 (20101020) 489062.19
3626116.42 49.48961 (19042005)

489082.19 3626116.42 47.40081 (19042005) 489102.19
3626116.42 45.57769 (20120918)

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: TRUCK ***
INCLUDING SOURCE(S): L0000013 , L0000014
, L0000015 , L0000016 , L0000017 ,
L0000018 , L0000019 , L0000020 , L0000021 , L0000022
, L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS
***

** CONC OF PM_10 IN MICROGRAMS/M**3
**

X-COORD (M) Y-COORD (M) CONC (YYMMDDHH) X-COORD (M)
Y-COORD (M) CONC (YYMMDDHH)
- -
- -
489122.19 3626116.42 44.94320 (20031420) 489142.19
3626116.42 43.68604 (20031420)
489162.19 3626116.42 41.78109 (20031420) 489182.19
3626116.42 40.79524 (20090222)
488782.19 3626136.42 67.62152 (19082501) 488802.19
3626136.42 66.81823 (21070304)
488822.19 3626136.42 64.28579 (21070304) 488842.19
3626136.42 62.06477 (19030322)
488862.19 3626136.42 60.72809 (19030322) 489082.19
3626136.42 47.01518 (20031420)
489102.19 3626136.42 45.88837 (20031420) 489122.19
3626136.42 44.01603 (20031420)
489142.19 3626136.42 42.59464 (20090222) 489162.19
3626136.42 42.13298 (20090222)
489182.19 3626136.42 41.10388 (20090222) 488782.19
3626156.42 69.28739 (21070304)
488802.19 3626156.42 66.46988 (20101020) 488822.19
3626156.42 64.31311 (19030322)
488842.19 3626156.42 62.14434 (19030322) 488862.19
3626156.42 61.29918 (21020920)
488882.19 3626156.42 59.97685 (21020920) 489102.19
3626156.42 44.51591 (20090222)
489122.19 3626156.42 44.08687 (20090222) 489142.19

3626156.42 43.04226 (20090222)
489162.19 3626156.42 41.62459 (20072623) 489182.19
3626156.42 41.58434 (19050723)
488782.19 3626176.42 68.88936 (20101020) 488802.19
3626176.42 66.45528 (19030322)
488822.19 3626176.42 64.48676 (20071024) 488842.19
3626176.42 63.71591 (21020920)
488862.19 3626176.42 61.86532 (21073002) 488882.19
3626176.42 60.32888 (20062624)
489122.19 3626176.42 43.50226 (20090222) 489142.19
3626176.42 43.24033 (19050723)
489162.19 3626176.42 43.10518 (19050723) 489182.19
3626176.42 42.38447 (19050723)
488782.19 3626196.42 68.47406 (19030322) 488802.19
3626196.42 66.94817 (21020920)
488822.19 3626196.42 65.95930 (21020920) 488842.19
3626196.42 64.16554 (21073002)
488862.19 3626196.42 61.66591 (21073002) 488882.19
3626196.42 59.14714 (19050724)
488902.19 3626196.42 59.90911 (19042005) 489142.19
3626196.42 44.03326 (19050723)
489162.19 3626196.42 43.31538 (19042004) 489182.19
3626196.42 42.17836 (19042004)
489202.19 3626196.42 40.66492 (19042004) 488782.19
3626216.42 69.93707 (21020920)
488802.19 3626216.42 67.98359 (21020920) 488822.19
3626216.42 66.19798 (21073002)
488842.19 3626216.42 63.20182 (20102322) 488862.19
3626216.42 62.38017 (19042005)
488882.19 3626216.42 62.37347 (19042005) 488902.19
3626216.42 60.80938 (19042005)
489142.19 3626216.42 44.05159 (19042004) 489162.19
3626216.42 42.36850 (19042004)
489182.19 3626216.42 40.96704 (21071622) 489202.19
3626216.42 40.21201 (21100604)
489222.19 3626216.42 39.65405 (21100604) 489242.19
3626216.42 38.78558 (21100604)
489262.19 3626216.42 37.69659 (21072324) 488782.19
3626236.42 70.53825 (21073002)
488802.19 3626236.42 67.91551 (21073002) 488822.19
3626236.42 65.01578 (20102322)
488842.19 3626236.42 65.43168 (19042005) 488862.19
3626236.42 64.38045 (19042005)
488882.19 3626236.42 61.79112 (19042005) 488902.19
3626236.42 59.08757 (20120918)
489142.19 3626236.42 42.71331 (21071622) 489162.19
3626236.42 42.09761 (21100604)
489182.19 3626236.42 41.35163 (21100604) 489202.19
3626236.42 40.28227 (21100604)
489222.19 3626236.42 39.27933 (21072324) 489242.19

3626236.42   38.50502 (21072324)
        489262.19   3626236.42   38.16770 (19092701)   488782.19
3626256.42   69.73259 (20102322)
        488802.19   3626256.42   68.48117 (19042005)   488822.19
3626256.42   68.02019 (19042005)
        488842.19   3626256.42   65.85857 (19042005)   488862.19
3626256.42   62.76855 (20120918)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK   ***
INCLUDING SOURCE(S):   L0000013   , L0000014   , L0000015   , L0000016   ,   L0000017   ,
L0000018   , L0000019   , L0000020   , L0000021   , L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488882.19	3626256.42	60.72614	(19080723)	488902.19	3626256.42	58.40079	(19080723)
488922.19	3626256.42	56.31923	(20090222)	489142.19	3626256.42	43.11919	(21100604)
489162.19	3626256.42	41.76014	(21100604)	489222.19	3626256.42	39.86898	(19092701)
489242.19	3626256.42	39.10339	(19092701)	489262.19	3626256.42	38.26870	(19060822)
488882.19	3626276.42	59.50213	(19083123)	488902.19	3626276.42	58.30708	(20090222)
488922.19	3626276.42	56.29886	(20090222)	489142.19	3626276.42	42.73039	(19092701)
489162.19	3626276.42	42.14116	(19092701)	489242.19	3626276.42	39.24980	(19060822)
489262.19	3626276.42	38.29555	(19060822)	488882.19	3626296.42	59.59306	(20090222)
488902.19	3626296.42	57.62612	(19042004)	489262.19	3626296.42	38.13364	(20072422)

489282.19 3626296.42 37.46177 (19050722) 488902.19
3626316.42 59.78557 (19042004)
489282.19 3626316.42 37.03614 (19050722) 489302.19
3626316.42 36.37381 (20081822)
488902.19 3626336.42 58.49566 (19042004) 488922.19
3626336.42 55.54843 (21062024)
489302.19 3626336.42 36.71597 (21070101) 489322.19
3626336.42 36.02611 (21070101)
488922.19 3626356.42 55.32868 (21062024) 488942.19
3626356.42 53.91829 (19092701)
489322.19 3626356.42 36.09890 (19073123) 488942.19
3626376.42 54.15289 (19060822)
488962.19 3626376.42 53.00349 (19060822) 489322.19
3626376.42 36.29693 (19072303)
489342.19 3626376.42 35.52870 (19072303) 488962.19
3626396.42 52.55981 (19083024)
489322.19 3626396.42 36.07967 (19043020) 489342.19
3626396.42 35.38113 (19043020)
489342.19 3626416.42 35.08867 (19013019) 489342.19
3626436.42 34.85683 (21062324)
488086.20 3626768.13 244.42559 (21011618) 488077.21
3626746.82 207.02834 (19120716)
488075.79 3626778.08 247.48788 (21011618) 488002.86
3626694.73 152.92249 (19042203)
487535.35 3626865.62 76.58599 (21020701) 487693.75
3626992.77 112.82472 (19120404)
487795.04 3626883.94 125.24713 (19121406) 487871.55
3626830.06 149.23528 (19121406)
487958.83 3626811.74 212.86871 (19120404) 488041.80
3626794.50 331.09443 (19120405)
488094.61 3626765.41 526.95129 (19120716) 488046.12
3626714.76 242.11333 (19121406)
488007.32 3626665.19 173.41994 (21112423) 487941.59
3626599.46 131.07287 (21012122)
487911.42 3626574.68 129.29372 (20122123) 487815.52
3626540.19 93.67472 (19040823)
487709.91 3626504.63 63.12035 (19021102) 487555.82
3626439.98 55.93988 (19021102)
487490.09 3626487.39 59.54679 (20122123) 487428.67
3626556.36 62.47787 (20122123)
487358.63 3626713.68 60.09494 (20012319) 487522.42
3626827.90 72.41361 (21120107)
488235.45 3625424.52 43.52367 (19032623) 488562.08
3625540.85 46.05571 (19101221)
488747.03 3625794.41 57.54928 (21081502) 488857.40
3625879.42 53.50957 (20071102)
489054.28 3625949.52 45.03843 (20101020) 489134.82
3625964.44 42.15904 (21020920)
489178.07 3626085.25 42.18546 (20031420) 489203.43
3626198.60 40.35694 (19042004)

489260.10   3626203.08   38.17011 (21100604)   489276.51
3626217.99   37.29153 (21072324)
489267.56   3626265.72   38.31041 (19060822)   489336.17
3626346.26   35.57309 (19073123)
489361.53   3626432.77   34.23323 (21062324)   489331.70
3626449.18   35.50794 (20012420)
489309.32   3626361.18   36.43197 (19073123)   489258.61
3626298.53   38.20323 (20072422)
489190.00   3626228.43   40.97690 (21100604)   489149.73
3626317.92   42.52006 (19060822)
489130.34   3626250.81   43.55250 (21100604)   489137.80
3626216.50   44.36457 (19042004)

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: TRUCK   ***
INCLUDING SOURCE(S):   L0000013   , L0000014   , L0000015   , L0000016   ,   L0000017   ,
L0000018   , L0000019   , L0000020   , L0000021   , L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
489054.28	3626106.13	49.66467	(19042005)	489036.38	3626036.03	47.87994	(21020920)
488921.53	3625997.25	53.01401	(21091202)	488846.96	3625983.83	57.25953	(19101420)
488872.31	3626110.61	59.18212	(19030322)	488902.14	3626194.13	59.56013	(19042005)
488931.97	3626270.20	55.65961	(20090222)	488908.77	3626298.76	57.99170	(19042004)
488936.81	3626348.34	54.41039	(21100604)	488971.36	3626378.01	52.26277	(19060822)
488968.11	3626409.72	51.29885	(20083021)	488903.08	3626355.25	57.26086	(21062024)
488864.87	3626256.49	62.44182	(20120918)	488763.27			

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3626259.34       72.72499  (21073002)
        488787.87   3625962.95       61.11409  (20071102)                488735.67
3625906.27       62.18346  (20112002)
        488620.82   3625988.31       77.55216  (21081502)                488588.00
3625956.98       73.36641  (21042721)
        488671.53   3625861.52       61.69700  (19100221)                488629.77
3625813.79       65.74633  (19082901)
        488588.00   3625746.67       58.82332  (20102522)                488571.59
3625648.23       52.28686  (20060721)
        488516.41   3625666.13       53.76579  (19032522)                488522.37
3625581.11       53.48394  (19052822)
        488431.39   3625576.63       46.65595  (20060224)                488447.79
3625615.41       50.74719  (20021420)
        488388.13   3625616.90       52.26765  (20070402)                488398.57
3625706.40       54.91661  (20072602)
        488406.03   3625745.18       58.98741  (20021420)                488392.60
3625776.50       60.35320  (21091105)
        488350.84   3625722.81       63.99363  (19080704)                488279.24
3625769.05       63.81380  (19110723)
        488282.23   3625807.83       67.43546  (19110723)                488246.43
3625851.08       71.80500  (19032623)
        488230.02   3625946.54       85.29148  (19032623)                488188.26
3625924.17       77.76146  (20113019)
        488213.62   3625757.11       60.56509  (20091504)                488170.36
3625779.49       63.97026  (20113019)
        488170.36   3625733.25       60.38737  (20113019)                488077.88
3625697.45       54.89609  (20090823)
        487973.47   3625822.74       57.66801  (20030603)                487955.57
3625809.32       56.72137  (19111401)
        488058.49   3625678.06       53.15153  (20021423)                488057.00
3625618.40       49.87198  (20090823)
        488107.71   3625596.02       49.80288  (21102122)                488185.27
3625576.63       49.17179  (20113019)
        488228.53   3625528.90       47.82965  (19032623)                488233.01
3625482.66       46.15546  (19032623)
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                             *** THE   1ST HIGHEST  1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: ALL      ***
                                 INCLUDING SOURCE(S):     L0000001    , L0000002
, L0000003    , L0000004  ,   L0000005    ,
                 L0000006    , L0000007    , L0000008    , L0000009    , L0000010
, L0000011    , L0000012  ,   L0000013    ,
                 L0000014    , L0000015    , L0000016    , L0000017    , L0000018
```

, L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
487526.96	3626464.52	117.60127	(19021102)	487546.96	3626464.52	119.60297	(19021102)
487566.96	3626464.52	120.34618	(19021102)	487586.96	3626464.52	123.66473	(19021102)
487606.96	3626464.52	123.18454	(19021102)	487506.96	3626484.52	122.08606	(19040823)
487526.96	3626484.52	124.21736	(19040823)	487546.96	3626484.52	122.79874	(19040823)
487566.96	3626484.52	122.96483	(19040823)	487586.96	3626484.52	124.40175	(19040823)
487606.96	3626484.52	121.79697	(19040823)	487626.96	3626484.52	124.84846	(19021102)
487646.96	3626484.52	128.75654	(19021102)	487486.96	3626504.52	119.62938	(19040823)
487506.96	3626504.52	124.02312	(19040823)	487526.96	3626504.52	127.44817	(19040823)
487546.96	3626504.52	123.58102	(19040823)	487566.96	3626504.52	124.20125	(19040823)
487586.96	3626504.52	127.23966	(19040823)	487606.96	3626504.52	125.51410	(19040823)
487626.96	3626504.52	127.62837	(19040823)	487646.96	3626504.52	130.68412	(19040823)
487666.96	3626504.52	133.41082	(19040823)	487686.96	3626504.52	132.72075	(19021102)
487706.96	3626504.52	131.37178	(19021102)	487466.96	3626524.52	110.69851	(19040823)
487486.96	3626524.52	115.47309	(19040823)	487506.96	3626524.52	121.64340	(19040823)
487526.96	3626524.52	125.58937	(19040823)	487546.96	3626524.52	119.43822	(19040823)
487566.96	3626524.52	120.35698	(19040823)	487586.96	3626524.52	124.75959	(19040823)
487606.96	3626524.52	128.49651	(19040823)	487626.96	3626524.52	128.25097	(19040823)
487646.96	3626524.52	132.91440	(19040823)	487666.96	3626524.52	136.71286	(19040823)
487686.96	3626524.52	135.65101	(19040823)	487706.96			

3626524.52   137.92755 (19040823)
        487726.96   3626524.52   143.02108 (19040823)   487746.96
3626524.52   157.83934 (19040823)
        487766.96   3626524.52   164.94890 (19040823)   487446.96
3626544.52   112.92608 (19041421)
        487466.96   3626544.52   114.34198 (19041421)   487486.96
3626544.52   117.62827 (19041421)
        487506.96   3626544.52   120.17416 (19041421)   487526.96
3626544.52   116.54714 (19041421)
        487546.96   3626544.52   120.92806 (19040823)   487566.96
3626544.52   113.24529 (19040823)
        487586.96   3626544.52   118.88413 (19040823)   487606.96
3626544.52   129.20844 (19040823)
        487626.96   3626544.52   130.42149 (19040823)   487646.96
3626544.52   130.92754 (19040823)
        487666.96   3626544.52   135.54750 (19040823)   487686.96
3626544.52   135.76146 (19040823)
        487706.96   3626544.52   147.36694 (19040823)   487726.96
3626544.52   155.42155 (19040823)
        487746.96   3626544.52   162.97288 (19040823)   487766.96
3626544.52   170.95205 (19040823)
        487786.96   3626544.52   180.50068 (19040823)   487806.96
3626544.52   193.72516 (19040823)
        487826.96   3626544.52   196.42730 (19040823)   487426.96
3626564.52   115.68604 (19022001)
        487446.96   3626564.52   115.66673 (19022001)   487466.96
3626564.52   117.29632 (19022001)
        487486.96   3626564.52   118.57055 (19022001)   487506.96
3626564.52   119.23597 (19022001)
        487526.96   3626564.52   116.99932 (19022001)   487546.96
3626564.52   111.24042 (19022001)
        487566.96   3626564.52   106.60157 (19022001)   487586.96
3626564.52   111.39204 (19022001)
        487606.96   3626564.52   132.35102 (19041421)   487626.96
3626564.52   121.00030 (19040823)
        487646.96   3626564.52   127.01416 (19040823)   487666.96
3626564.52   129.23789 (19040823)
        487686.96   3626564.52   135.89446 (19040823)   487706.96
3626564.52   143.03907 (19040823)
        487726.96   3626564.52   151.55820 (19040823)   487746.96
3626564.52   159.62217 (19040823)
        487766.96   3626564.52   168.06164 (19040823)   487786.96
3626564.52   185.00280 (19040823)

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002
, L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010
, L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018
, L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS
***

** CONC OF PM_10 IN MICROGRAMS/M**3
**

X-COORD (M) Y-COORD (M) CONC (YYMMDDHH) X-COORD (M)
Y-COORD (M) CONC (YYMMDDHH)
- -
- -
487806.96 3626564.52 195.23680 (19040823) 487826.96
3626564.52 204.47043 (19040823)
487846.96 3626564.52 214.34016 (19040823) 487866.96
3626564.52 226.29719 (19040823)
487426.96 3626584.52 123.50095 (21012122) 487446.96
3626584.52 124.05772 (21012122)
487466.96 3626584.52 125.62162 (21012122) 487486.96
3626584.52 124.66359 (21012122)
487506.96 3626584.52 124.82916 (21012122) 487526.96
3626584.52 129.13347 (21012122)
487546.96 3626584.52 111.57147 (21012122) 487566.96
3626584.52 111.53105 (21012122)
487586.96 3626584.52 117.33274 (21012122) 487606.96
3626584.52 132.17329 (21012122)
487626.96 3626584.52 122.90026 (21012122) 487646.96
3626584.52 126.56737 (21012122)
487666.96 3626584.52 132.57329 (21012122) 487686.96
3626584.52 137.83364 (21012122)
487706.96 3626584.52 133.97566 (21012122) 487726.96
3626584.52 146.98673 (21012122)
487746.96 3626584.52 155.32129 (19040823) 487766.96
3626584.52 164.35041 (19040823)
487786.96 3626584.52 175.19013 (19040823) 487806.96
3626584.52 186.13821 (19040823)
487826.96 3626584.52 197.49015 (19040823) 487846.96
3626584.52 209.92232 (19040823)
487866.96 3626584.52 223.75172 (19040823) 487886.96
3626584.52 237.37877 (19040823)
487906.96 3626584.52 250.00851 (19040823) 487426.96

3626604.52 128.98762 (21012122)
487446.96 3626604.52 131.41414 (21012122) 487466.96
3626604.52 133.49733 (21012122)
487486.96 3626604.52 132.78562 (21012122) 487506.96
3626604.52 133.04789 (21012122)
487526.96 3626604.52 135.50201 (21012122) 487546.96
3626604.52 122.30837 (21012122)
487566.96 3626604.52 114.39924 (21012122) 487586.96
3626604.52 111.82799 (19050803)
487606.96 3626604.52 122.39618 (21012122) 487626.96
3626604.52 128.73199 (21012122)
487646.96 3626604.52 135.09093 (21012122) 487666.96
3626604.52 141.31865 (21012122)
487686.96 3626604.52 146.78887 (21012122) 487706.96
3626604.52 150.41559 (21012122)
487726.96 3626604.52 158.68569 (21012122) 487746.96
3626604.52 166.60626 (21012122)
487766.96 3626604.52 173.55397 (21012122) 487786.96
3626604.52 179.36815 (21012122)
487806.96 3626604.52 194.41677 (21012122) 487826.96
3626604.52 208.12602 (21012122)
487846.96 3626604.52 214.33944 (21012122) 487866.96
3626604.52 225.18608 (21012122)
487886.96 3626604.52 235.57094 (21012122) 487906.96
3626604.52 245.75366 (21012122)
487926.96 3626604.52 258.07762 (21012122) 487406.96
3626624.52 129.25338 (21012122)
487426.96 3626624.52 130.60487 (21012122) 487446.96
3626624.52 133.56745 (21012122)
487466.96 3626624.52 135.07424 (21012122) 487486.96
3626624.52 136.36616 (21012122)
487506.96 3626624.52 135.96572 (21012122) 487526.96
3626624.52 137.18515 (21012122)
487546.96 3626624.52 127.87428 (21012122) 487566.96
3626624.52 112.90987 (19020205)
487586.96 3626624.52 110.70239 (19020205) 487606.96
3626624.52 115.38974 (19020205)
487626.96 3626624.52 126.42714 (19020205) 487646.96
3626624.52 133.95648 (19020205)
487666.96 3626624.52 140.44898 (19020205) 487686.96
3626624.52 146.53351 (21012122)
487706.96 3626624.52 152.99570 (21012122) 487726.96
3626624.52 160.36231 (21012122)
487746.96 3626624.52 168.02385 (21012122) 487766.96
3626624.52 176.19651 (21012122)
487786.96 3626624.52 185.41634 (21012122) 487806.96
3626624.52 213.19288 (21012122)
487826.96 3626624.52 224.52390 (21012122) 487846.96
3626624.52 232.85123 (21012122)
487866.96 3626624.52 229.16769 (21012122) 487886.96

3626624.52   240.97331 (21012122)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
487906.96	3626624.52	251.27197	(21012122)	487926.96	3626624.52	265.62062	(21012122)
487946.96	3626624.52	285.17933	(21012122)	487406.96	3626644.52	128.38783	(20101601)
487426.96	3626644.52	131.19486	(20101601)	487446.96	3626644.52	133.22927	(20101601)
487466.96	3626644.52	132.96906	(20101601)	487486.96	3626644.52	135.17192	(20101601)
487506.96	3626644.52	138.03771	(20101601)	487526.96	3626644.52	136.41390	(20101601)
487546.96	3626644.52	118.64611	(21102401)	487566.96	3626644.52	109.19903	(21102401)
487586.96	3626644.52	110.60452	(21102401)	487606.96	3626644.52	115.82332	(21102401)
487626.96	3626644.52	121.14283	(21102401)	487646.96	3626644.52	133.37685	(21102401)
487666.96	3626644.52	141.36429	(21102401)	487686.96	3626644.52	147.96504	(21102401)
487706.96	3626644.52	159.03451	(21102401)	487726.96	3626644.52	166.04965	(21102401)
487746.96	3626644.52	168.63521	(21102401)	487766.96			

3626644.52   176.82043 (21102401)
        487786.96   3626644.52   205.99714 (21012122)   487806.96
3626644.52   215.55550 (21012122)
        487826.96   3626644.52   228.75873 (21012122)   487846.96
3626644.52   236.75864 (21012122)
        487866.96   3626644.52   227.37621 (21102401)   487886.96
3626644.52   240.37053 (21102401)
        487906.96   3626644.52   250.88107 (21112423)   487926.96
3626644.52   266.56038 (21112423)
        487946.96   3626644.52   286.42189 (21112423)   487966.96
3626644.52   302.48360 (21112423)
        487386.96   3626664.52   125.21849 (20101601)   487406.96
3626664.52   126.93083 (20101601)
        487426.96   3626664.52   128.83964 (20101601)   487446.96
3626664.52   131.32559 (20101601)
        487466.96   3626664.52   132.36302 (20101601)   487486.96
3626664.52   134.04410 (20101601)
        487506.96   3626664.52   134.06954 (20101601)   487526.96
3626664.52   128.33744 (21102401)
        487546.96   3626664.52   128.21850 (21102401)   487566.96
3626664.52   129.72424 (21102401)
        487586.96   3626664.52   122.09948 (21112423)   487606.96
3626664.52   124.78116 (21112423)
        487626.96   3626664.52   125.48331 (21112423)   487646.96
3626664.52   135.70511 (21112423)
        487666.96   3626664.52   144.46670 (21112423)   487686.96
3626664.52   155.44215 (21112423)
        487706.96   3626664.52   168.12080 (21102401)   487726.96
3626664.52   170.60140 (21112423)
        487746.96   3626664.52   183.83644 (21102401)   487766.96
3626664.52   196.26139 (21102401)
        487786.96   3626664.52   205.73363 (21112423)   487806.96
3626664.52   215.26011 (21112423)
        487826.96   3626664.52   225.83812 (21112423)   487846.96
3626664.52   236.56228 (21112423)
        487866.96   3626664.52   245.89627 (21112423)   487886.96
3626664.52   259.23654 (21112423)
        487906.96   3626664.52   272.74463 (21112423)   487926.96
3626664.52   283.60686 (21112423)
        487946.96   3626664.52   296.91213 (21112423)   487966.96
3626664.52   306.67200 (21112423)
        487986.96   3626664.52   327.26599 (21112423)   487386.96
3626684.52   123.63820 (20013121)
        487406.96   3626684.52   125.59961 (20013121)   487426.96
3626684.52   127.15788 (20013121)
        487446.96   3626684.52   128.18020 (20013121)   487466.96
3626684.52   129.59681 (20013121)
        487486.96   3626684.52   131.06312 (19110823)   487506.96
3626684.52   132.01215 (19110823)
        487526.96   3626684.52   130.35300 (21112423)   487546.96

3626684.52   134.82985 (21112423)
        487566.96   3626684.52   139.58730 (21112423)   487586.96
3626684.52   143.38091 (21112423)
        487606.96   3626684.52   143.46338 (21112423)   487626.96
3626684.52   138.75459 (21112423)
        487646.96   3626684.52   143.73803 (21112423)   487666.96
3626684.52   151.22394 (21112423)
        487686.96   3626684.52   167.56394 (21112423)   487706.96
3626684.52   176.64834 (21112423)

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002 , L0000003   , L0000004 ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010 , L0000011   , L0000012 ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018 , L0000019   , L0000020 ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

      X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M)
Y-COORD (M)   CONC   (YYMMDDHH)
 -
        487726.96   3626684.52   184.73894 (21112423)   487746.96
3626684.52   197.74217 (21112423)
        487766.96   3626684.52   208.49437 (21112423)   487786.96
3626684.52   216.52200 (21112423)
        487806.96   3626684.52   225.13215 (21112423)   487826.96
3626684.52   234.93097 (21112423)
        487846.96   3626684.52   245.43370 (21112423)   487866.96
3626684.52   256.50243 (21112423)
        487886.96   3626684.52   268.57856 (21112423)   487906.96
3626684.52   280.97175 (21112423)
        487926.96   3626684.52   293.92850 (21112423)   487946.96
3626684.52   291.97777 (21112423)
        487966.96   3626684.52   308.62481 (21112423)   487986.96

3626684.52 314.32445 (21112423)
488006.96 3626684.52 360.71644 (21020701) 487366.96
3626704.52 124.10028 (20012319)
487386.96 3626704.52 126.94468 (20012319) 487406.96
3626704.52 130.14189 (20012319)
487426.96 3626704.52 132.59709 (20012319) 487446.96
3626704.52 131.48310 (20012319)
487466.96 3626704.52 133.15129 (20012319) 487486.96
3626704.52 135.56782 (21112423)
487506.96 3626704.52 137.48484 (21112423) 487526.96
3626704.52 139.20767 (21112423)
487546.96 3626704.52 141.19374 (21112423) 487566.96
3626704.52 145.22126 (21112423)
487586.96 3626704.52 150.41201 (21112423) 487606.96
3626704.52 155.51127 (21112423)
487626.96 3626704.52 156.29154 (21112423) 487646.96
3626704.52 149.91783 (21112423)
487666.96 3626704.52 150.45004 (21112423) 487686.96
3626704.52 168.32073 (21112423)
487706.96 3626704.52 178.69991 (21112423) 487726.96
3626704.52 191.38473 (21112423)
487746.96 3626704.52 201.37810 (21112423) 487766.96
3626704.52 209.74107 (21112423)
487786.96 3626704.52 216.80085 (21112423) 487806.96
3626704.52 224.01941 (21112423)
487826.96 3626704.52 233.37566 (21112423) 487846.96
3626704.52 244.14979 (21112423)
487866.96 3626704.52 255.72146 (21112423) 487886.96
3626704.52 267.59920 (21112423)
487906.96 3626704.52 279.00449 (21112423) 487926.96
3626704.52 292.97309 (21112423)
487946.96 3626704.52 308.09933 (21112423) 487966.96
3626704.52 309.79694 (21020701)
487986.96 3626704.52 339.27485 (21020701) 488006.96
3626704.52 373.99744 (21020701)
488026.96 3626704.52 416.27509 (21101502) 487386.96
3626724.52 128.64037 (20012319)
487406.96 3626724.52 130.07887 (20012319) 487426.96
3626724.52 131.07303 (20012319)
487446.96 3626724.52 133.47970 (21112423) 487466.96
3626724.52 136.28350 (21112423)
487486.96 3626724.52 138.98533 (21112423) 487506.96
3626724.52 141.29547 (21112423)
487526.96 3626724.52 142.66401 (21112423) 487546.96
3626724.52 145.16562 (21112423)
487566.96 3626724.52 146.80531 (21112423) 487586.96
3626724.52 149.22357 (21112423)
487606.96 3626724.52 149.96161 (21112423) 487626.96
3626724.52 154.37692 (21112423)
487646.96 3626724.52 156.37666 (21112423) 487666.96

3626724.52   160.24725 (21112423)
        487686.96   3626724.52   166.30858 (21112423)   487706.96
3626724.52   173.41892 (21112423)
        487726.96   3626724.52   185.11617 (21112423)   487746.96
3626724.52   193.55563 (21112423)
        487766.96   3626724.52   200.61269 (21112423)   487786.96
3626724.52   207.69951 (21112423)
        487806.96   3626724.52   216.27841 (21112423)   487826.96
3626724.52   222.85367 (21112423)
        487846.96   3626724.52   234.17991 (21120107)   487866.96
3626724.52   253.61562 (21120107)
        487886.96   3626724.52   271.70265 (21120107)   487906.96
3626724.52   277.28488 (21120107)
        487926.96   3626724.52   294.21788 (21020701)   487946.96
3626724.52   306.83221 (21020701)
        487966.96   3626724.52   320.86271 (21101502)   487986.96
3626724.52   351.62502 (21101502)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

      X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M)
Y-COORD (M)   CONC   (YYMMDDHH)
- -
        488006.96   3626724.52   385.09393 (21101502)   488026.96
3626724.52   440.87088 (19121406)
        488046.96   3626724.52   511.71710 (19120404)   487406.96
3626744.52   126.96245 (21112423)
        487426.96   3626744.52   128.60689 (21112423)   487446.96

3626744.52 131.33244 (21112423)
487466.96 3626744.52 133.74771 (21112423) 487486.96
3626744.52 136.01045 (21112423)
487506.96 3626744.52 137.78504 (21112423) 487526.96
3626744.52 138.58364 (21112423)
487546.96 3626744.52 141.47936 (21112423) 487566.96
3626744.52 143.81828 (21112423)
487586.96 3626744.52 141.69957 (21112423) 487606.96
3626744.52 140.60611 (21112423)
487626.96 3626744.52 144.88720 (21112423) 487646.96
3626744.52 148.16472 (21112423)
487666.96 3626744.52 151.66430 (21112423) 487686.96
3626744.52 155.59957 (21112423)
487706.96 3626744.52 160.14284 (21112423) 487726.96
3626744.52 173.36847 (21120107)
487746.96 3626744.52 188.37770 (21120107) 487766.96
3626744.52 201.46180 (21120107)
487786.96 3626744.52 216.39839 (21120107) 487806.96
3626744.52 231.98501 (21120107)
487826.96 3626744.52 238.28508 (21120107) 487846.96
3626744.52 244.42730 (21020701)
487866.96 3626744.52 262.23764 (21020701) 487886.96
3626744.52 281.63127 (21020701)
487906.96 3626744.52 290.12926 (21020701) 487926.96
3626744.52 298.14760 (21020701)
487946.96 3626744.52 307.43575 (21101502) 487966.96
3626744.52 330.49192 (21101502)
487986.96 3626744.52 362.69574 (19121406) 488006.96
3626744.52 412.88024 (19121406)
488026.96 3626744.52 462.78782 (19121406) 488046.96
3626744.52 555.54264 (19120405)
488066.96 3626744.52 667.15609 (19120405) 487446.96
3626764.52 129.01878 (19091906)
487466.96 3626764.52 131.96620 (19091906) 487486.96
3626764.52 132.59466 (19091906)
487506.96 3626764.52 131.87924 (19091906) 487526.96
3626764.52 133.12638 (19091906)
487546.96 3626764.52 137.35351 (19091906) 487566.96
3626764.52 138.50340 (19091906)
487586.96 3626764.52 137.99378 (19091906) 487606.96
3626764.52 134.23141 (19040206)
487626.96 3626764.52 138.24125 (21120107) 487646.96
3626764.52 146.66584 (21120107)
487666.96 3626764.52 155.64146 (21120107) 487686.96
3626764.52 163.61814 (21120107)
487706.96 3626764.52 168.89909 (21120107) 487726.96
3626764.52 180.84542 (21120107)
487746.96 3626764.52 194.83008 (21120107) 487766.96
3626764.52 209.45711 (21120107)
487786.96 3626764.52 226.47462 (21120107) 487806.96

3626764.52 237.26545 (21020701)
487826.96 3626764.52 251.83446 (21020701) 487846.96
3626764.52 261.97238 (21020701)
487866.96 3626764.52 267.08522 (21020701) 487886.96
3626764.52 279.33853 (21020701)
487906.96 3626764.52 291.14731 (21101502) 487926.96
3626764.52 310.14426 (21101502)
487946.96 3626764.52 313.39262 (19121406) 487966.96
3626764.52 362.75672 (19121406)
487986.96 3626764.52 411.03179 (19121406) 488006.96
3626764.52 459.70791 (19121406)
488026.96 3626764.52 516.63671 (19120405) 488046.96
3626764.52 572.33419 (19120405)
488066.96 3626764.52 704.28387 (19120716) 488086.96
3626764.52 979.78176 (19120716)
487466.96 3626784.52 126.95607 (19091906) 487486.96
3626784.52 126.60287 (19091906)
487506.96 3626784.52 127.58126 (19091906) 487526.96
3626784.52 130.29440 (19091906)
487546.96 3626784.52 134.93461 (21120107) 487566.96
3626784.52 140.74611 (21120107)
487586.96 3626784.52 146.52919 (21120107) 487606.96
3626784.52 152.77245 (21120107)
487626.96 3626784.52 159.77445 (21120107) 487646.96
3626784.52 165.02254 (21120107)

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M) CONC (YYMMDDHH) X-COORD (M)

Y-COORD (M)   CONC   (YYMMDDHH)

- -

487666.96   3626784.52   168.35417 (21120107)   487686.96
3626784.52   174.93237 (21120107)
487706.96   3626784.52   182.48729 (21120107)   487726.96
3626784.52   188.80415 (21020701)
487746.96   3626784.52   200.62080 (21020701)   487766.96
3626784.52   215.34338 (21020701)
487786.96   3626784.52   233.27742 (21020701)   487806.96
3626784.52   244.12210 (21020701)
487826.96   3626784.52   254.82569 (21020701)   487846.96
3626784.52   264.29051 (21020701)
487866.96   3626784.52   271.16584 (21101502)   487886.96
3626784.52   284.04083 (21101502)
487906.96   3626784.52   297.61932 (20122119)   487926.96
3626784.52   316.23876 (19121406)
487946.96   3626784.52   354.94454 (19121406)   487966.96
3626784.52   392.99145 (19121406)
487986.96   3626784.52   431.70152 (19121406)   488006.96
3626784.52   493.00064 (19120405)
488026.96   3626784.52   575.85277 (19120405)   488046.96
3626784.52   585.43689 (19120405)
487506.96   3626804.52   135.97707 (21120107)   487526.96
3626804.52   144.01454 (21120107)
487546.96   3626804.52   148.28700 (21120107)   487566.96
3626804.52   153.20937 (21120107)
487586.96   3626804.52   158.25782 (21120107)   487606.96
3626804.52   163.32193 (21120107)
487626.96   3626804.52   171.14418 (21120107)   487646.96
3626804.52   173.24295 (21120107)
487666.96   3626804.52   175.68674 (21020701)   487686.96
3626804.52   184.90285 (21020701)
487706.96   3626804.52   196.62615 (21020701)   487726.96
3626804.52   202.06818 (21020701)
487746.96   3626804.52   206.35111 (21020701)   487766.96
3626804.52   219.36309 (21020701)
487786.96   3626804.52   230.21934 (19050905)   487806.96
3626804.52   238.96284 (19050905)
487826.96   3626804.52   249.18953 (21101502)   487846.96
3626804.52   266.39816 (21090905)
487866.96   3626804.52   286.35051 (20122119)   487886.96
3626804.52   294.05364 (20122119)
487906.96   3626804.52   319.10567 (19121406)   487926.96
3626804.52   347.97420 (19121406)
487946.96   3626804.52   376.60427 (19121406)   487966.96
3626804.52   421.68176 (19120404)
487986.96   3626804.52   466.71162 (19120405)   487526.96
3626824.52   150.53607 (21120107)
487546.96   3626824.52   156.04433 (21120107)   487566.96

3626824.52 160.18689 (21120107)
487586.96 3626824.52 162.27516 (21120107) 487606.96
3626824.52 162.82509 (21020701)
487626.96 3626824.52 172.04201 (21020701) 487646.96
3626824.52 177.89877 (21020701)
487666.96 3626824.52 183.27642 (21020701) 487686.96
3626824.52 189.53754 (21020701)
487706.96 3626824.52 195.92885 (21020701) 487726.96
3626824.52 205.53105 (19050905)
487746.96 3626824.52 213.59920 (19050905) 487766.96
3626824.52 218.09759 (21101502)
487786.96 3626824.52 226.37471 (21101502) 487806.96
3626824.52 241.42889 (21090905)
487826.96 3626824.52 257.98852 (20122119) 487846.96
3626824.52 275.33095 (20122119)
487866.96 3626824.52 292.64837 (19121406) 487886.96
3626824.52 320.79967 (19121406)
487546.96 3626844.52 155.26928 (21120107) 487566.96
3626844.52 160.91593 (21020701)
487586.96 3626844.52 165.79827 (21020701) 487606.96
3626844.52 169.46667 (21020701)
487626.96 3626844.52 175.20561 (21020701) 487646.96
3626844.52 178.43653 (21020701)
487666.96 3626844.52 182.66004 (19050905) 487686.96
3626844.52 188.52559 (19050905)
487706.96 3626844.52 191.52903 (19050905) 487726.96
3626844.52 201.63448 (21101502)
487746.96 3626844.52 214.03857 (21090905) 487766.96
3626844.52 223.54071 (21090905)
487786.96 3626844.52 235.09391 (20122119) 487806.96
3626844.52 248.79493 (20122119)
487826.96 3626844.52 261.58769 (19121406) 487846.96
3626844.52 286.16729 (19121406)

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
487546.96	3626864.52	161.21380	(21020701)	487566.96	3626864.52	163.46045	(21020701)
487586.96	3626864.52	165.84662	(21020701)	487606.96	3626864.52	168.81856	(19050905)
487626.96	3626864.52	172.99768	(19050905)	487646.96	3626864.52	174.44438	(19050905)
487666.96	3626864.52	179.32447	(21101502)	487686.96	3626864.52	189.27888	(21090905)
487706.96	3626864.52	197.39172	(21090905)	487726.96	3626864.52	206.39210	(21090905)
487746.96	3626864.52	217.23465	(20122119)	487766.96	3626864.52	227.44896	(20122119)
487786.96	3626864.52	239.02453	(20122119)	487806.96	3626864.52	258.39959	(19121406)
487566.96	3626884.52	162.89050	(19050905)	487586.96	3626884.52	162.47262	(19050905)
487606.96	3626884.52	163.69270	(19050905)	487626.96	3626884.52	172.51025	(21090905)
487646.96	3626884.52	179.30510	(21090905)	487666.96	3626884.52	185.38672	(21090905)
487686.96	3626884.52	192.31735	(21090905)	487706.96	3626884.52	200.18078	(20122119)
487726.96	3626884.52	210.37942	(20122119)	487746.96	3626884.52	218.12894	(20122119)
487766.96	3626884.52	235.55975	(19121406)	487786.96	3626884.52	254.07363	(19121406)
487586.96	3626904.52	162.66965	(21090905)	487606.96	3626904.52	169.15850	(21090905)
487626.96	3626904.52	179.38913	(21090905)	487646.96	3626904.52	184.19420	(21090905)
487666.96	3626904.52	192.52425	(20122119)	487686.96	3626904.52	199.82205	(20122119)
487706.96	3626904.52	202.52678	(20122119)	487726.96	3626904.52	215.86958	(19121406)
487746.96	3626904.52	231.20972	(19121406)	487766.96	3626904.52	243.65208	(19121406)
487626.96	3626924.52	181.40886	(20122119)	487646.96	3626924.52	189.60207	(20122119)
487666.96	3626924.52	195.15722	(20122119)	487686.96			

3626924.52   201.96698 (19121406)
        487706.96   3626924.52   214.90435 (19121406)   487726.96
3626924.52   226.35024 (19121406)
        487746.96   3626924.52   233.46690 (19121406)   487646.96
3626944.52   186.35618 (19121406)
        487666.96   3626944.52   199.42634 (19121406)   487686.96
3626944.52   210.35906 (19121406)
        487706.96   3626944.52   219.19968 (19121406)   487726.96
3626944.52   228.17196 (19020306)
        487666.96   3626964.52   202.97907 (19121406)   487686.96
3626964.52   207.94352 (19020306)
        487706.96   3626964.52   223.21812 (19020306)   487686.96
3626984.52   217.71439 (19120404)
        488242.19   3625436.42   103.96772 (19032623)   488262.19
3625436.42   105.17249 (19032623)
        488242.19   3625456.42   106.44850 (19032623)   488262.19
3625456.42   107.00199 (19032623)
        488282.19   3625456.42   97.14472 (20012720)   488302.19
3625456.42   98.54265 (19110723)
        488322.19   3625456.42   100.29277 (19110723)   488242.19
3625476.42   108.99816 (19032623)
        488262.19   3625476.42   108.84764 (19032623)   488282.19
3625476.42   99.37054 (21080305)
        488302.19   3625476.42   101.35380 (19110723)   488322.19
3625476.42   102.03279 (19110723)
        488342.19   3625476.42   100.51106 (21010519)   488362.19
3625476.42   113.60186 (19080704)
        488242.19   3625496.42   111.61951 (19032623)   488262.19
3625496.42   110.70024 (19032623)
        488282.19   3625496.42   102.00525 (21080305)   488302.19
3625496.42   104.15280 (19110723)
        488322.19   3625496.42   103.65301 (19110723)   488342.19
3625496.42   102.07387 (20091122)
        488362.19   3625496.42   117.66109 (19080704)   488382.19
3625496.42   118.18350 (19080704)
        488402.19   3625496.42   104.65928 (20070402)   488422.19
3625496.42   105.96229 (20070402)
        488242.19   3625516.42   114.31962 (19032623)   488262.19
3625516.42   112.56484 (19032623)
        488282.19   3625516.42   104.70380 (21080305)   488302.19
3625516.42   107.01077 (19110723)

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION

VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488322.19	3625516.42	105.29978	(20091122)	488342.19	3625516.42	106.19452	(19080704)
488362.19	3625516.42	121.54356	(19080704)	488382.19	3625516.42	119.12839	(19080704)
488402.19	3625516.42	108.40186	(20070402)	488422.19	3625516.42	106.94391	(20070402)
488442.19	3625516.42	103.01415	(20060224)	488462.19	3625516.42	105.17536	(20021420)
488482.19	3625516.42	106.71896	(21082705)	488222.19	3625536.42	107.28327	(20070303)
488242.19	3625536.42	117.09378	(19032623)	488262.19	3625536.42	114.43431	(19032623)
488282.19	3625536.42	107.45434	(21080305)	488302.19	3625536.42	109.89824	(19110723)
488322.19	3625536.42	108.19396	(20091122)	488342.19	3625536.42	111.73410	(19080704)
488362.19	3625536.42	125.17687	(19080704)	488382.19	3625536.42	119.57374	(19080704)
488402.19	3625536.42	111.82309	(20070402)	488422.19	3625536.42	107.36263	(20070402)
488442.19	3625536.42	106.48038	(20060224)	488462.19	3625536.42	108.94155	(20021420)
488482.19	3625536.42	110.96143	(21082705)	488502.19	3625536.42	113.95712	(21110719)
488522.19	3625536.42	119.29094	(19052822)	488542.19	3625536.42	117.41853	(19052822)
488222.19	3625556.42	109.90399	(20070303)	488242.19	3625556.42	119.93641	(19032623)
488262.19	3625556.42	116.29862	(19032623)	488282.19	3625556.42	110.21943	(21080305)
488302.19	3625556.42	112.73268	(19110723)	488322.19			

3625556.42   111.00033 (20091122)
        488342.19   3625556.42   117.27973 (19080704)   488362.19
3625556.42   128.44398 (19080704)
        488382.19   3625556.42   119.42198 (19080704)   488402.19
3625556.42   114.71101 (20070402)
        488422.19   3625556.42   108.63223 (21122219)   488442.19
3625556.42   109.30124 (20060224)
        488462.19   3625556.42   111.98990 (20021420)   488482.19
3625556.42   114.24344 (21082705)
        488502.19   3625556.42   117.48051 (21110719)   488522.19
3625556.42   123.40220 (19052822)
        488542.19   3625556.42   116.00492 (19052822)   488562.19
3625556.42   110.71945 (19101221)
        488202.19   3625576.42   112.17820 (20091504)   488222.19
3625576.42   112.56754 (20070303)
        488242.19   3625576.42   122.85605 (19032623)   488262.19
3625576.42   118.16012 (19032623)
        488282.19   3625576.42   113.00593 (21080305)   488302.19
3625576.42   115.55570 (19110723)
        488322.19   3625576.42   113.73825 (20091122)   488342.19
3625576.42   122.79475 (19080704)
        488362.19   3625576.42   131.30690 (19080704)   488382.19
3625576.42   118.70353 (19080704)
        488402.19   3625576.42   117.13843 (20070402)   488422.19
3625576.42   110.89512 (21122219)
        488442.19   3625576.42   111.41806 (20060224)   488462.19
3625576.42   114.19431 (20021420)
        488482.19   3625576.42   116.39813 (21082705)   488502.19
3625576.42   120.59041 (19052822)
        488522.19   3625576.42   125.97687 (19052822)   488542.19
3625576.42   113.40994 (19032522)
        488562.19   3625576.42   113.47450 (19101221)   488582.19
3625576.42   114.45943 (19091303)
        488122.19   3625596.42   114.48115 (21102122)   488142.19
3625596.42   113.98365 (19082103)
        488162.19   3625596.42   115.56446 (19082103)   488182.19
3625596.42   115.85201 (20113019)
        488202.19   3625596.42   114.93623 (20091504)   488222.19
3625596.42   115.29905 (20070303)
        488242.19   3625596.42   125.85404 (19032623)   488262.19
3625596.42   120.01572 (19032623)
        488282.19   3625596.42   115.80909 (21080305)   488302.19
3625596.42   118.35250 (19110723)
        488322.19   3625596.42   116.38846 (20091122)   488342.19
3625596.42   128.22096 (19080704)
        488362.19   3625596.42   133.70220 (19080704)   488382.19
3625596.42   117.38884 (19080704)
        488402.19   3625596.42   119.01472 (20070402)   488422.19
3625596.42   112.59491 (21122219)

 *** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***

INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488522.19	3625596.42	126.78822	(19052822)	488542.19	3625596.42	114.80459	(19101221)
488562.19	3625596.42	115.12614	(19091303)	488582.19	3625596.42	115.62907	(19091303)
488602.19	3625596.42	115.14737	(20060721)	488062.19	3625616.42	113.04236	(20090823)
488082.19	3625616.42	115.45525	(20021323)	488102.19	3625616.42	113.47038	(21121021)
488122.19	3625616.42	117.20782	(21102122)	488142.19	3625616.42	116.20237	(19082103)
488162.19	3625616.42	118.42985	(19082103)	488182.19	3625616.42	118.69616	(20113019)
488202.19	3625616.42	117.72357	(20091504)	488222.19	3625616.42	118.10415	(20070303)
488242.19	3625616.42	128.91603	(19032623)	488262.19	3625616.42	121.84623	(19032623)
488282.19	3625616.42	118.62258	(21080305)	488302.19	3625616.42	121.06869	(19110723)
488322.19	3625616.42	118.91338	(20091122)	488342.19	3625616.42	133.52359	(19080704)
488362.19	3625616.42	135.62060	(19080704)	488382.19	3625616.42	121.35384	(20070402)
488402.19	3625616.42	119.90400	(20070402)	488522.19			

3625616.42 125.65045 (19052822)
488542.19 3625616.42 119.37080 (19101221) 488562.19
3625616.42 120.13967 (19091303)
488582.19 3625616.42 119.11432 (20060721) 488602.19
3625616.42 114.50255 (20060721)
488062.19 3625636.42 115.20360 (20090823) 488082.19
3625636.42 117.84205 (20021323)
488102.19 3625636.42 115.84523 (21121021) 488122.19
3625636.42 119.96440 (21102122)
488142.19 3625636.42 118.46292 (19082103) 488162.19
3625636.42 121.37815 (19082103)
488182.19 3625636.42 121.63115 (20113019) 488202.19
3625636.42 120.58137 (20091504)
488222.19 3625636.42 120.98251 (20070303) 488242.19
3625636.42 132.04739 (19032623)
488262.19 3625636.42 123.66027 (19032623) 488282.19
3625636.42 121.45311 (21080305)
488302.19 3625636.42 123.73324 (19110723) 488322.19
3625636.42 121.29859 (20091122)
488342.19 3625636.42 138.61411 (19080704) 488362.19
3625636.42 136.95669 (19080704)
488382.19 3625636.42 125.61681 (20070402) 488522.19
3625636.42 122.48499 (19052822)
488542.19 3625636.42 122.36928 (19101221) 488562.19
3625636.42 123.15669 (19091303)
488582.19 3625636.42 122.14570 (20060721) 488602.19
3625636.42 116.92681 (20081905)
488622.19 3625636.42 116.41719 (21041522) 488062.19
3625656.42 117.16212 (20090823)
488082.19 3625656.42 120.13332 (20021323) 488102.19
3625656.42 118.17039 (21121021)
488122.19 3625656.42 122.74443 (21102122) 488142.19
3625656.42 120.97235 (19100421)
488162.19 3625656.42 124.41931 (19082103) 488182.19
3625656.42 124.66391 (20113019)
488202.19 3625656.42 123.51839 (20091504) 488222.19
3625656.42 124.05062 (19032623)
488242.19 3625656.42 135.24844 (19032623) 488262.19
3625656.42 125.45195 (19032623)
488282.19 3625656.42 124.29402 (21080305) 488302.19
3625656.42 126.32999 (19110723)
488322.19 3625656.42 124.56939 (19080704) 488342.19
3625656.42 143.41265 (19080704)
488362.19 3625656.42 137.64551 (19080704) 488382.19
3625656.42 129.38646 (20070402)
488522.19 3625656.42 124.14796 (19101221) 488542.19
3625656.42 124.91195 (20011720)
488582.19 3625656.42 122.85774 (20060721) 488602.19
3625656.42 118.03595 (21041522)
488622.19 3625656.42 118.81735 (20051104) 488642.19

3625656.42   131.50127 (20102522)
        488062.19   3625676.42   119.10903 (20090823)   488082.19
3625676.42   122.31106 (20021323)
        488102.19   3625676.42   120.45313 (20021323)   488122.19
3625676.42   125.51293 (21102122)
        488142.19   3625676.42   123.93010 (19100421)   488162.19
3625676.42   127.53958 (19082103)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002
, L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010
, L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018
, L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

      X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M)
Y-COORD (M)   CONC   (YYMMDDHH)
 -
- -
        488182.19   3625676.42   127.80665 (20113019)   488202.19
3625676.42   126.58271 (20091504)
        488222.19   3625676.42   127.81971 (19032623)   488242.19
3625676.42   138.55057 (19032623)
        488262.19   3625676.42   127.23511 (19032623)   488282.19
3625676.42   128.18990 (19110723)
        488302.19   3625676.42   128.82737 (19110723)   488322.19
3625676.42   131.69327 (19080704)
        488342.19   3625676.42   147.86047 (19080704)   488362.19
3625676.42   137.64034 (19080704)
        488382.19   3625676.42   132.62083 (20070402)   488582.19
3625676.42   123.54204 (20081905)
        488602.19   3625676.42   122.71799 (21041522)   488622.19
3625676.42   126.29455 (20102522)
        488642.19   3625676.42   137.68842 (20102522)   488062.19

3625696.42 122.06025 (20091324)
488082.19 3625696.42 124.35203 (20021323) 488102.19
3625696.42 124.15396 (20021323)
488122.19 3625696.42 128.27438 (21102122) 488142.19
3625696.42 126.95366 (19100421)
488162.19 3625696.42 130.76952 (19082103) 488182.19
3625696.42 131.07966 (20113019)
488202.19 3625696.42 129.76313 (20091504) 488222.19
3625696.42 131.73815 (19032623)
488242.19 3625696.42 141.92684 (19032623) 488262.19
3625696.42 129.75946 (20012720)
488282.19 3625696.42 132.42931 (19110723) 488302.19
3625696.42 131.60459 (20091122)
488322.19 3625696.42 138.88267 (19080704) 488342.19
3625696.42 151.86112 (19080704)
488362.19 3625696.42 136.87253 (19080704) 488382.19
3625696.42 135.08776 (20070402)
488582.19 3625696.42 125.61511 (20081905) 488602.19
3625696.42 124.50857 (21041522)
488622.19 3625696.42 137.56844 (20102522) 488642.19
3625696.42 139.51329 (20102522)
488662.19 3625696.42 134.05656 (19082901) 488042.19
3625716.42 122.62447 (19032423)
488142.19 3625716.42 130.04072 (19100421) 488162.19
3625716.42 134.11632 (19082103)
488182.19 3625716.42 134.49595 (20113019) 488202.19
3625716.42 133.06514 (20091504)
488222.19 3625716.42 135.80940 (19032623) 488242.19
3625716.42 145.36787 (19032623)
488262.19 3625716.42 132.84664 (20012720) 488282.19
3625716.42 136.69129 (19110723)
488302.19 3625716.42 135.63072 (20091122) 488322.19
3625716.42 146.06760 (19080704)
488342.19 3625716.42 155.32318 (19080704) 488362.19
3625716.42 137.26640 (20070402)
488382.19 3625716.42 136.64570 (20070402) 488602.19
3625716.42 130.99906 (20102522)
488622.19 3625716.42 145.12008 (20102522) 488642.19
3625716.42 136.52551 (20102522)
488662.19 3625716.42 141.88799 (19082901) 488682.19
3625716.42 134.21910 (19082901)
488022.19 3625736.42 123.94533 (20111904) 488042.19
3625736.42 124.79393 (19032423)
488182.19 3625736.42 138.05907 (20113019) 488202.19
3625736.42 136.53578 (20091504)
488222.19 3625736.42 140.07035 (19032623) 488242.19
3625736.42 148.92594 (19032623)
488262.19 3625736.42 136.79925 (21080305) 488282.19
3625736.42 141.06289 (19110723)
488302.19 3625736.42 139.65637 (20091122) 488322.19

3625736.42   153.17127 (19080704)
        488362.19   3625736.42   142.46036 (20070402)   488382.19
3625736.42   137.30511 (20070402)
        488402.19   3625736.42   136.46748 (20060224)   488602.19
3625736.42   144.06098 (20102522)
        488622.19   3625736.42   147.86031 (20102522)   488642.19
3625736.42   141.61642 (19082901)
        488662.19   3625736.42   144.42276 (19082901)   488682.19
3625736.42   126.21946 (19082901)
        488702.19   3625736.42   125.72891 (21103121)   488002.19
3625756.42   124.20723 (19110122)
        488022.19   3625756.42   127.42488 (20111904)   488182.19
3625756.42   141.77277 (20113019)
        488202.19   3625756.42   140.15305 (20091504)   488222.19
3625756.42   144.50593 (19032623)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***

INCLUDING SOURCE(S):   L0000001   , L0000002   , L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010   , L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018   , L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488242.19	3625756.42	152.56546	(19032623)	488262.19	3625756.42	141.27566	(21080305)
488282.19	3625756.42	145.44046	(19110723)	488382.19	3625756.42	140.00509	(21122219)
488602.19	3625756.42	153.16150	(20102522)	488622.19	3625756.42	145.18093	(20102522)
488642.19	3625756.42	150.03108	(19082901)	488662.19			

3625756.42   141.03834 (19082901)
        488682.19   3625756.42   130.29335 (21103121)   488702.19
3625756.42   126.79821 (20050620)
        487982.19   3625776.42   125.51479 (21120123)   488002.19
3625776.42   126.61268 (19110122)
        488222.19   3625776.42   149.11068 (19032623)   488242.19
3625776.42   156.26500 (19032623)
        488262.19   3625776.42   145.82491 (21080305)   488622.19
3625776.42   149.86818 (19082901)
        488642.19   3625776.42   152.50166 (19082901)   488662.19
3625776.42   131.85890 (19082901)
        488682.19   3625776.42   132.31184 (21103121)   488702.19
3625776.42   128.74915 (20050620)
        488722.19   3625776.42   126.38490 (19100221)   487982.19
3625796.42   126.79594 (21120123)
        488222.19   3625796.42   153.91174 (19032623)   488242.19
3625796.42   160.05651 (19032623)
        488262.19   3625796.42   150.47069 (21080305)   488622.19
3625796.42   158.66078 (19082901)
        488642.19   3625796.42   148.35720 (19082901)   488662.19
3625796.42   138.17329 (21103121)
        488682.19   3625796.42   134.28882 (20050620)   488702.19
3625796.42   130.86698 (21091802)
        488722.19   3625796.42   132.92736 (19100221)   488742.19
3625796.42   136.13795 (21081502)
        488222.19   3625816.42   158.91513 (19032623)   488242.19
3625816.42   163.92988 (19032623)
        488262.19   3625816.42   155.17322 (21080305)   488642.19
3625816.42   140.50190 (21103121)
        488662.19   3625816.42   139.17270 (21103121)   488682.19
3625816.42   134.60773 (20050620)
        488702.19   3625816.42   135.91612 (19100221)   488722.19
3625816.42   138.84175 (21081502)
        488742.19   3625816.42   136.92770 (21081502)   488762.19
3625816.42   130.28305 (19072703)
        488202.19   3625836.42   155.93274 (20091504)   488222.19
3625836.42   164.11957 (19032623)
        488242.19   3625836.42   167.87036 (19032623)   488662.19
3625836.42   142.00008 (20050620)
        488682.19   3625836.42   138.34487 (21091802)   488702.19
3625836.42   140.54140 (19100221)
        488722.19   3625836.42   143.79583 (21081502)   488742.19
3625836.42   136.27882 (19072703)
        488762.19   3625836.42   129.64751 (19040321)   488782.19
3625836.42   132.19973 (20112002)
        488202.19   3625856.42   160.37805 (20091504)   488222.19
3625856.42   169.58686 (19032623)
        488242.19   3625856.42   171.66296 (19032623)   488682.19
3625856.42   145.54560 (19100221)
        488702.19   3625856.42   148.82486 (21081502)   488722.19

3625856.42   140.91402 (21081502)
        488742.19   3625856.42   133.85037 (19040321)   488762.19
3625856.42   136.23355 (20112002)
        488782.19   3625856.42   130.99931 (19100520)   488802.19
3625856.42   127.21964 (19101421)
        488822.19   3625856.42   124.70708 (19101421)   488202.19
3625876.42   165.12400 (20091504)
        488222.19   3625876.42   175.32026 (19032623)   488662.19
3625876.42   148.09133 (19100221)
        488682.19   3625876.42   151.60415 (21081502)   488702.19
3625876.42   150.28063 (21081502)
        488722.19   3625876.42   141.79458 (19072703)   488742.19
3625876.42   139.27455 (20112002)
        488762.19   3625876.42   137.83049 (20112002)   488782.19
3625876.42   133.20189 (19100520)
        488802.19   3625876.42   130.15102 (19101421)   488822.19
3625876.42   126.27786 (20121618)
        488842.19   3625876.42   120.27674 (21110505)   488202.19
3625896.42   170.26890 (20091504)
        488222.19   3625896.42   181.34474 (19032623)   488642.19
3625896.42   152.62496 (21091802)
        488662.19   3625896.42   155.07105 (19100221)   488682.19
3625896.42   158.06984 (21081502)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002
, L0000003   , L0000004   ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010
, L0000011   , L0000012   ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018
, L0000019   , L0000020   ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M)
Y-COORD (M)   CONC   (YYMMDDHH)
- -

- -
        488702.19   3625896.42   149.01884 (19072703)   488722.19
3625896.42   141.61157 (19040321)
        488742.19   3625896.42   144.18803 (20112002)   488762.19
3625896.42   138.99928 (19100520)
        488782.19   3625896.42   135.39529 (19101421)   488802.19
3625896.42   130.78975 (20121618)
        488822.19   3625896.42   124.44664 (21110505)   488842.19
3625896.42   126.84769 (21073103)
        488862.19   3625896.42   122.02164 (21073103)   488882.19
3625896.42   118.98540 (20081323)
        488902.19   3625896.42   117.58897 (21092305)   488202.19
3625916.42   175.55512 (20091504)
        488222.19   3625916.42   187.63111 (19032623)   488642.19
3625916.42   159.98108 (19100221)
        488662.19   3625916.42   163.64017 (21081502)   488682.19
3625916.42   155.15679 (21081502)
        488702.19   3625916.42   147.22931 (20071101)   488762.19
3625916.42   140.28750 (19101421)
        488782.19   3625916.42   135.08584 (20121618)   488802.19
3625916.42   128.61545 (21110505)
        488822.19   3625916.42   130.64864 (21073103)   488842.19
3625916.42   126.94539 (21073103)
        488862.19   3625916.42   123.48410 (20081323)   488882.19
3625916.42   121.60912 (20021319)
        488902.19   3625916.42   119.09254 (19101420)   488922.19
3625916.42   115.33019 (21040420)
        488942.19   3625916.42   118.30734 (19042003)   488222.19
3625936.42   194.17436 (19032623)
        488622.19   3625936.42   162.29147 (21091802)   488642.19
3625936.42   166.38309 (21081502)
        488662.19   3625936.42   165.99930 (21081502)   488682.19
3625936.42   155.13796 (19072703)
        488782.19   3625936.42   134.61242 (20121618)   488802.19
3625936.42   134.64029 (20071102)
        488822.19   3625936.42   132.05523 (20071102)   488842.19
3625936.42   128.20265 (20081323)
        488862.19   3625936.42   125.81844 (20021319)   488882.19
3625936.42   123.11027 (19101420)
        488902.19   3625936.42   119.00773 (21040420)   488922.19
3625936.42   122.23952 (19042003)
        488942.19   3625936.42   119.84924 (19042003)   488962.19
3625936.42   112.95867 (20041924)
        488982.19   3625936.42   109.46734 (21091202)   489002.19
3625936.42   106.16417 (21120219)
        488602.19   3625956.42   168.48321 (21091802)   488622.19
3625956.42   171.91891 (19100221)
        488642.19   3625956.42   174.86450 (21081502)   488662.19
3625956.42   163.84962 (19072703)
        488782.19   3625956.42   138.64738 (20071102)   488802.19

3625956.42   137.44252 (20071102)
        488822.19   3625956.42   133.16818 (20081323)   488842.19
3625956.42   130.25106 (20021319)
        488862.19   3625956.42   127.36150 (19101420)   488882.19
3625956.42   122.88251 (21040420)
        488902.19   3625956.42   126.38100 (19042003)   488922.19
3625956.42   123.55264 (19042003)
        488942.19   3625956.42   116.44603 (20041924)   488962.19
3625956.42   112.88360 (21091202)
        488982.19   3625956.42   109.69181 (21120219)   489002.19
3625956.42   107.96588 (21070304)
        489022.19   3625956.42   107.95079 (21070304)   489042.19
3625956.42   103.47054 (21070304)
        489062.19   3625956.42   102.68897 (19030322)   489082.19
3625956.42   103.22022 (19030322)
        488622.19   3625976.42   180.85167 (21081502)   488802.19
3625976.42   138.38296 (20081323)
        488822.19   3625976.42   134.90258 (20021319)   488842.19
3625976.42   131.82785 (19101420)
        488862.19   3625976.42   126.95233 (21040420)   488882.19
3625976.42   130.73094 (19042003)
        488902.19   3625976.42   127.41345 (19042003)   488922.19
3625976.42   120.07338 (20041924)
        488942.19   3625976.42   116.41338 (21091202)   488962.19
3625976.42   113.27529 (21120219)
        488982.19   3625976.42   111.95875 (21070304)   489002.19
3625976.42   110.97205 (21070304)
        489022.19   3625976.42   106.04625 (20101020)   489042.19
3625976.42   106.47017 (19030322)
        489062.19   3625976.42   105.78476 (19030322)   489082.19
3625976.42   100.97726 (19030322)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002
, L0000003   , L0000004 ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010
, L0000011   , L0000012 ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018
, L0000019   , L0000020 ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS

***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
489102.19	3625976.42	96.62062	(21020920)	489122.19	3625976.42	96.33465	(21020920)
488802.19	3625996.42	139.80424	(20021319)	488822.19	3625996.42	136.58301	(19101420)
488842.19	3625996.42	131.27553	(21102119)	488922.19	3625996.42	120.00054	(21091202)
488942.19	3625996.42	116.93645	(19082501)	488962.19	3625996.42	115.99198	(21070304)
488982.19	3625996.42	113.94147	(21070304)	489002.19	3625996.42	109.29569	(20101020)
489022.19	3625996.42	110.09650	(19030322)	489042.19	3625996.42	108.09276	(19030322)
489062.19	3625996.42	101.93287	(19030322)	489082.19	3625996.42	100.20991	(21020920)
489102.19	3625996.42	98.78022	(21020920)	489122.19	3625996.42	97.38014	(20062624)
489142.19	3625996.42	95.28363	(20062624)	488802.19	3626016.42	141.60386	(19101420)
488822.19	3626016.42	136.03899	(21102119)	488842.19	3626016.42	140.22557	(19042003)
488982.19	3626016.42	112.42582	(20101020)	489002.19	3626016.42	113.52110	(19030322)
489022.19	3626016.42	110.10393	(19030322)	489042.19	3626016.42	104.42557	(20012621)
489062.19	3626016.42	103.54086	(21020920)	489082.19	3626016.42	100.86512	(21020920)
489102.19	3626016.42	100.13620	(20062624)	489122.19	3626016.42	96.73698	(20062624)
489142.19	3626016.42	94.25456	(19050724)	488782.19	3626036.42	146.90498	(19101420)
488802.19	3626036.42	141.12319	(19042003)	488822.19	3626036.42	145.48877	(19042003)
488842.19	3626036.42	140.28744	(19042003)	489042.19	3626036.42	106.56648	(21020920)
489062.19	3626036.42	104.40254	(20062624)	489082.19	3626036.42	102.44528	(20062624)
489102.19	3626036.42	97.76680	(20082724)	489122.19	3626036.42	98.31106	(19050724)
489142.19	3626036.42	98.03316	(19050724)	488782.19	3626056.42	146.71102	(19042003)
488802.19	3626056.42	150.97590	(19042003)	488822.19			

3626056.42   145.12954 (19042003)
        488842.19   3626056.42   136.20811 (20041924)   489042.19
3626056.42   107.66691 (20062624)
        489062.19   3626056.42   104.27300 (20062624)   489082.19
3626056.42   100.76882 (19050724)
        489102.19   3626056.42   101.76733 (19050724)   489122.19
3626056.42   99.97904 (19050724)
        489142.19   3626056.42   99.44554 (19042005)   489162.19
3626056.42   97.14358 (19042005)
        488782.19   3626076.42   156.59156 (19042003)   488802.19
3626076.42   150.13892 (19042003)
        488822.19   3626076.42   140.75292 (20041924)   488842.19
3626076.42   135.48501 (21091202)
        488862.19   3626076.42   133.32381 (21070304)   489062.19
3626076.42   105.12034 (19050724)
        489082.19   3626076.42   104.54721 (19050724)   489102.19
3626076.42   103.35163 (19042005)
        489122.19   3626076.42   101.86066 (19042005)   489142.19
3626076.42   98.07986 (19042005)
        489162.19   3626076.42   94.88433 (20041204)   488782.19
3626096.42   155.17541 (19042003)
        488802.19   3626096.42   145.40801 (20041924)   488822.19
3626096.42   140.76433 (19082501)
        488842.19   3626096.42   138.79817 (21070304)   488862.19
3626096.42   136.09382 (21070304)
        489062.19   3626096.42   107.13096 (19042005)   489082.19
3626096.42   106.56938 (19042005)
        489102.19   3626096.42   103.47086 (19042005)   489122.19
3626096.42   99.01366 (20041204)
        489142.19   3626096.42   96.17359 (20031420)   489162.19
3626096.42   94.90103 (20031420)
        488782.19   3626116.42   150.46488 (21092505)   488802.19
3626116.42   146.25494 (19082501)
        488822.19   3626116.42   144.25980 (21070304)   488842.19
3626116.42   139.99041 (21070304)
        488862.19   3626116.42   134.38892 (19030322)   489062.19
3626116.42   108.92146 (19042005)
        489082.19   3626116.42   104.18933 (19042005)   489102.19
3626116.42   100.68651 (20041204)

*** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL   ***
INCLUDING SOURCE(S):   L0000001   , L0000002

, L0000003   , L0000004 ,   L0000005   ,
L0000006   , L0000007   , L0000008   , L0000009   , L0000010
, L0000011   , L0000012 ,   L0000013   ,
L0000014   , L0000015   , L0000016   , L0000017   , L0000018
, L0000019   , L0000020 ,   L0000021   ,
L0000022   , L0000023   , L0000024   ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
489122.19	3626116.42	99.10853	(20031420)	489142.19	3626116.42	96.36242	(20031420)
489162.19	3626116.42	91.94426	(20031420)	489182.19	3626116.42	89.81429	(20090222)
488782.19	3626136.42	151.88054	(19082501)	488802.19	3626136.42	149.75406	(21070304)
488822.19	3626136.42	143.73350	(21070304)	488842.19	3626136.42	139.72397	(19030322)
488862.19	3626136.42	136.76611	(19030322)	489082.19	3626136.42	103.43903	(20031420)
489102.19	3626136.42	101.06674	(20031420)	489122.19	3626136.42	96.81377	(20031420)
489142.19	3626136.42	93.55712	(20090222)	489162.19	3626136.42	92.77888	(20090222)
489182.19	3626136.42	90.55954	(20090222)	488782.19	3626156.42	155.25161	(21070304)
488802.19	3626156.42	148.22844	(20101020)	488822.19	3626156.42	144.80921	(19030322)
488842.19	3626156.42	139.83736	(19030322)	488862.19	3626156.42	135.86726	(21020920)
488882.19	3626156.42	133.11526	(21020920)	489102.19	3626156.42	97.97256	(20102421)
489122.19	3626156.42	96.86545	(20090222)	489142.19	3626156.42	94.65461	(20090222)
489162.19	3626156.42	91.53812	(20072623)	489182.19	3626156.42	90.90602	(19050723)
488782.19	3626176.42	153.50016	(20101020)	488802.19	3626176.42	149.63683	(19030322)
488822.19	3626176.42	143.11883	(20012621)	488842.19	3626176.42	141.20523	(21020920)
488862.19	3626176.42	136.46982	(20062624)	488882.19	3626176.42	133.23744	(20062624)
489122.19	3626176.42	95.40753	(20090222)	489142.19			

3626176.42   94.46738 (19050723)
        489162.19   3626176.42   94.29630 (19050723)   489182.19
3626176.42   92.82321 (19050723)
        488782.19   3626196.42   154.10625 (19030322)   488802.19
3626196.42   147.98791 (21020920)
        488822.19   3626196.42   146.04728 (21020920)   488842.19
3626196.42   141.37708 (20062624)
        488862.19   3626196.42   135.97850 (20062624)   488882.19
3626196.42   130.75452 (19050724)
        488902.19   3626196.42   130.48815 (19042005)   489142.19
3626196.42   96.34363 (19050723)
        489162.19   3626196.42   94.45280 (19042004)   489182.19
3626196.42   92.03256 (19042004)
        489202.19   3626196.42   88.64893 (19042004)   488782.19
3626216.42   154.59692 (21020920)
        488802.19   3626216.42   150.36005 (21020920)   488822.19
3626216.42   145.58419 (20062624)
        488842.19   3626216.42   138.77040 (20102322)   488862.19
3626216.42   135.57231 (19042005)
        488882.19   3626216.42   135.86010 (19042005)   488902.19
3626216.42   132.67548 (19042005)
        489142.19   3626216.42   95.88597 (19042004)   489162.19
3626216.42   92.14716 (19042004)
        489182.19   3626216.42   89.55557 (21071622)   489202.19
3626216.42   87.72056 (21100604)
        489222.19   3626216.42   86.66950 (21100604)   489242.19
3626216.42   84.85421 (21100604)
        489262.19   3626216.42   82.41907 (21072324)   488782.19
3626236.42   154.79617 (21073002)
        488802.19   3626236.42   149.11687 (21073002)   488822.19
3626236.42   142.49120 (20102322)
        488842.19   3626236.42   142.16723 (19042005)   488862.19
3626236.42   140.15892 (19042005)
        488882.19   3626236.42   134.70738 (19042005)   488902.19
3626236.42   128.94313 (20120918)
        489142.19   3626236.42   93.17748 (21071622)   489162.19
3626236.42   91.66576 (21100604)
        489182.19   3626236.42   90.19357 (21100604)   489202.19
3626236.42   87.93221 (21100604)
        489222.19   3626236.42   85.74529 (21072324)   489242.19
3626236.42   84.16539 (21072324)
        489262.19   3626236.42   83.21618 (19092701)   488782.19
3626256.42   152.49014 (20102322)
        488802.19   3626256.42   148.41900 (19042005)   488822.19
3626256.42   147.67428 (19042005)
        488842.19   3626256.42   143.30506 (19042005)   488862.19
3626256.42   136.68741 (20120918)

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE 1ST HIGHEST 1-HR AVERAGE CONCENTRATION VALUES FOR SOURCE GROUP: ALL ***
INCLUDING SOURCE(S): L0000001 , L0000002 , L0000003 , L0000004 , L0000005 ,
L0000006 , L0000007 , L0000008 , L0000009 , L0000010 , L0000011 , L0000012 , L0000013 ,
L0000014 , L0000015 , L0000016 , L0000017 , L0000018 , L0000019 , L0000020 , L0000021 ,
L0000022 , L0000023 , L0000024 ,

*** DISCRETE CARTESIAN RECEPTOR POINTS ***

** CONC OF PM_10 IN MICROGRAMS/M**3 **

X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)	X-COORD (M)	Y-COORD (M)	CONC	(YYMMDDHH)
488882.19	3626256.42	131.98217	(20031420)	488902.19	3626256.42	127.38910	(20031420)
488922.19	3626256.42	122.09244	(20090222)	489142.19	3626256.42	93.84192	(21100604)
489162.19	3626256.42	90.95961	(21100604)	489222.19	3626256.42	86.78009	(19092701)
489242.19	3626256.42	85.22809	(19092701)	489262.19	3626256.42	83.17599	(19060822)
488882.19	3626276.42	129.10546	(19083123)	488902.19	3626276.42	126.32602	(20090222)
488922.19	3626276.42	122.21228	(20090222)	489142.19	3626276.42	92.48364	(19092701)
489162.19	3626276.42	91.41758	(19092701)	489242.19	3626276.42	85.29775	(19060822)
489262.19	3626276.42	83.30075	(19060822)	488882.19	3626296.42	129.02453	(20090222)
488902.19	3626296.42	124.49300	(21083022)	489262.19	3626296.42	82.76408	(20072422)
489282.19	3626296.42	81.40183	(19050722)	488902.19	3626316.42	127.88585	(19042004)
489282.19	3626316.42	80.60393	(19050722)	489302.19	3626316.42	78.89580	(20081822)
488902.19	3626336.42	125.38694	(19042004)	488922.19	3626336.42	119.05779	(21100604)
489302.19	3626336.42	79.42308	(21070101)	489322.19			

3626336.42 78.03264 (21070101)
488922.19 3626356.42 118.89460 (21100604) 488942.19
3626356.42 115.28294 (19092701)
489322.19 3626356.42 78.08297 (19073123) 488942.19
3626376.42 115.75466 (19092701)
488962.19 3626376.42 113.24069 (19060822) 489322.19
3626376.42 78.34754 (19072303)
489342.19 3626376.42 76.79396 (19072303) 488962.19
3626396.42 112.25512 (19083024)
489322.19 3626396.42 77.90404 (19043020) 489342.19
3626396.42 76.48873 (19043020)
489342.19 3626416.42 75.66610 (21072101) 489342.19
3626436.42 75.07914 (21062324)
488086.20 3626768.13 489.13486 (21040602) 488077.21
3626746.82 428.23063 (19120716)
488075.79 3626778.08 492.32549 (21011618) 488002.86
3626694.73 298.05136 (19042203)
487535.35 3626865.62 160.44432 (21020701) 487693.75
3626992.77 233.31474 (19120404)
487795.04 3626883.94 259.42682 (19121406) 487871.55
3626830.06 305.42316 (19121406)
487958.83 3626811.74 413.35897 (19120404) 488041.80
3626794.50 638.87983 (19120405)
488094.61 3626765.41 1124.79465 (19120716) 488046.12
3626714.76 491.67625 (19121406)
488007.32 3626665.19 349.53736 (21112423) 487941.59
3626599.46 260.50270 (19040823)
487911.42 3626574.68 253.79861 (19040823) 487815.52
3626540.19 190.23568 (19040823)
487709.91 3626504.63 132.07890 (19021102) 487555.82
3626439.98 115.41809 (19021102)
487490.09 3626487.39 120.54378 (19040823) 487428.67
3626556.36 113.11054 (19022001)
487358.63 3626713.68 125.62266 (20012319) 487522.42
3626827.90 149.71191 (21120107)
488235.45 3625424.52 99.15975 (19032623) 488562.08
3625540.85 107.61370 (19101221)
488747.03 3625794.41 135.59801 (21081502) 488857.40
3625879.42 123.64564 (21073103)
489054.28 3625949.52 101.46822 (20101020) 489134.82
3625964.44 94.69264 (21020920)
489178.07 3626085.25 93.28538 (20031420) 489203.43
3626198.60 87.90580 (19042004)
489260.10 3626203.08 83.59621 (21100604) 489276.51
3626217.99 81.63549 (21072324)
489267.56 3626265.72 83.36471 (19060822) 489336.17
3626346.26 76.98473 (19073123)
489361.53 3626432.77 73.82058 (21062324) 489331.70
3626449.18 76.19919 (20012420)
489309.32 3626361.18 78.77322 (19073123) 489258.61

3626298.53   82.90632 (20072422)
        489190.00   3626228.43   89.39616 (21100604)   489149.73
3626317.92   91.98224 (19060822)
        489130.34   3626250.81   94.67582 (21100604)   489137.80
3626216.50   96.56339 (19042004)

 *** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

                              *** THE   1ST HIGHEST 1-HR AVERAGE CONCENTRATION
VALUES FOR SOURCE GROUP: ALL   ***
                                  INCLUDING SOURCE(S):   L0000001   , L0000002
, L0000003   , L0000004 ,   L0000005   ,
                 L0000006   , L0000007   , L0000008   , L0000009   , L0000010
, L0000011   , L0000012 ,   L0000013   ,
                 L0000014   , L0000015   , L0000016   , L0000017   , L0000018
, L0000019   , L0000020 ,   L0000021   ,
                 L0000022   , L0000023   , L0000024   ,

                                                *** DISCRETE CARTESIAN RECEPTOR POINTS
***

                                           **   CONC OF PM_10   IN MICROGRAMS/M**3
                      **

      X-COORD (M) Y-COORD (M)   CONC   (YYMMDDHH)   X-COORD (M)
Y-COORD (M)   CONC   (YYMMDDHH)
 -
- -
        489054.28   3626106.13   109.16345 (19042005)   489036.38
3626036.03   107.11351 (21020920)
        488921.53   3625997.25   120.10840 (21091202)   488846.96
3625983.83   130.41372 (19101420)
        488872.31   3626110.61   133.19006 (19030322)   488902.14
3626194.13   129.67745 (19042005)
        488931.97   3626270.20   120.89720 (20090222)   488908.77
3626298.76   123.97389 (19042004)
        488936.81   3626348.34   117.02343 (21100604)   488971.36
3626378.01   111.82962 (19060822)
        488968.11   3626409.72   109.44312 (21081521)   488903.08
3626355.25   122.58181 (21062024)
        488864.87   3626256.49   135.99854 (20120918)   488763.27
3626259.34   159.37822 (21073002)
        488787.87   3625962.95   140.97072 (20071102)   488735.67
3625906.27   146.24081 (20112002)
        488620.82   3625988.31   184.73672 (21081502)   488588.00

3625956.98   173.64735 (21042721)
        488671.53   3625861.52   144.66015 (19100221)   488629.77
3625813.79   155.50619 (19082901)
        488588.00   3625746.67   135.89478 (19090303)   488571.59
3625648.23   124.23847 (20060721)
        488516.41   3625666.13   126.14929 (19032522)   488522.37
3625581.11   126.28279 (19052822)
        488431.39   3625576.63   111.07806 (20060224)   488447.79
3625615.41   119.92041 (20021420)
        488388.13   3625616.90   122.96197 (20070402)   488398.57
3625706.40   129.42842 (21122219)
        488406.03   3625745.18   139.61470 (20021420)   488392.60
3625776.50   143.96525 (20060224)
        488350.84   3625722.81   150.19195 (19080704)   488279.24
3625769.05   147.69058 (19110723)
        488282.23   3625807.83   156.28686 (19110723)   488246.43
3625851.08   166.69667 (19032623)
        488230.02   3625946.54   200.35778 (19032623)   488188.26
3625924.17   177.74261 (20113019)
        488213.62   3625757.11   139.82692 (20091504)   488170.36
3625779.49   145.77895 (20113019)
        488170.36   3625733.25   137.76244 (20113019)   488077.88
3625697.45   123.87694 (20090823)
        487973.47   3625822.74   127.21276 (19041502)   487955.57
3625809.32   124.59184 (19111401)
        488058.49   3625678.06   119.62733 (20091324)   488057.00
3625618.40   112.36097 (20090823)
        488107.71   3625596.02   113.03318 (21102122)   488185.27
3625576.63   111.88736 (20113019)
        488228.53   3625528.90   108.56401 (19032623)   488233.01
3625482.66   105.17506 (19032623)

*** MODELOPTs: CONC ELEV   FLGPOL URBAN SigA Data

*** THE SUMMARY OF MAXIMUM PERIOD (26304 HRS) RESULTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

NETWORK
GROUP ID   AVERAGE CONC   RECEPTOR (XR, YR, ZELEV, ZHILL, ZFLAG) OF TYPE GRID-ID

```
- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - -

PASS      1ST HIGHEST VALUE IS      71.38897 AT (  488094.61,  3626765.41,    19.58,
  123.49,   0.00)  DC
          2ND HIGHEST VALUE IS      62.54838 AT (  488086.96,  3626764.52,    19.58,
  123.49,   0.00)  DC
          3RD HIGHEST VALUE IS      50.79627 AT (  488066.96,  3626744.52,    19.63,
  123.49,   0.00)  DC
          4TH HIGHEST VALUE IS      45.95855 AT (  488066.96,  3626764.52,    19.57,
  123.49,   0.00)  DC
          5TH HIGHEST VALUE IS      42.06057 AT (  488046.12,  3626714.76,    19.26,
  123.54,   0.00)  DC
          6TH HIGHEST VALUE IS      41.31107 AT (  488046.96,  3626724.52,    19.43,
  123.54,   0.00)  DC
          7TH HIGHEST VALUE IS      38.64284 AT (  488046.96,  3626744.52,    19.58,
  123.49,   0.00)  DC
          8TH HIGHEST VALUE IS      35.81141 AT (  488046.96,  3626764.52,    19.45,
  123.48,   0.00)  DC
          9TH HIGHEST VALUE IS      33.99934 AT (  488026.96,  3626704.52,    19.33,
  123.63,   0.00)  DC
         10TH HIGHEST VALUE IS      32.55787 AT (  488026.96,  3626724.52,    19.26,
  123.49,   0.00)  DC

TRUCK     1ST HIGHEST VALUE IS      65.37882 AT (  488094.61,  3626765.41,    19.58,
  123.49,   0.00)  DC
          2ND HIGHEST VALUE IS      57.91255 AT (  488086.96,  3626764.52,    19.58,
  123.49,   0.00)  DC
          3RD HIGHEST VALUE IS      47.89815 AT (  488066.96,  3626744.52,    19.63,
  123.49,   0.00)  DC
          4TH HIGHEST VALUE IS      43.33661 AT (  488066.96,  3626764.52,    19.57,
  123.49,   0.00)  DC
          5TH HIGHEST VALUE IS      39.88850 AT (  488046.12,  3626714.76,    19.26,
  123.54,   0.00)  DC
          6TH HIGHEST VALUE IS      39.29393 AT (  488046.96,  3626724.52,    19.43,
  123.54,   0.00)  DC
          7TH HIGHEST VALUE IS      36.84563 AT (  488046.96,  3626744.52,    19.58,
  123.49,   0.00)  DC
          8TH HIGHEST VALUE IS      34.11460 AT (  488046.96,  3626764.52,    19.45,
  123.48,   0.00)  DC
          9TH HIGHEST VALUE IS      32.47053 AT (  488026.96,  3626704.52,    19.33,
  123.63,   0.00)  DC
         10TH HIGHEST VALUE IS      31.22570 AT (  488026.96,  3626724.52,    19.26,
  123.49,   0.00)  DC

ALL       1ST HIGHEST VALUE IS     136.76779 AT (  488094.61,  3626765.41,    19.58,
  123.49,   0.00)  DC
          2ND HIGHEST VALUE IS     120.46093 AT (  488086.96,  3626764.52,    19.58,
  123.49,   0.00)  DC
          3RD HIGHEST VALUE IS      98.69442 AT (  488066.96,  3626744.52,    19.63,
```

123.49,   0.00) DC
        4TH HIGHEST VALUE IS   89.29516 AT (488066.96, 3626764.52,   19.57,
123.49,   0.00) DC
        5TH HIGHEST VALUE IS   81.94906 AT (488046.12, 3626714.76,   19.26,
123.54,   0.00) DC
        6TH HIGHEST VALUE IS   80.60500 AT (488046.96, 3626724.52,   19.43,
123.54,   0.00) DC
        7TH HIGHEST VALUE IS   75.48848 AT (488046.96, 3626744.52,   19.58,
123.49,   0.00) DC
        8TH HIGHEST VALUE IS   69.92600 AT (488046.96, 3626764.52,   19.45,
123.48,   0.00) DC
        9TH HIGHEST VALUE IS   66.46987 AT (488026.96, 3626704.52,   19.33,
123.63,   0.00) DC
       10TH HIGHEST VALUE IS   63.78357 AT (488026.96, 3626724.52,   19.26,
123.49,   0.00) DC

*** RECEPTOR TYPES: GC = GRIDCART
GP   = GRIDPOLR
DC   = DISCCART
DP   = DISCPOLR

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE SUMMARY OF HIGHEST 1-HR RESULTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

DATE
NETWORK
GROUP ID   AVERAGE CONC   (YYMMDDHH)   RECEPTOR (XR, YR, ZELEV, ZHILL, ZFLAG) OF   TYPE GRID-ID
- -

PASS   HIGH   1ST HIGH VALUE IS   597.84336 ON 19120716: AT (488094.61, 3626765.41,   19.58,   123.49,   0.00) DC

TRUCK   HIGH   1ST HIGH VALUE IS   526.95129 ON 19120716: AT (488094.61, 3626765.41,   19.58,   123.49,   0.00) DC

ALL   HIGH   1ST HIGH VALUE IS   1124.79465 ON 19120716: AT (488094.61,

```
3626765.41,    19.58,   123.49,    0.00)  DC


 *** RECEPTOR TYPES:  GC = GRIDCART
                     GP   = GRIDPOLR
                     DC   = DISCCART
                     DP   = DISCPOLR
  *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
 *** AERMET - VERSION  22112 ***   ***
                        ***        14:45:58

                                   PAGE 119
 *** MODELOPTs:    CONC  ELEV   FLGPOL  URBAN  SigA Data

 *** Message Summary : AERMOD Model Execution ***

  --------- Summary of Total Messages --------

 A Total of          0    Fatal Error Message(s)
 A Total of          1    Warning Message(s)
 A Total of        1087  Informational Message(s)

 A Total of       26304  Hours Were Processed

 A Total of         318   Calm Hours Identified

 A Total of         769   Missing Hours Identified (  2.92 Percent)


    ******** FATAL ERROR MESSAGES ********
              ***   NONE  ***


    ********   WARNING MESSAGES   ********
 MX W403    153       PFLCNV: Turbulence data is being used w/o ADJ_U* option
SigA Data

    ************************************
    *** AERMOD Finishes Successfully ***
    ************************************
```

```
 *** MODELOPTs:   CONC  ELEV  FLGPOL  URBAN  SigA Data

                                   ***     MODEL SETUP OPTIONS SUMMARY ***
 - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

 ** Model Options Selected:
      * Model Allows User-Specified Options
      * Model Is Setup For Calculation of Average CONCentration Values.
      * NO GAS DEPOSITION Data Provided.
      * NO PARTICLE DEPOSITION Data Provided.
      * Model Uses NO DRY DEPLETION. DDPLETE  =  F
      * Model Uses NO WET DEPLETION. WETDPLT  =  F
      * Stack-tip Downwash.
      * Model Accounts for ELEVated Terrain Effects.
      * Use Calms Processing Routine.
      * Use Missing Data Processing Routine.
      * No Exponential Decay.
      * Model Uses URBAN Dispersion Algorithm for the SBL for    24 Source(s),
        for  Total of    1 Urban Area(s):
   Urban Population =   3276208.0 ;  Urban  Roughness Length =  1.000 m
      * Urban Roughness Length of 1.0 Meter Used.
      * CCVR_Sub - Meteorological data includes CCVR substitutions
      * Model Accepts FLAGPOLE Receptor . Heights.
      * The User Specified a Pollutant Type of: PM_10

 **Model Calculates  1 Short Term Average(s) of:   1-HR
     and Calculates PERIOD Averages

 **This Run Includes:     24 Source(s);     3   Source Group(s); and    1248 Receptor(s)

                with:      0 POINT(s), including
                           0 POINTCAP(s) and      0 POINTHOR(s)
                 and:     24 VOLUME source(s)
                 and:      0 AREA type source(s)
                 and:      0 LINE source(s)
                 and:      0 RLINE/RLINEXT source(s)
                 and:      0 OPENPIT source(s)
                 and:      0 BUOYANT LINE source(s) with a total of     0 line(s)
                 and:      0 SWPOINT source(s)
```

**Model Set To Continue RUNning After the Setup Testing.

**The AERMET Input Meteorological Data Version Date: 22112

**Output Options Selected:
Model Outputs Tables of PERIOD Averages by Receptor
Model Outputs Tables of Highest Short Term Values by Receptor (RECTABLE Keyword)
Model Outputs External File(s) of High Values for Plotting (PLOTFILE Keyword)
Model Outputs Separate Summary File of High Ranked Values (SUMMFILE Keyword)

**NOTE: The Following Flags May Appear Following CONC Values: c for Calm Hours
m for Missing Hours
b for Both Calm and Missing Hours

**Misc. Inputs: Base Elev. for Pot. Temp. Profile (m MSL) = 132.00 ; Decay Coef. = 0.000 ; Rot. Angle = 0.0
Emission Units = GRAMS/SEC ; Emission Rate Unit Factor = 0.10000E+07
Output Units = MICROGRAMS/M**3

**Approximate Storage Requirements of Model = 3.8 MB of RAM.

**Input Runstream File: aermod.inp

**Output Print File: aermod.out

**Detailed Error/Message File: Fenton Parkway Bridge Project EIR.err

**File for Summary of Results: Fenton Parkway Bridge Project EIR.sum

*** AERMOD - VERSION 23132 *** *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton Parkway Bridge Project EIR\ *** 12/21/23
*** AERMET - VERSION 22112 *** ***
*** 14:45:58

PAGE 2
*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** METEOROLOGICAL DAYS SELECTED FOR PROCESSING ***
(1=YES; 0=NO)

1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1

```
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1  1 1  1 1 1 1 1 1 1 1   1 1 1
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1  1 1  1 1 1 1 1 1 1 1   1 1 1
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1  1 1  1 1 1 1 1 1 1 1   1 1 1
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1  1 1  1 1 1 1 1 1 1 1   1 1 1
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1  1 1  1 1 1 1 1 1 1 1   1 1 1
1 1 1 1 1 1 1   1 1 1 1 1 1 1 1 1 1
            1 1 1 1 1 1 1 1 1 1   1 1 1 1 1
```

NOTE: METEOROLOGICAL DATA ACTUALLY PROCESSED WILL ALSO DEPEND ON WHAT IS INCLUDED IN THE DATA FILE.

*** UPPER BOUND OF FIRST THROUGH FIFTH WIND SPEED CATEGORIES ***

(METERS/SEC)

1.54, 3.09, 5.14, 8.23, 10.80,

*** UP TO THE FIRST 24 HOURS OF METEOROLOGICAL DATA ***

Surface file: ..\Fenton Parkway Construction2\SDAPCD Kearny MetData\KVR_2019-2021_v22112.SFC   Met Version: 22112
Profile file: ..\Fenton Parkway Construction2\SDAPCD Kearny MetData\KVR_2019-2021_v22112.PFL
Surface format: FREE

Profile format: FREE

Surface station no.: 93107   Upper air station no.: 3190
Name: UNKNOWN   Name: UNKNOWN

Year: 2019   Year: 2019

First 24 hours of scalar data
YR MO DY JDY HR H0 U* W* DT/DZ ZICNV ZIMCH M-O LEN Z0 BOWEN

```
ALBEDO  REF  WS   WD      HT  REF TA    HT
- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - -
 19 01 01   1 01 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   1.34   41.    10.0  282.9   10.0
 19 01 01   1 02 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   1.70   14.    10.0  281.6   10.0
 19 01 01   1 03 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.15   1.21
1.00   1.21  355.    10.0  281.3   10.0
 19 01 01   1 04 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   1.34   23.    10.0  281.5   10.0
 19 01 01   1 05 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   2.28    9.    10.0  281.0   10.0
 19 01 01   1 06 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   2.24   27.    10.0  279.5   10.0
 19 01 01   1 07 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   2.82   31.    10.0  279.4   10.0
 19 01 01   1 08 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.15   1.21
0.50   2.32  356.    10.0  279.8   10.0
 19 01 01   1 09 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.30   2.24   40.    10.0  283.0   10.0
 19 01 01   1 10 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
0.23   3.49   65.    10.0  285.2   10.0
 19 01 01   1 11 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.21   4.51   59.    10.0  286.8   10.0
 19 01 01   1 12 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.20   7.24   52.    10.0  287.3   10.0
 19 01 01   1 13 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.20   7.60   51.    10.0  287.1   10.0
 19 01 01   1 14 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.21   6.79   54.    10.0  287.1   10.0
 19 01 01   1 15 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.24   7.06   52.    10.0  287.1   10.0
 19 01 01   1 16 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.33   5.72   55.    10.0  286.4   10.0
 19 01 01   1 17 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
0.61   2.64   53.    10.0  285.2   10.0
 19 01 01   1 18 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   5.50   50.    10.0  283.4   10.0
 19 01 01   1 19 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   4.38   59.    10.0  281.6   10.0
 19 01 01   1 20 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   4.29   62.    10.0  280.9   10.0
 19 01 01   1 21 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   4.34   60.    10.0  281.0   10.0
 19 01 01   1 22 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
1.00   2.64   72.    10.0  280.1   10.0
 19 01 01   1 23 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.08   1.21
1.00   3.49   58.    10.0  279.4   10.0
 19 01 01   1 24 -999.0 -9.000 -9.000 -9.000 -999. -999. -99999.0  0.10   1.21
```

```
1.00   2.73   77.    10.0  279.3   10.0


 First  hour of profile data
  YR MO DY HR HEIGHT F  WDIR   WSPD  AMB_TMP sigmaA  sigmaW  sigmaV
  19 01 01 01   10.0 1   41.   1.34   283.0   18.0  -99.00   0.40

  F indicates top of profile (=1) or below (=0)
   *** AERMOD - VERSION 23132  ***   *** C:\Users\apoll\Desktop\HARP2\HARP\Fenton
Parkway Bridge Project EIR\ ***        12/21/23
  *** AERMET - VERSION  22112 ***   ***
                       ***        14:45:58

                                  PAGE   4
  *** MODELOPTs:    CONC  ELEV   FLGPOL  URBAN  SigA Data

                                        *** THE SUMMARY OF MAXIMUM PERIOD ( 26304
HRS) RESULTS ***


                                    ** CONC OF PM_10    IN MICROGRAMS/M**3
             **



                        NETWORK
GROUP ID                       AVERAGE CONC                RECEPTOR  (XR, YR, ZELEV,
ZHILL, ZFLAG)  OF TYPE  GRID-ID
- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - -

PASS      1ST HIGHEST VALUE IS      71.38897 AT (  488094.61,  3626765.41,    19.58,
  123.49,   0.00)  DC
          2ND HIGHEST VALUE IS      62.54838 AT (  488086.96,  3626764.52,    19.58,
  123.49,   0.00)  DC
          3RD HIGHEST VALUE IS      50.79627 AT (  488066.96,  3626744.52,    19.63,
  123.49,   0.00)  DC
          4TH HIGHEST VALUE IS      45.95855 AT (  488066.96,  3626764.52,    19.57,
  123.49,   0.00)  DC
          5TH HIGHEST VALUE IS      42.06057 AT (  488046.12,  3626714.76,    19.26,
  123.54,   0.00)  DC
          6TH HIGHEST VALUE IS      41.31107 AT (  488046.96,  3626724.52,    19.43,
  123.54,   0.00)  DC
          7TH HIGHEST VALUE IS      38.64284 AT (  488046.96,  3626744.52,    19.58,
  123.49,   0.00)  DC
          8TH HIGHEST VALUE IS      35.81141 AT (  488046.96,  3626764.52,    19.45,
  123.48,   0.00)  DC
          9TH HIGHEST VALUE IS      33.99934 AT (  488026.96,  3626704.52,    19.33,
  123.63,   0.00)  DC
         10TH HIGHEST VALUE IS      32.55787 AT (  488026.96,  3626724.52,    19.26,
  123.49,   0.00)  DC
```

```
TRUCK      1ST HIGHEST VALUE IS      65.37882 AT (  488094.61,  3626765.41,     19.58,
  123.49,    0.00)  DC
           2ND HIGHEST VALUE IS      57.91255 AT (  488086.96,  3626764.52,     19.58,
  123.49,    0.00)  DC
           3RD HIGHEST VALUE IS      47.89815 AT (  488066.96,  3626744.52,     19.63,
  123.49,    0.00)  DC
           4TH HIGHEST VALUE IS      43.33661 AT (  488066.96,  3626764.52,     19.57,
  123.49,    0.00)  DC
           5TH HIGHEST VALUE IS      39.88850 AT (  488046.12,  3626714.76,     19.26,
  123.54,    0.00)  DC
           6TH HIGHEST VALUE IS      39.29393 AT (  488046.96,  3626724.52,     19.43,
  123.54,    0.00)  DC
           7TH HIGHEST VALUE IS      36.84563 AT (  488046.96,  3626744.52,     19.58,
  123.49,    0.00)  DC
           8TH HIGHEST VALUE IS      34.11460 AT (  488046.96,  3626764.52,     19.45,
  123.48,    0.00)  DC
           9TH HIGHEST VALUE IS      32.47053 AT (  488026.96,  3626704.52,     19.33,
  123.63,    0.00)  DC
          10TH HIGHEST VALUE IS      31.22570 AT (  488026.96,  3626724.52,     19.26,
  123.49,    0.00)  DC

ALL        1ST HIGHEST VALUE IS     136.76779 AT (  488094.61,  3626765.41,     19.58,
  123.49,    0.00)  DC
           2ND HIGHEST VALUE IS     120.46093 AT (  488086.96,  3626764.52,     19.58,
  123.49,    0.00)  DC
           3RD HIGHEST VALUE IS      98.69442 AT (  488066.96,  3626744.52,     19.63,
  123.49,    0.00)  DC
           4TH HIGHEST VALUE IS      89.29516 AT (  488066.96,  3626764.52,     19.57,
  123.49,    0.00)  DC
           5TH HIGHEST VALUE IS      81.94906 AT (  488046.12,  3626714.76,     19.26,
  123.54,    0.00)  DC
           6TH HIGHEST VALUE IS      80.60500 AT (  488046.96,  3626724.52,     19.43,
  123.54,    0.00)  DC
           7TH HIGHEST VALUE IS      75.48848 AT (  488046.96,  3626744.52,     19.58,
  123.49,    0.00)  DC
           8TH HIGHEST VALUE IS      69.92600 AT (  488046.96,  3626764.52,     19.45,
  123.48,    0.00)  DC
           9TH HIGHEST VALUE IS      66.46987 AT (  488026.96,  3626704.52,     19.33,
  123.63,    0.00)  DC
          10TH HIGHEST VALUE IS      63.78357 AT (  488026.96,  3626724.52,     19.26,
  123.49,    0.00)  DC


 *** RECEPTOR TYPES:  GC = GRIDCART
                     GP   = GRIDPOLR
                     DC   = DISCCART
                     DP   = DISCPOLR
```

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** THE SUMMARY OF HIGHEST 1-HR RESULTS ***

** CONC OF PM_10   IN MICROGRAMS/M**3 **

```
                                                             DATE
                                                NETWORK
GROUP ID                         AVERAGE CONC     (YYMMDDHH)             RECEPTOR
(XR, YR, ZELEV, ZHILL, ZFLAG)  OF   TYPE  GRID-ID
- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -
- - - - - - - - - - - - - - - - - - - - - - - - -

PASS     HIGH   1ST HIGH VALUE IS     597.84336  ON 19120716: AT (  488094.61,
3626765.41,    19.58,   123.49,    0.00)  DC

TRUCK    HIGH   1ST HIGH VALUE IS     526.95129  ON 19120716: AT (  488094.61,
3626765.41,    19.58,   123.49,    0.00)  DC

ALL      HIGH   1ST HIGH VALUE IS    1124.79465  ON 19120716: AT (  488094.61,
3626765.41,    19.58,   123.49,    0.00)  DC
```

*** RECEPTOR TYPES: GC = GRIDCART
GP   = GRIDPOLR
DC   = DISCCART
DP   = DISCPOLR

*** MODELOPTs: CONC ELEV FLGPOL URBAN SigA Data

*** Message Summary : AERMOD Model Execution ***

--------- Summary of Total Messages --------

A Total of   0   Fatal Error Message(s)
A Total of   1   Warning Message(s)
A Total of   1087 Informational Message(s)

```
 A Total of       26304  Hours Were Processed

 A Total of        318   Calm Hours Identified

 A Total of        769   Missing Hours Identified (  2.92 Percent)


    ******** FATAL ERROR MESSAGES ********
              ***   NONE  ***


    ********   WARNING MESSAGES   ********
 MX W403    153       PFLCNV: Turbulence data is being used w/o ADJ_U* option
SigA Data
```

HARP2 - HRACalc (dated 22118) 1/2/2024 11:28:59 AM - Output Log

GLCs loaded successfully
Pollutants loaded successfully
Pathway receptors loaded successfully
****
RISK SCENARIO SETTINGS

Receptor Type: Resident
Scenario: All
Calculation Method: Derived

****
EXPOSURE DURATION PARAMETERS FOR CANCER

Start Age: -0.25
Total Exposure Duration: 30

Exposure Duration Bin Distribution
3rd Trimester Bin: 0.25
0<2 Years Bin: 2
2<9 Years Bin: 0
2<16 Years Bin: 14
16<30 Years Bin: 14
16 to 70 Years Bin: 0

****
PATHWAYS ENABLED

NOTE: Inhalation is always enabled and used for all assessments. The remaining pathways are only used for cancer and noncancer chronic assessments.

Inhalation: True
Soil: True
Dermal: True
Mother's milk: True
Water: False
Fish: False
Homegrown crops: False
Beef: False
Dairy: False
Pig: False
Chicken: False
Egg: False

****
INHALATION

Daily breathing rate: RMP

```
**Worker Adjustment Factors**
Worker adjustment factors enabled: NO

**Fraction at time at home**
3rd Trimester to 16 years: OFF
16 years to 70 years: OFF

**********************************
SOIL & DERMAL PATHWAY SETTINGS

Deposition rate (m/s): 0.05
Soil mixing depth (m): 0.01
Dermal climate: Mixed

**********************************
TIER 2 SETTINGS
Tier2 not used.

**********************************

Calculating cancer risk
Cancer risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON PARKWAY OPS HRA\hra\Unmit_Ops_CancerRisk.csv
Cancer risk total by receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON PARKWAY OPS HRA\hra\Unmit_Ops_CancerRiskSumByRec.csv
Calculating chronic risk
Chronic risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON PARKWAY OPS HRA\hra\Unmit_Ops_NCChronicRisk.csv
Chronic risk total by receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON PARKWAY OPS HRA\hra\Unmit_Ops_NCChronicRiskSumByRec.csv
Calculating acute risk
Acute risk breakdown by pollutant and receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON PARKWAY OPS HRA\hra\Unmit_Ops_NCAcuteRisk.csv
Acute risk total by receptor saved to: C:\Users\enuno\OneDrive - Dudek\Desktop\Fenton Parkway\FENTON PARKWAY OPS HRA\hra\Unmit_Ops_NCAcuteRiskSumByRec.csv
HRA ran successfully
```