



Barker Logistics

MOBILE SOURCE HEALTH RISK ASSESSMENT

COUNTY OF RIVERSIDE

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12217-02 HRA Report

TABLE OF CONTENTS

TABLE OF CONTENTS.....	I
APPENDICES.....	I
LIST OF EXHIBITS.....	II
LIST OF TABLES.....	II
LIST OF ABBREVIATED TERMS.....	III
EXECUTIVE SUMMARY.....	1
1 INTRODUCTION.....	3
1.1 Site Location.....	4
1.2 Project Description.....	4
2 BACKGROUND.....	7
2.1 Background on Recommended Methodology.....	7
2.2 Emissions Estimation.....	7
2.3 Exposure Quantification.....	11
2.4 Carcinogenic Chemical Risk.....	14
2.5 Non-carcinogenic Exposures.....	16
2.6 Potential Project-Related DPM Source Cancer and Non-Cancer Risks.....	17
3 REFERENCES.....	20
4 CERTIFICATION.....	22

APPENDICES

APPENDIX 2.1: AERMOD MODEL INPUT/OUTPUT

APPENDIX 2.2: RISK CALCULATIONS

LIST OF EXHIBITS

EXHIBIT 1-A: LOCATION MAP	5
EXHIBIT 1-B: SITE PLAN.....	6
EXHIBIT 2-A: MODELED EMISSION SOURCES	10
EXHIBIT 2-B: MODELED RECEPTORS	18

LIST OF TABLES

TABLE ES-1: SUMMARY OF CANCER AND NON-CANCER RISKS	2
TABLE 2-1: 2020 WEIGHTED AVERAGE DPM EMISSIONS FACTORS	9
TABLE 2-3: AERMOD MODEL PARAMETERS.....	11
TABLE 2-2: DPM EMISSIONS FROM PROJECT TRUCKS (2021 ANALYSIS YEAR)	13
TABLE 2-4: EXPOSURE ASSUMPTIONS FOR INDIVIDUAL CANCER RISK (30 YEAR RESIDENTIAL)	14
TABLE 2-5: EXPOSURE ASSUMPTIONS FOR INDIVIDUAL CANCER RISK (25 YEAR WORKER)	14

LIST OF ABBREVIATED TERMS

(1)	Reference
µg	Microgram
AERMOD	American Meteorological Society/Environmental Protection Agency Regulatory Model
APS	Auxiliary Power System
AQMD	Air Quality Management District
ARB	Air Resources Board
CEQA	California Environmental Quality Act
CPF	Cancer Potency Factor
DPM	Diesel Particulate Matter
EMFAC	Emission Factor Model
EPA	Environmental Protection Agency
HHD	Heavy Heavy-Duty
HI	Hazard Index
HRA	Health Risk Assessment
LHD	Light Heavy-Duty
MATES	Multiple Air Toxics Exposure Study
MEIR	Maximally Exposed Individual Receptor
MEISC	Maximally Exposed Individual School Child
MEIW	Maximally Exposed Individual Worker
MHD	Medium Heavy-Duty
NAD	North American Datum
OEHHA	Office of Environmental Health Hazard Assessment
PCE	Passenger Car Equivalent
PM10	Particulate Matter 10 microns in diameter or less
Project	Barker Logistics
REL	Reference Exposure Level
RM	Recommended Measures
SCAQMD	South Coast Air Quality Management District
SRA	Source Receptor Area
TAC	Toxic Air Contaminant
TIA	Traffic Impact Analysis
URF	Unit Risk Factor
UTM	Universal Transverse Mercator
VMT	Vehicle Miles Traveled

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EXECUTIVE SUMMARY

This report evaluates the potential mobile source health risk impacts to sensitive receptors (residents) and adjacent workers associated with the development of the proposed Project, more specifically, health risk impacts as a result of exposure to diesel particulate matter (DPM) as a result of heavy-duty diesel trucks accessing the site. This section summarizes the significance criteria and Project mobile source health risks.

The results of the health risk assessment of lifetime cancer risk from Project-generated DPM emissions are provided in Table ES-1 below for the Project.

Residential Exposure Scenario:

The residential land use with the greatest potential exposure to Project DPM source emissions is located approximately 120 feet southeast of the Project site, south of Placentia Avenue. At the maximally exposed individual receptor (MEIR), the maximum incremental cancer risk attributable to Project DPM source emissions is estimated at 5.02 in one million, which is less than the threshold of 10 in one million. At this same location, non-cancer risks were estimated to be 0.002, which would not exceed the applicable threshold of 1.0. As such, the Project will not cause a significant human health or cancer risk to adjacent residences.

Worker Exposure Scenario:

The worker receptor land use with the greatest potential exposure to Project DPM source emissions is located immediately adjacent to the north of the Project site which is currently vacant but has a land use designation of Business Park (BP). At the maximally exposed individual worker (MEIW), the maximum incremental cancer risk impact at this location is 0.51 in one million which is less than the threshold of 10 in one million. Maximum non-cancer risks at this same location were estimated to be 0.002, which would not exceed the applicable threshold of 1.0. As such, the Project will not cause a significant human health or cancer risk to adjacent workers. Because they are located farther away than the closest MEIW receptor, all other modeled worker locations in the vicinity of the Project would be exposed to less emissions and therefore less risk than the MEIW identified herein.

School Child Exposure Scenario:

There are no schools located within a ¼ mile of the Project site. As such, there would be no significant impacts that would occur to any schools in the vicinity of the Project.

Proximity to sources of toxics is critical to determining the impact. In traffic-related studies, the additional non-cancer health risk attributable to proximity was seen within 1,000 feet and was strongest within 300 feet. California freeway studies show about a 70-percent drop-off in particulate pollution levels at 500 feet. Based on CARB and SCAQMD emissions and modeling analyses, an 80-percent drop-off in pollutant concentrations is expected at approximately 1,000 feet from a distribution center (1).

The 1,000-foot evaluation distance is supported by research-based findings concerning TAC emission dispersion rates from roadways and large sources showing that emissions diminish substantially between 500 and 1,000 feet from emission sources.

For purposes of this assessment, a one-quarter mile radius or 1,320 feet geographic scope is utilized for determining potential impacts to nearby schools. This radius is more robust than, and therefore provides a more health protective scenario for evaluation than the 1,000-foot impact radius identified above.

TABLE ES-1: SUMMARY OF CANCER AND NON-CANCER RISKS

Time Period	Location	Maximum Lifetime Cancer Risk (Risk per Million)	Significance Threshold (Risk per Million)	Exceeds Significance Threshold
30 Year Exposure	Maximum Exposed Sensitive Receptor	5.02	10	NO
25 Year Exposure	Maximum Exposed Worker Receptor	0.51	10	NO
Time Period	Location	Maximum Hazard Index	Significance Threshold	Exceeds Significance Threshold
Annual Average	Maximum Exposed Sensitive Receptor	0.002	1.0	NO
Annual Average	Maximum Exposed Worker Receptor	0.002	1.0	NO

1 INTRODUCTION

The purpose of this Health Risk Assessment (HRA) is to evaluate Project-related impacts to sensitive receptors (residential, schools) and adjacent workers as a result of heavy-duty diesel trucks accessing the site.

The South Coast Air Quality Management District (SCAQMD) reviewed the conceptual site plan for the proposed project and provided input to the City on the scope of the air quality analysis. SCAQMD identifies that if a proposed Project is expected to generate/attract heavy-duty diesel trucks, which emit diesel particulate matter (DPM), preparation of a mobile source HRA is recommended. This document serves to meet the SCAQMD's request for preparation of a HRA. The mobile source HRA has been prepared in accordance with the document Health Risk Assessment Guidance for Analyzing Cancer Risk from Mobile Source Diesel Idling Emissions for CEQA Air Quality Analysis (2) and is comprised of all relevant and appropriate procedures presented by the U.S. EPA, California Environmental Protection Agency and SCAQMD. Cancer risk is expressed in terms of expected incremental incidence per million population. The SCAQMD has established an incidence rate of ten (10) persons per million as the maximum acceptable incremental cancer risk due to DPM exposure. This threshold serves to determine whether or not a given project has a potentially significant development-specific and cumulative impact.

The AQMD has published a report on how to address cumulative impacts from air pollution: *White Paper on Potential Control Strategies to Address Cumulative Impacts from Air Pollution* (3). In this report the AQMD clearly states (Page D-3):

"...the AQMD uses the same significance thresholds for project specific and cumulative impacts for all environmental topics analyzed in an Environmental Assessment or EIR. The only case where the significance thresholds for project specific and cumulative impacts differ is the Hazard Index (HI) significance threshold for toxic air contaminant (TAC) emissions. The project specific (project increment) significance threshold is $HI > 1.0$ while the cumulative (facility-wide) is $HI > 3.0$. It should be noted that the HI is only one of three TAC emission significance thresholds considered (when applicable) in a CEQA analysis. The other two are the maximum individual cancer risk (MICR) and the cancer burden, both of which use the same significance thresholds (MICR of 10 in 1 million and cancer burden of 0.5) for project specific and cumulative impacts.

Projects that exceed the project-specific significance thresholds are considered by the SCAQMD to be cumulatively considerable. This is the reason project-specific and cumulative significance thresholds are the same. Conversely, projects that do not exceed the project-specific thresholds are generally not considered to be cumulatively significant."

The SCAQMD has also established non-carcinogenic risk parameters for use in HRAs. Non-carcinogenic risks are quantified by calculating a "hazard index," expressed as the ratio between the ambient pollutant concentration and its toxicity or Reference Exposure Level (REL). An REL is a concentration at or below which health effects are not likely to occur. A hazard index of less than one (1.0) means that adverse health effects are not expected. Within this analysis, non-carcinogenic exposures of less than 1.0 are considered less-than-significant.

1.1 SITE LOCATION

The proposed Barker Logistics site is located on the northeast corner of Patterson Avenue and Placentia Street, in unincorporated County of Riverside, as shown on Exhibit 1-A.

The Project site is currently vacant. Existing land uses near the site include residential homes located north, south, east, and west of the Project site. Existing and future-designated Business Park use is located east of the Project site. Interstate 215 (I-215) is located approximately 1,600 feet east of the Project site; Burlington National Santa Fe (BNSF) railroad lines are located roughly 1,500 feet east of the Project site; and the March Air Reserve Base/Inland Port Airport (MARB/IPA) is located roughly 2.5 miles northeast of the Project site.

1.2 PROJECT DESCRIPTION

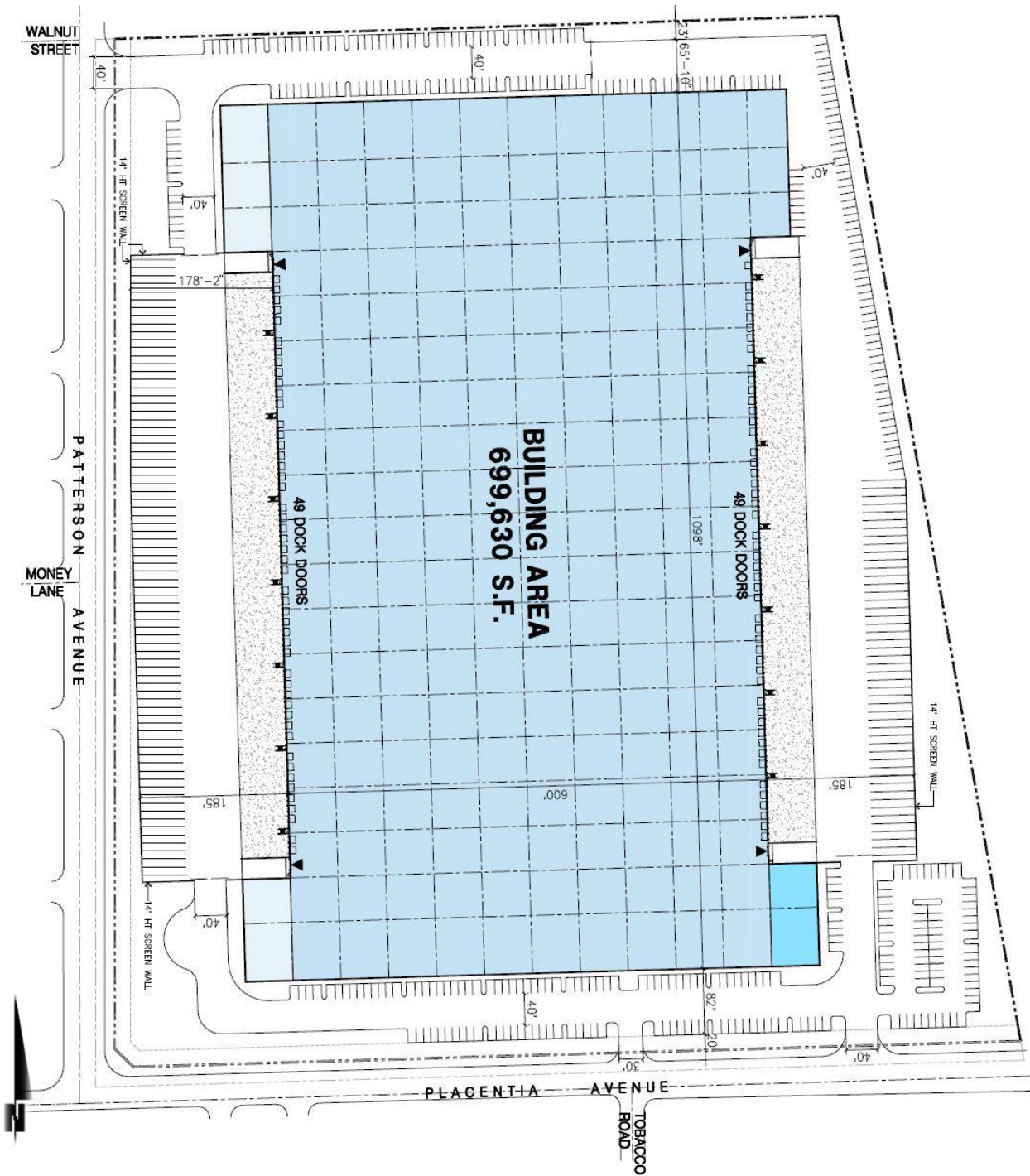
The Project is proposed to consist of up to 699,630 square feet (sf) of high-cube fulfillment center use, as shown on Exhibit 1-B. The Project is anticipated to be constructed in a single phase by the year 2021.

Per the *Barker Logistics Traffic Impact Analysis* prepared by Urban Crossroads, Inc. the Project is expected to generate a total of approximately 1,548 two-way trips per day (actual vehicles) and includes 276 two-way truck trips (4).

EXHIBIT 1-A: LOCATION MAP



EXHIBIT 1-B: SITE PLAN



2 BACKGROUND

2.1 BACKGROUND ON RECOMMENDED METHODOLOGY

ARB estimates that the average Californian is exposed to 1.2-1.8 $\mu\text{g}/\text{m}^3$ of DPM annually, this exposure results in an average cancer risk of 360-540 in one million for the average Californian exposed to DPM (5).

As noted above, this HRA is based on SCAQMD guidelines to produce conservative estimates of risk posed by exposure to DPM. The conservative nature of this analysis is due primarily to the following factors:

- The ARB-adopted diesel exhaust Unit Risk Factor (URF) of 300 in one million per $\mu\text{g}/\text{m}^3$ is based upon the upper 95 percentile of estimated risk for each of the epidemiological studies utilized to develop the URF. Using the 95th percentile URF represents a very conservative (health-protective) risk posed by DPM.
- The risk estimates assume sensitive receptors will be subject to DPM for 24 hours a day, 350 days a year.
- The emissions derived assume that every truck accessing the project site will idle for 15 minutes under the unmitigated scenario, this is an overestimation of actual idling times and thus conservative.¹ It should be noted that ARB's anti-idling requirements impose a 5-minute maximum idling time and therefore the analysis conservatively overestimates DPM emissions from idling by a factor of 3.

2.2 EMISSIONS ESTIMATION

2.2.1 ON-SITE AND OFF-SITE TRUCK ACTIVITY

Vehicle DPM emissions were estimated using emission factors for particulate matter less than 10 μm in diameter (PM_{10}) generated with the 2014 version of the Emission FACTor model (EMFAC) developed by the ARB. EMFAC 2014² is a mathematical model that was developed to calculate emission rates from motor vehicles that operate on highways, freeways, and local roads in California and is commonly used by the ARB to project changes in future emissions from on-road mobile sources (6). The most recent version of this model, EMFAC 2014, incorporates regional motor vehicle data, information and estimates regarding the distribution of vehicle miles traveled (VMT) by speed, and number of starts per day.

Several distinct emission processes are included in EMFAC 2014. Emission factors calculated using EMFAC 2014 are expressed in units of grams per vehicle miles traveled (g/VMT) or grams per idle-hour (g/idle-hr), depending on the emission process. The emission processes and

1 Although the Project is required to comply with ARB's idling limit of 5 minutes, staff at SCAQMD recommends that the on-site idling emissions should be estimated for 15 minutes of truck idling (personal communication, in person, with Jillian Wong, December 22, 2016), which would take into account on-site idling which occurs while the trucks are waiting to pull up to the truck bays, idling at the bays, idling at check-in and check-out, etc.

2 It should be noted that EMFAC 2014 is utilized herein as it is the latest approved version of EMFAC by US EPA. Although EMFAC 2017 has been released by the State, it is not yet approved for use by US EPA.

corresponding emission factor units associated with diesel particulate exhaust for this Project are presented below.

For this Project, annual average PM₁₀ emission factors were generated by running EMFAC 2014 in EMFAC Mode for vehicles in the Riverside County (South Coast) jurisdiction. The EMFAC Mode generates emission factors in terms of grams of pollutant emitted per vehicle activity and can calculate a matrix of emission factors at specific values of temperature, relative humidity, and vehicle speed. The model was run for speeds traveled in the vicinity of the Project. The vehicle travel speeds for each segment modeled are summarized below.

- Idling – on-site loading/unloading and truck gate
- 5 miles per hour – on-site vehicle movement including driving and maneuvering
- 25 miles per hour – off-site vehicle movement including driving and maneuvering.

Calculated emission factors are shown at Table 2-1. As a conservative measure, a 2021 EMFAC 2014 run was conducted and a static 2021 emissions factor data set was used for the entire duration of analysis herein (e.g., 30 years). Use of 2021 emission factors would overstate potential impacts since this approach assumes that emission factors remain “static” and do not change over time due to fleet turnover or cleaner technology with lower emissions that would be incorporated after 2021. Additionally, based on EMFAC2014, Light-Heavy-Duty Trucks comprise of 50.53% diesel, Medium-Heavy-Duty Trucks comprise of 89.41% diesel, and Heavy-Heavy-Duty Trucks comprise of 99.58% diesel trucks and have been accounted for accordingly in the emissions factor generation.

The vehicle DPM exhaust emissions were calculated for running exhaust emissions. The running exhaust emissions were calculated by applying the running exhaust PM₁₀ emission factor (g/VMT) from EMFAC over the total distance traveled. The following equation was used to estimate off-site emissions for each of the different vehicle classes comprising the mobile sources (6):

$$\text{Emissions}_{\text{SpeedA}} \text{ (g/s)} = \text{EF}_{\text{RunExhaust}} \text{ (g/VMT)} * \text{Distance (VMT/trip)} * \text{Number of Trips (trips/day)} / \text{seconds per day}$$

Where:

Emissions_{SpeedA} (g/s): Vehicle emissions at a given speed A;

EF_{RunExhaust} (g/VMT): EMFAC running exhaust PM₁₀ emission factor at speed A;

Distance (VMT/trip): Total distance traveled per trip.

Similar to off-site traffic, on-site vehicle running emissions were calculated by applying the running exhaust PM₁₀ emission factor (g/VMT) from EMFAC and the total vehicle trip number over the length of the driving path using the same formula presented above for on-site emissions. In addition, on-site vehicle idling exhaust emissions were calculated by applying the idle exhaust PM₁₀ emission factor (g/idle-hr) from EMFAC and the total truck trip over the total idle time (15 minutes). The following equation was used to estimate the on-site vehicle idling emissions for each of the different vehicle classes (6):

$$\text{Emissions}_{\text{idle}} (\text{g/s}) = \text{EF}_{\text{idle}} (\text{g/hr}) * \text{Number of Trips (trips/day)} * \text{Idling Time (min/trip)} * 60 \text{ minutes per hour / seconds per day}$$

Where:

$\text{Emissions}_{\text{idle}}$ (g/s): Vehicle emissions during idling;

EF_{idle} (g/s): EMFAC idle exhaust PM_{10} emission factor.

TABLE 2-1: 2020 WEIGHTED AVERAGE DPM EMISSIONS FACTORS

Speed	Weighted Average
0 (idling)	0.09486 (g/idle-hr)
5	0.03422 (g/s)
25	0.01737(g/s)

Each roadway was modeled as a line source (made up of multiple adjacent volume sources). Due to the large number of volume sources modeled for this analysis, the corresponding coordinates of each volume source have not been included in this report but are included in Appendix "2.1". The DPM emission rate for each volume source was calculated by multiplying the emission factor (based on the average travel speed along the roadway) by the number of trips and the distance traveled along each roadway segment and dividing the result by the number of volume sources along that roadway, as illustrated on Table 2-2. The modeled emission sources are illustrated on Exhibit 2-A. The modeled truck travel routes included in the HRA are based on the truck trip distributions (inbound and outbound) available from the Project's Traffic Impact Analysis (TIA) (4). The modeled truck route is consistent with the trip distribution patterns identified in the Project's traffic study, is supported by substantial evidence, and was modeled to determine the potential impacts to sensitive receptors along the primary truck routes. The modeling domain is limited to the Project's primary truck route and includes off-site sources in the study area for more than 1 mile. This modeling domain is more conservative than using only a ¼ mile modeling domain which is supported by substantial evidence since several studies have shown that the greatest potential risks occur within a ¼ mile of the primary source of emissions (1) (in the case of the Project this is the on-site idling, travel, and on-site equipment).

On-site truck idling was estimated to occur as trucks enter and travel through the facility. Although the Project is required to comply with CARB's idling limit of 5 minutes, staff at SCAQMD recommends that the on-site idling emissions should be estimated for 15 minutes of truck idling (7), which would take into account on-site idling which occurs while the trucks are waiting to pull up to the truck bays, idling at the bays, idling at check-in and check-out, etc. As such, this analysis estimated truck idling at 15 minutes, consistent with SCAQMD's recommendation.

EXHIBIT 2-A: MODELED EMISSION SOURCES

Trip characteristics available from the report, *Barker Logistics Traffic Impact Analysis* (Urban Crossroads, Inc., 2019) were utilized in this analysis (4). Per the trip generation analysis, the Project is expected to generate a total of approximately 1,548 trip-ends per day (actual vehicles) and includes 276 truck trip-ends per day (4). Per the traffic study, the truck fleet for the high-cube fulfillment center warehouse use is broken down by truck type (or axle type). The total truck percentage is comprised of 2 different truck types: percent 2-4 axle and percent 5+ axle trucks. For purposes of analysis, it is assumed that 50 percent of the 2-4 axle trucks are light heavy duty (LHD) and the remaining 50 percent are medium heavy duty (MHD). As such, the following truck fleet mix was utilized in order to estimate the truck trip generation for the site: 21.5% of the total trucks as 2-axle trucks, 21.5% of the total trucks as 3-4-axle trucks, and 57.0% of the total trucks as 5+-axle trucks.

2.3 EXPOSURE QUANTIFICATION

The analysis herein has been conducted in accordance with the guidelines in the Health Risk Assessment Guidance for Analyzing Cancer Risks from Mobile Source Diesel Idling Emissions for CEQA Air Quality Analysis (2). SCAQMD recommends using the Environmental Protection Agency's (U.S. EPA's) AERMOD model. For purposes of this analysis, the model was used to calculate annual average particulate concentrations associated with site operations.

The model offers additional flexibility by allowing the user to assign an initial release height and vertical dispersion parameters for mobile sources representative of a roadway. For this HRA, the roadways were modeled as adjacent volume sources. Roadways were modeled using the U.S. EPA's haul route methodology for modeling of on-site and off-site truck movement. More specifically, the Haul Road Volume Source Calculator in AERMOD View has been utilized to determine the release height parameters. Based on the US EPA methodology, the Project's modeled sources would result in a release height of 3.49 meters, and an initial lateral dimension of 4.0 meters, and an initial vertical dimension of 3.25 meters.

SCAQMD required model parameters are presented in Table 2-3 (8). The model requires additional input parameters including emission data and local meteorology. Meteorological data from the SCAQMD's Perris monitoring station (SRA 24) was used to represent local weather conditions and prevailing winds (9).

TABLE 2-3: AERMOD MODEL PARAMETERS

Dispersion Coefficient	Urban
Terrain	Elevated (Regulatory Default)
Averaging Time	1 year (5-year Meteorological Data Set)
Receptor Height	0 meters (Regulatory Default)

Universal Transverse Mercator (UTM) coordinates for World Geodetic System (WGS) 84 were used to locate the project boundaries, each volume source location, and receptor locations in the project vicinity. The AERMOD dispersion model summary output files for the proposed facility are presented in Appendix "2.1".

Modeled sensitive receptors were placed at residential and non-residential locations. Based on recommendations from SCAQMD staff, a receptor grid with a maximum of 100 meters spacing were placed at residential and worker locations to ensure that the maximum impacts are properly analyzed.

TABLE 2-2: DPM EMISSIONS FROM PROJECT TRUCKS (2021 ANALYSIS YEAR)

Source	Trucks Per Day	Truck Emission Rates				Modeled Emission Rates (g/second)
		VMT ^a (miles/day)	Truck Emission Rate ^b (grams/mile)	Truck Emission Rate ^b (grams/idle-hour)	Daily Truck Emissions ^c (grams/day)	
On-Site Idling - West Side	69			0.0949	1.64	1.894E-05
On-Site Idling - East Side	69			0.0949	1.64	1.894E-05
On-Site Travel	276	202.81	0.0342		6.94	8.034E-05
Off-Site Travel 30% Inbound/Outbound Dwy 1 to Harvill/Placentia	83	52.99	0.0174		0.92	1.065E-05
Off-Site Travel 70% Inbound/Outbound Dwy 3 to Harvill/Placentia	193	182.64	0.0174		3.17	3.672E-05
Off-Site Travel 25% Inbound/Outbound to I-215 Freeway SB	69	65.23	0.0174		1.13	1.311E-05
Off-Site Travel 65% Inbound/Outbound to I-215 Freeway NB	179	210.72	0.0174		3.66	4.236E-05
Off-Site Travel 10% Inbound/Outbound to Cajalco Expwy	28	32.42	0.0174		0.56	6.517E-06
^a	Vehicle miles traveled are for modeled truck route only.					
^b	Emission rates determined using EMFAC 2014. Idle emission rates are expressed in grams per idle hour rather than grams per mile.					
^c	This column includes the total truck travel and truck idle emissions. For idle emissions this column includes emissions based on the assumption that each truck idles for 15 minutes.					

Receptors may be placed at applicable structure locations for residential and worker property and not necessarily the boundaries of these uses. It should be noted that the primary purpose of receptor placement is focused on long-term exposure. For example, the HRA evaluates the potential health risks to residential and worker over a period of 30 or 25 years of exposure, respectively. As such, even though it is unlikely to occur in practical terms (because the amount of time spent indoors), this study assumes that a resident or worker would be exposed over a long-period of time for 12 or 24-hours per day at the structure where they reside or work.

Furthermore, worker receptors immediately adjacent to the Project site have been evaluated in the HRA. Any impacts to workers located further away from the Project site than the modeled worker receptors would have a lesser impact than what has already been disclosed in the HRA at the MEIW.

Discrete variants for daily breathing rates, exposure frequency, and exposure duration were obtained from relevant distribution profiles presented in the 2015 OEHHA Guidelines. Tables 2-4 and 2-5 summarize the Exposure Parameters for Residents and Offsite Worker scenarios based on 2015 OEHHA Guidelines. Appendix 2.2 includes the detailed risk calculation.

TABLE 2-4: EXPOSURE ASSUMPTIONS FOR INDIVIDUAL CANCER RISK (30 YEAR RESIDENTIAL)

Age	Daily Breathing Rate (L/kg-day)	Age Specific Factor	Exposure Duration (years)	Fraction of Time at Home	Exposure Frequency (days/year)	Exposure Time (hours/day)
-0.25 to 0	273	10	0.25	0.85	350	24
0 to 2	758	10	2	0.85	350	24
2 to 16	572	3	14	0.72	365	24
16 to 30	261	1	14	0.73	365	24

TABLE 2-5: EXPOSURE ASSUMPTIONS FOR INDIVIDUAL CANCER RISK (25 YEAR WORKER)

Age	Daily Breathing Rate (L/kg-day)	Age Specific Factor	Exposure Duration (years)	Exposure Frequency (days/year)	Exposure Time (hours/day)
16 to 41	230	1	25	250	12

2.4 CARCINOGENIC CHEMICAL RISK

The SCAQMD [CEQA Air Quality Handbook](#) (1993) states that emissions of toxic air contaminants (TACs) are considered significant if a HRA shows an increased risk of greater than 10 in one million. Based on guidance from the SCAQMD in the document [Health Risk Assessment Guidance for Analyzing Cancer Risks from Mobile Source Diesel Idling Emissions for CEQA Air Quality Analysis](#) (2), for purposes of this analysis, 10 in one million is used as the cancer risk threshold for the proposed Project.

Excess cancer risks are estimated as the upper-bound incremental probability that an individual will develop cancer over a lifetime as a direct result of exposure to potential carcinogens over a specified exposure duration. The estimated risk is expressed as a unitless probability. The cancer risk attributed to a chemical is calculated by multiplying the chemical intake or dose at the human exchange boundaries (e.g., lungs) by the chemical-specific cancer potency factor (CPF). A risk level of 10 in one million implies a likelihood that up to 10 people, out of one million equally exposed people would contract cancer if exposed continuously (24 hours per day) to the levels of toxic air contaminants over a specified duration of time. As an example, the risk of dying from accidental drowning is 1,000 in a million which is 100 times more than the SCAQMD's threshold of 10 in one million, the nearest comparison to 10 in one million is the 7 in one million lifetime chance that an individual would be struck by lightning.

Guidance from CARB and the California Environmental Protection Agency, Office of Environmental Health Hazard Assessment (OEHHA) recommends a refinement to the standard point estimate approach when alternate human body weights and breathing rates are utilized to assess risk for susceptible subpopulations such as children. For the inhalation pathway, the procedure requires the incorporation of several discrete variates to effectively quantify dose. Once determined, contaminant dose is multiplied by the cancer potency factor (CPF) in units of inverse dose expressed in milligrams per kilogram per day (mg/kg/day)⁻¹ to derive the cancer risk estimate. Therefore, to assess exposures, the following dose algorithm was utilized.

$$\text{DOSE}_{\text{air}} = (\text{C}_{\text{air}} \times [\text{BR}/\text{BW}] \times \text{A} \times \text{EF}) \times (1 \times 10^{-6})$$

Where:

DOSE_{air} = chronic daily intake (mg/kg/day)

C_{air} = concentration of contaminant in air (ug/m³)

[BR/BW] = daily breathing rate normalized to body weight (L/kg BW-day)

A = inhalation absorption factor

EF = exposure frequency (days/365 days)

BW = body weight (kg)

1 x 10⁻⁶ = conversion factors (ug to mg, L to m³)

$$\text{RISK}_{\text{air}} = \text{DOSE}_{\text{air}} \times \text{CPF} \times \text{ED}/\text{AT}$$

Where:

DOSE_{air} = chronic daily intake (mg/kg/day)

CPF = cancer potency factor

ED = number of years within particular age group

AT = averaging time

2.5 NON-CARCINOGENIC EXPOSURES

An evaluation of the potential noncarcinogenic effects of chronic exposures was also conducted. Adverse health effects are evaluated by comparing a compound's annual concentration with its toxicity factor or Reference Exposure Level (REL). The REL for diesel particulates was obtained from OEHHA for this analysis. The chronic reference exposure level (REL) for DPM was established by OEHHA as 5 $\mu\text{g}/\text{m}^3$ (OEHHA Toxicity Criteria Database, <http://www.oehha.org/risk/chemicaldb/index.asp>).

The non-cancer hazard index was calculated (consistent with SCAQMD methodology) as follows:

The relationship for the non-cancer health effects of DPM is given by the following equation:

$$HI_{DPM} = C_{DPM}/REL_{DPM}$$

Where:

- HI_{DPM} = Hazard Index; an expression of the potential for non-cancer health effects.
- C_{DPM} = Annual average DPM concentration ($\mu\text{g}/\text{m}^3$).
- REL_{DPM} = Reference exposure level (REL) for DPM; the DPM concentration at which no adverse health effects are anticipated.

For purposes of this analysis the hazard index for the respiratory endpoint totaled less than one for all receptors in the project vicinity, and thus is less than significant.

2.6 POTENTIAL PROJECT-RELATED DPM SOURCE CANCER AND NON-CANCER RISKS³

Residential Exposure Scenario:

The residential land use with the greatest potential exposure to Project DPM source emissions is located approximately 120 feet southeast of the Project site, south of Placentia Avenue. At the MEIR, the maximum incremental cancer risk attributable to Project DPM source emissions is estimated at 5.02 in one million, which is less than the threshold of 10 in one million. At this same location, non-cancer risks were estimated to be 0.002, which would not exceed the applicable threshold of 1.0. As such, the Project will not cause a significant human health or cancer risk to adjacent residences. The nearest modeled receptors are illustrated on Exhibit 2-B.

Worker Exposure Scenario:

The worker receptor land use with the greatest potential exposure to Project DPM source emissions is located immediately adjacent to the north of the Project site which is currently vacant but has a land use designation of Business Park. At the MEIW, the maximum incremental cancer risk impact at this location is 0.51 in one million which is less than the threshold of 10 in one million. Maximum non-cancer risks at this same location were estimated to be 0.002, which would not exceed the applicable threshold of 1.0. As such, the Project will not cause a significant human health or cancer risk to adjacent workers. Because they are located farther away than the closest MEIW receptor, all other modeled worker locations in the vicinity of the Project would be exposed to less emissions and therefore less risk than the MEIW identified herein. The nearest modeled receptors are illustrated on Exhibit 2-B.

³ SCAQMD guidance does not require assessment of the potential health risk to on-site workers. Excerpts from the document OEHHA Air Toxics Hot Spots Program Risk Assessment Guidelines—The Air Toxics Hot Spots Program Guidance Manual for Preparation of Health Risk Assessments (OEHHA 2003), also indicate that it is not necessary to examine the health effects to on-site workers unless required by RCRA (Resource Conservation and Recovery Act) / CERCLA (Comprehensive Environmental Response, Compensation, and Liability Act) or the worker resides on-site.

EXHIBIT 2-B: MODELED RECEPTORS



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3 REFERENCES

1. **Air Resources Board.** *Air Quality and Land Use Handbook: A Community Health Perspective.* 2005.
2. **South Coast Air Quality Management District.** Mobile Source Toxics Analysis. [Online] 2003. http://www.aqmd.gov/ceqa/handbook/mobile_toxic/mobile_toxic.html.
3. **Goss, Tracy A and Kroeger, Amy.** White Paper on Potential Control Strategies to Address Cumulative Impacts from Air Pollution. [Online] South Coast Air Quality Management District, 2003. http://www.aqmd.gov/rules/ciwg/final_white_paper.pdf.
4. **Urban Crossroads, Inc.** *Barker Logistics Traffic Impact Analysis.* March 2019.
5. **South Coast Air Quality Management District.** RULE 403. Fugitive Dust. [Online] <http://www.aqmd.gov/rules/reg/reg04/r403.pdf>.
6. **California Department of Transportation.** EMFAC Software. [Online] <http://www.dot.ca.gov/hq/env/air/pages/emfac.htm>.
7. **Koizumi, James.** *Planning, Rule Development & Area Sources.* May 6, 2009.
8. **Environmental Protection Agency.** User's Guide for the AMS/EPA Regulatory Model - AERMOD. [Online] September 2004. <http://www.epa.gov/scram001/7thconf/aermod/aermodugb.pdf>.
9. **South Coast Air Quality Management District.** *Air Quality Reporting.* [pdf] Diamond Bar : Sierra Wade Associates, 1999.

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4 CERTIFICATION

The contents of this health risk assessment represent an accurate depiction of the impacts to sensitive receptors associated with the proposed Barker Logistics Project. The information contained in this health risk assessment report is based on the best available data at the time of preparation. If you have any questions, please contact me directly at (949) 336-5987.

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URBAN CROSSROADS, INC.
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EDUCATION

Master of Science in Environmental Studies
California State University, Fullerton • May, 2010

Bachelor of Arts in Environmental Analysis and Design
University of California, Irvine • June, 2006

PROFESSIONAL AFFILIATIONS

AEP – Association of Environmental Planners
AWMA – Air and Waste Management Association
ASTM – American Society for Testing and Materials

PROFESSIONAL CERTIFICATIONS

Environmental Site Assessment – American Society for Testing and Materials • June, 2013
Planned Communities and Urban Infill – Urban Land Institute • June, 2011
Indoor Air Quality and Industrial Hygiene – EMSL Analytical • April, 2008
Principles of Ambient Air Monitoring – California Air Resources Board • August, 2007
AB2588 Regulatory Standards – Trinity Consultants • November, 2006
Air Dispersion Modeling – Lakes Environmental • June, 2006

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APPENDIX 2.1:
AERMOD MODEL INPUT/OUTPUT

12217 HRA

**

**

** AERMOD Input Produced by:
** AERMOD View Ver. 9.6.5
** Lakes Environmental Software Inc.
** Date: 3/18/2019
** File: C:\Lakes\AERMOD View\12217 HRA\12217 HRA.ADI

**

**

**

** AERMOD Control Pathway

**

**

CO STARTING
TITLEONE C:\Lakes\AERMOD View\12217 HRA\12217 HRA.isc
MODELOPT DFAULT CONC
AVERTIME ANNUAL
URBANOPT 2189641 Riverside_County
POLLUTID DPM
RUNORNOT RUN
ERRORFIL "12217 HRA.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 = SLINE1
** DESCRSRC On-Site Idling West Side
** PREFIX

** Length of Side = 8.59
** Configuration = Adjacent
** Emission Rate = 0.00001894
** Vertical Dimension = 6.99
** SZINIT = 3.25

** Nodes = 2
** 476668.158, 3742890.369, 472.35, 3.49, 4.00
** 476676.890, 3742651.427, 475.51, 3.49, 4.00

12217 HRA

** -----

LOCATION	VOLUME				
L0001742	476668.315	3742886.077	471.77		
L0001743	476668.629	3742877.493	471.75		
L0001744	476668.942	3742868.908	471.88		
L0001745	476669.256	3742860.324	472.05		
L0001746	476669.570	3742851.740	472.22		
L0001747	476669.884	3742843.155	472.33		
L0001748	476670.197	3742834.571	472.32		
L0001749	476670.511	3742825.987	472.31		
L0001750	476670.825	3742817.403	472.30		
L0001751	476671.138	3742808.818	472.54		
L0001752	476671.452	3742800.234	472.81		
L0001753	476671.766	3742791.650	473.09		
L0001754	476672.079	3742783.066	473.26		
L0001755	476672.393	3742774.481	473.25		
L0001756	476672.707	3742765.897	473.24		
L0001757	476673.021	3742757.313	473.23		
L0001758	476673.334	3742748.728	473.47		
L0001759	476673.648	3742740.144	473.74		
L0001760	476673.962	3742731.560	474.02		
L0001761	476674.275	3742722.976	474.29		
L0001762	476674.589	3742714.391	474.57		
L0001763	476674.903	3742705.807	474.84		
L0001764	476675.217	3742697.223	475.12		
L0001765	476675.530	3742688.639	475.14		
L0001766	476675.844	3742680.054	475.13		
L0001767	476676.158	3742671.470	475.12		
L0001768	476676.471	3742662.886	475.22		
L0001769	476676.785	3742654.302	475.50		

** End of LINE VOLUME Source ID = SLINE1

** -----

** Line Source Represented by Adjacent Volume Sources

** LINE VOLUME Source ID = SLINE2

** DESCRSRC On-Site Idling East Side

** PREFIX

** Length of Side = 8.59

** Configuration = Adjacent

** Emission Rate = 0.00001894

** Vertical Dimension = 6.99

** SZINIT = 3.25

** Nodes = 2

** 476867.409, 3742896.720, 464.85, 3.49, 4.00

** 476876.141, 3742658.571, 469.23, 3.49, 4.00

** -----

LOCATION L0001770	VOLUME	476867.566	3742892.427	464.74	
LOCATION L0001771	VOLUME	476867.881	3742883.843	464.73	
LOCATION L0001772	VOLUME	476868.196	3742875.259	464.75	
LOCATION L0001773	VOLUME	476868.510	3742866.675	465.03	

12217 HRA

LOCATION	VOLUME			
L0001774	476868.825	3742858.091	465.30	
L0001775	476869.140	3742849.506	465.58	
L0001776	476869.455	3742840.922	465.68	
L0001777	476869.769	3742832.338	465.67	
L0001778	476870.084	3742823.754	465.66	
L0001779	476870.399	3742815.169	465.68	
L0001780	476870.714	3742806.585	465.96	
L0001781	476871.029	3742798.001	466.23	
L0001782	476871.343	3742789.417	466.51	
L0001783	476871.658	3742780.832	466.61	
L0001784	476871.973	3742772.248	466.60	
L0001785	476872.288	3742763.664	466.59	
L0001786	476872.602	3742755.080	466.61	
L0001787	476872.917	3742746.496	466.89	
L0001788	476873.232	3742737.911	467.16	
L0001789	476873.547	3742729.327	467.44	
L0001790	476873.861	3742720.743	467.62	
L0001791	476874.176	3742712.159	467.75	
L0001792	476874.491	3742703.574	467.88	
L0001793	476874.806	3742694.990	468.04	
L0001794	476875.120	3742686.406	468.33	
L0001795	476875.435	3742677.822	468.61	
L0001796	476875.750	3742669.237	468.90	
L0001797	476876.065	3742660.653	469.18	

** End of LINE VOLUME Source ID = SLINE2

** -----

** Line Source Represented by Adjacent Volume Sources

** LINE VOLUME Source ID = SLINE3

** DESCRSRC On-Site Travel

** PREFIX

** Length of Side = 8.59

** Configuration = Adjacent

** Emission Rate = 0.00008034

** Vertical Dimension = 6.99

** SZINIT = 3.25

** Nodes = 8

** 476649.699, 3742950.495, 471.93, 3.49, 4.00

** 476656.357, 3742626.158, 477.18, 3.49, 4.00

** 476662.063, 3742598.575, 477.98, 3.49, 4.00

** 476670.867, 3742595.283, 477.41, 3.49, 4.00

** 476898.949, 3742601.686, 469.89, 3.49, 4.00

** 476889.465, 3742868.296, 464.22, 3.49, 4.00

** 476878.913, 3742966.222, 464.04, 3.49, 4.00

** 476651.826, 3742959.469, 471.93, 3.49, 4.00

** -----

LOCATION L0001798	VOLUME	476649.787	3742946.201	472.00
LOCATION L0001799	VOLUME	476649.963	3742937.613	472.00
LOCATION L0001800	VOLUME	476650.139	3742929.025	472.23

12217 HRA

LOCATION L0001801	VOLUME	476650.316	3742920.436	472.50
LOCATION L0001802	VOLUME	476650.492	3742911.848	472.77
LOCATION L0001803	VOLUME	476650.668	3742903.260	472.95
LOCATION L0001804	VOLUME	476650.845	3742894.672	472.93
LOCATION L0001805	VOLUME	476651.021	3742886.084	472.92
LOCATION L0001806	VOLUME	476651.197	3742877.495	472.91
LOCATION L0001807	VOLUME	476651.373	3742868.907	472.91
LOCATION L0001808	VOLUME	476651.550	3742860.319	472.92
LOCATION L0001809	VOLUME	476651.726	3742851.731	472.93
LOCATION L0001810	VOLUME	476651.902	3742843.143	472.93
LOCATION L0001811	VOLUME	476652.079	3742834.555	472.93
LOCATION L0001812	VOLUME	476652.255	3742825.966	472.92
LOCATION L0001813	VOLUME	476652.431	3742817.378	472.91
LOCATION L0001814	VOLUME	476652.608	3742808.790	473.15
LOCATION L0001815	VOLUME	476652.784	3742800.202	473.43
LOCATION L0001816	VOLUME	476652.960	3742791.614	473.71
LOCATION L0001817	VOLUME	476653.136	3742783.025	473.89
LOCATION L0001818	VOLUME	476653.313	3742774.437	473.88
LOCATION L0001819	VOLUME	476653.489	3742765.849	473.88
LOCATION L0001820	VOLUME	476653.665	3742757.261	473.87
LOCATION L0001821	VOLUME	476653.842	3742748.673	474.12
LOCATION L0001822	VOLUME	476654.018	3742740.084	474.40
LOCATION L0001823	VOLUME	476654.194	3742731.496	474.68
LOCATION L0001824	VOLUME	476654.371	3742722.908	474.96
LOCATION L0001825	VOLUME	476654.547	3742714.320	475.24
LOCATION L0001826	VOLUME	476654.723	3742705.732	475.52
LOCATION L0001827	VOLUME	476654.899	3742697.143	475.80
LOCATION L0001828	VOLUME	476655.076	3742688.555	475.83
LOCATION L0001829	VOLUME	476655.252	3742679.967	475.82
LOCATION L0001830	VOLUME	476655.428	3742671.379	475.81
LOCATION L0001831	VOLUME	476655.605	3742662.791	475.92
LOCATION L0001832	VOLUME	476655.781	3742654.203	476.20
LOCATION L0001833	VOLUME	476655.957	3742645.614	476.48
LOCATION L0001834	VOLUME	476656.134	3742637.026	476.76
LOCATION L0001835	VOLUME	476656.310	3742628.438	477.04
LOCATION L0001836	VOLUME	476657.635	3742619.979	477.28
LOCATION L0001837	VOLUME	476659.375	3742611.567	477.50
LOCATION L0001838	VOLUME	476661.116	3742603.156	477.72
LOCATION L0001839	VOLUME	476665.728	3742597.204	477.77
LOCATION L0001840	VOLUME	476673.969	3742595.370	477.56
LOCATION L0001841	VOLUME	476682.556	3742595.611	477.26
LOCATION L0001842	VOLUME	476691.142	3742595.852	476.97
LOCATION L0001843	VOLUME	476699.729	3742596.093	476.67
LOCATION L0001844	VOLUME	476708.315	3742596.334	476.38
LOCATION L0001845	VOLUME	476716.902	3742596.575	476.32
LOCATION L0001846	VOLUME	476725.489	3742596.816	476.31
LOCATION L0001847	VOLUME	476734.075	3742597.057	476.30
LOCATION L0001848	VOLUME	476742.662	3742597.298	476.17

12217 HRA

LOCATION L0001849	VOLUME	476751.248	3742597.539	475.80
LOCATION L0001850	VOLUME	476759.835	3742597.781	475.43
LOCATION L0001851	VOLUME	476768.422	3742598.022	475.06
LOCATION L0001852	VOLUME	476777.008	3742598.263	475.00
LOCATION L0001853	VOLUME	476785.595	3742598.504	473.26
LOCATION L0001854	VOLUME	476794.182	3742598.745	473.25
LOCATION L0001855	VOLUME	476802.768	3742598.986	473.12
LOCATION L0001856	VOLUME	476811.355	3742599.227	472.76
LOCATION L0001857	VOLUME	476819.941	3742599.468	472.40
LOCATION L0001858	VOLUME	476828.528	3742599.709	472.05
LOCATION L0001859	VOLUME	476837.115	3742599.950	471.76
LOCATION L0001860	VOLUME	476845.701	3742600.191	471.47
LOCATION L0001861	VOLUME	476854.288	3742600.432	471.19
LOCATION L0001862	VOLUME	476862.874	3742600.673	470.90
LOCATION L0001863	VOLUME	476871.461	3742600.914	470.61
LOCATION L0001864	VOLUME	476880.048	3742601.155	470.33
LOCATION L0001865	VOLUME	476888.634	3742601.397	470.04
LOCATION L0001866	VOLUME	476897.221	3742601.638	469.75
LOCATION L0001867	VOLUME	476898.706	3742608.543	469.71
LOCATION L0001868	VOLUME	476898.400	3742617.127	469.72
LOCATION L0001869	VOLUME	476898.095	3742625.712	469.73
LOCATION L0001870	VOLUME	476897.789	3742634.296	469.74
LOCATION L0001871	VOLUME	476897.484	3742642.881	469.52
LOCATION L0001872	VOLUME	476897.179	3742651.465	469.25
LOCATION L0001873	VOLUME	476896.873	3742660.050	468.97
LOCATION L0001874	VOLUME	476896.568	3742668.635	468.69
LOCATION L0001875	VOLUME	476896.263	3742677.219	468.42
LOCATION L0001876	VOLUME	476895.957	3742685.804	468.14
LOCATION L0001877	VOLUME	476895.652	3742694.388	467.87
LOCATION L0001878	VOLUME	476895.346	3742702.973	467.59
LOCATION L0001879	VOLUME	476895.041	3742711.557	467.31
LOCATION L0001880	VOLUME	476894.736	3742720.142	467.04
LOCATION L0001881	VOLUME	476894.430	3742728.727	466.76
LOCATION L0001882	VOLUME	476894.125	3742737.311	466.49
LOCATION L0001883	VOLUME	476893.820	3742745.896	466.21
LOCATION L0001884	VOLUME	476893.514	3742754.480	465.93
LOCATION L0001885	VOLUME	476893.209	3742763.065	465.89
LOCATION L0001886	VOLUME	476892.903	3742771.649	465.90
LOCATION L0001887	VOLUME	476892.598	3742780.234	465.91
LOCATION L0001888	VOLUME	476892.293	3742788.819	465.83
LOCATION L0001889	VOLUME	476891.987	3742797.403	465.55
LOCATION L0001890	VOLUME	476891.682	3742805.988	465.28
LOCATION L0001891	VOLUME	476891.376	3742814.572	465.00
LOCATION L0001892	VOLUME	476891.071	3742823.157	464.96
LOCATION L0001893	VOLUME	476890.766	3742831.741	464.97
LOCATION L0001894	VOLUME	476890.460	3742840.326	464.98
LOCATION L0001895	VOLUME	476890.155	3742848.911	464.90
LOCATION L0001896	VOLUME	476889.850	3742857.495	464.62

12217 HRA

LOCATION L0001897	VOLUME	476889.544	3742866.080	464.35
LOCATION L0001898	VOLUME	476888.783	3742874.632	464.09
LOCATION L0001899	VOLUME	476887.862	3742883.172	464.07
LOCATION L0001900	VOLUME	476886.942	3742891.713	464.10
LOCATION L0001901	VOLUME	476886.022	3742900.253	464.13
LOCATION L0001902	VOLUME	476885.101	3742908.794	464.14
LOCATION L0001903	VOLUME	476884.181	3742917.334	464.12
LOCATION L0001904	VOLUME	476883.261	3742925.875	464.08
LOCATION L0001905	VOLUME	476882.340	3742934.416	464.01
LOCATION L0001906	VOLUME	476881.420	3742942.956	464.00
LOCATION L0001907	VOLUME	476880.500	3742951.497	464.00
LOCATION L0001908	VOLUME	476879.579	3742960.037	464.00
LOCATION L0001909	VOLUME	476876.545	3742966.152	464.00
LOCATION L0001910	VOLUME	476867.959	3742965.897	464.00
LOCATION L0001911	VOLUME	476859.373	3742965.641	464.02
LOCATION L0001912	VOLUME	476850.786	3742965.386	464.30
LOCATION L0001913	VOLUME	476842.200	3742965.131	464.59
LOCATION L0001914	VOLUME	476833.614	3742964.875	464.87
LOCATION L0001915	VOLUME	476825.028	3742964.620	465.01
LOCATION L0001916	VOLUME	476816.442	3742964.365	465.03
LOCATION L0001917	VOLUME	476807.855	3742964.109	465.05
LOCATION L0001918	VOLUME	476799.269	3742963.854	465.08
LOCATION L0001919	VOLUME	476790.683	3742963.598	465.09
LOCATION L0001920	VOLUME	476782.097	3742963.343	466.00
LOCATION L0001921	VOLUME	476773.511	3742963.088	466.00
LOCATION L0001922	VOLUME	476764.924	3742962.832	466.16
LOCATION L0001923	VOLUME	476756.338	3742962.577	466.45
LOCATION L0001924	VOLUME	476747.752	3742962.322	466.74
LOCATION L0001925	VOLUME	476739.166	3742962.066	467.05
LOCATION L0001926	VOLUME	476730.580	3742961.811	467.62
LOCATION L0001927	VOLUME	476721.993	3742961.556	468.19
LOCATION L0001928	VOLUME	476713.407	3742961.300	468.76
LOCATION L0001929	VOLUME	476704.821	3742961.045	469.20
LOCATION L0001930	VOLUME	476696.235	3742960.790	469.54
LOCATION L0001931	VOLUME	476687.649	3742960.534	469.88
LOCATION L0001932	VOLUME	476679.062	3742960.279	470.24
LOCATION L0001933	VOLUME	476670.476	3742960.024	470.77
LOCATION L0001934	VOLUME	476661.890	3742959.768	471.28
LOCATION L0001935	VOLUME	476653.304	3742959.513	471.80

** End of LINE VOLUME Source ID = SLINE3

**

** Line Source Represented by Adjacent Volume Sources

** LINE VOLUME Source ID = SLINE4

** DESCRSRC 30% Inbound/Outbound Dwy 1 to Harvill/Placentia

** PREFIX

** Length of Side = 16.00

** Configuration = Adjacent

** Emission Rate = 0.00001065

12217 HRA

** Vertical Dimension = 6.99
 ** SZINIT = 3.25
 ** Nodes = 5
 ** 476613.336, 3742960.378, 473.07, 3.49, 7.44
 ** 476607.964, 3742565.236, 481.38, 3.49, 7.44
 ** 476815.784, 3742569.203, 473.38, 3.49, 7.44
 ** 477076.495, 3742572.068, 463.13, 3.49, 7.44
 ** 477242.663, 3742575.815, 458.15, 3.49, 7.44

** -----

LOCATION L0001936	VOLUME	476613.228	3742952.379	473.32
LOCATION L0001937	VOLUME	476613.010	3742936.380	473.45
LOCATION L0001938	VOLUME	476612.793	3742920.382	473.87
LOCATION L0001939	VOLUME	476612.575	3742904.383	474.24
LOCATION L0001940	VOLUME	476612.357	3742888.385	474.25
LOCATION L0001941	VOLUME	476612.140	3742872.386	474.29
LOCATION L0001942	VOLUME	476611.922	3742856.388	474.44
LOCATION L0001943	VOLUME	476611.705	3742840.389	474.54
LOCATION L0001944	VOLUME	476611.487	3742824.391	474.56
LOCATION L0001945	VOLUME	476611.270	3742808.392	474.76
LOCATION L0001946	VOLUME	476611.052	3742792.394	475.15
LOCATION L0001947	VOLUME	476610.835	3742776.395	475.30
LOCATION L0001948	VOLUME	476610.617	3742760.397	475.31
LOCATION L0001949	VOLUME	476610.400	3742744.398	475.71
LOCATION L0001950	VOLUME	476610.182	3742728.400	476.25
LOCATION L0001951	VOLUME	476609.965	3742712.401	476.79
LOCATION L0001952	VOLUME	476609.747	3742696.403	477.33
LOCATION L0001953	VOLUME	476609.530	3742680.404	477.52
LOCATION L0001954	VOLUME	476609.312	3742664.406	477.76
LOCATION L0001955	VOLUME	476609.095	3742648.407	478.31
LOCATION L0001956	VOLUME	476608.877	3742632.409	478.81
LOCATION L0001957	VOLUME	476608.660	3742616.410	479.16
LOCATION L0001958	VOLUME	476608.442	3742600.412	479.64
LOCATION L0001959	VOLUME	476608.225	3742584.413	480.39
LOCATION L0001960	VOLUME	476608.007	3742568.414	481.05
LOCATION L0001961	VOLUME	476620.783	3742565.481	480.32
LOCATION L0001962	VOLUME	476636.780	3742565.786	479.78
LOCATION L0001963	VOLUME	476652.777	3742566.092	479.24
LOCATION L0001964	VOLUME	476668.774	3742566.397	478.69
LOCATION L0001965	VOLUME	476684.771	3742566.702	478.15
LOCATION L0001966	VOLUME	476700.768	3742567.008	477.61
LOCATION L0001967	VOLUME	476716.765	3742567.313	477.23
LOCATION L0001968	VOLUME	476732.763	3742567.618	477.07
LOCATION L0001969	VOLUME	476748.760	3742567.924	476.49
LOCATION L0001970	VOLUME	476764.757	3742568.229	475.56
LOCATION L0001971	VOLUME	476780.754	3742568.534	475.25
LOCATION L0001972	VOLUME	476796.751	3742568.840	474.24
LOCATION L0001973	VOLUME	476812.748	3742569.145	473.37
LOCATION L0001974	VOLUME	476828.747	3742569.346	472.30

12217 HRA

LOCATION	VOLUME			
L0001975	476844.746	3742569.521	471.73	
L0001976	476860.745	3742569.697	471.19	
L0001977	476876.744	3742569.873	470.65	
L0001978	476892.743	3742570.049	470.09	
L0001979	476908.742	3742570.225	469.44	
L0001980	476924.741	3742570.400	468.84	
L0001981	476940.740	3742570.576	468.30	
L0001982	476956.739	3742570.752	467.77	
L0001983	476972.738	3742570.928	467.24	
L0001984	476988.737	3742571.104	466.70	
L0001985	477004.736	3742571.279	466.17	
L0001986	477020.735	3742571.455	465.33	
L0001987	477036.734	3742571.631	464.34	
L0001988	477052.733	3742571.807	463.72	
L0001989	477068.732	3742571.983	463.18	
L0001990	477084.730	3742572.254	463.07	
L0001991	477100.726	3742572.614	462.97	
L0001992	477116.721	3742572.975	462.44	
L0001993	477132.717	3742573.336	461.91	
L0001994	477148.713	3742573.696	461.37	
L0001995	477164.709	3742574.057	460.84	
L0001996	477180.705	3742574.418	460.31	
L0001997	477196.701	3742574.778	459.78	
L0001998	477212.697	3742575.139	459.26	
L0001999	477228.693	3742575.500	458.73	

** End of LINE VOLUME Source ID = SLINE4

**

** Line Source Represented by Adjacent Volume Sources

** LINE VOLUME Source ID = SLINE5

** DESCRSRC 70% Inbound/Outbound Dwy 3 to Harvill/Placentia

** PREFIX

** Length of Side = 16.00

** Configuration = Adjacent

** Emission Rate = 0.00003672

** Vertical Dimension = 6.99

** SZINIT = 3.25

** Nodes = 2

** 476900.697, 3742570.291, 469.99, 3.49, 7.44

** 477242.249, 3742575.815, 458.17, 3.49, 7.44

**

L0002000	476908.696	3742570.420	469.44	
L0002001	476924.694	3742570.679	468.84	
L0002002	476940.691	3742570.938	468.31	
L0002003	476956.689	3742571.196	467.77	
L0002004	476972.687	3742571.455	467.24	
L0002005	476988.685	3742571.714	466.71	
L0002006	477004.683	3742571.972	466.17	
L0002007	477020.681	3742572.231	465.33	

12217 HRA

LOCATION L0002008	VOLUME	477036.679	3742572.490	464.32
LOCATION L0002009	VOLUME	477052.677	3742572.749	463.69
LOCATION L0002010	VOLUME	477068.675	3742573.007	463.14
LOCATION L0002011	VOLUME	477084.673	3742573.266	463.05
LOCATION L0002012	VOLUME	477100.671	3742573.525	462.97
LOCATION L0002013	VOLUME	477116.668	3742573.784	462.44
LOCATION L0002014	VOLUME	477132.666	3742574.042	461.91
LOCATION L0002015	VOLUME	477148.664	3742574.301	461.37
LOCATION L0002016	VOLUME	477164.662	3742574.560	460.84
LOCATION L0002017	VOLUME	477180.660	3742574.818	460.31
LOCATION L0002018	VOLUME	477196.658	3742575.077	459.78
LOCATION L0002019	VOLUME	477212.656	3742575.336	459.26
LOCATION L0002020	VOLUME	477228.654	3742575.595	458.73

** End of LINE VOLUME Source ID = SLINE5

**

** Line Source Represented by Adjacent Volume Sources

** LINE VOLUME Source ID = SLINE6

** DESCRSRC 25% I-215 Freeway

** PREFIX

** Length of Side = 16.00

** Configuration = Adjacent

** Emission Rate = 0.00001311

** Vertical Dimension = 6.99

** SZINIT = 3.25

** Nodes = 6

** 477234.555, 3742576.475, 458.75, 3.49, 7.44

** 477354.082, 3742577.742, 456.05, 3.49, 7.44

** 477520.067, 3742576.475, 453.00, 3.49, 7.44

** 477562.725, 3742573.096, 452.70, 3.49, 7.44

** 477583.420, 3742504.674, 452.97, 3.49, 7.44

** 477596.936, 3742459.905, 453.46, 3.49, 7.44

**

LOCATION L0002021	VOLUME	477242.555	3742576.559	458.24
LOCATION L0002022	VOLUME	477258.554	3742576.729	458.00
LOCATION L0002023	VOLUME	477274.553	3742576.899	458.00
LOCATION L0002024	VOLUME	477290.552	3742577.068	457.64
LOCATION L0002025	VOLUME	477306.551	3742577.238	457.11
LOCATION L0002026	VOLUME	477322.551	3742577.407	456.58
LOCATION L0002027	VOLUME	477338.550	3742577.577	456.04
LOCATION L0002028	VOLUME	477354.549	3742577.738	456.00
LOCATION L0002029	VOLUME	477370.548	3742577.616	456.00
LOCATION L0002030	VOLUME	477386.548	3742577.494	455.98
LOCATION L0002031	VOLUME	477402.547	3742577.372	455.87
LOCATION L0002032	VOLUME	477418.547	3742577.250	455.36
LOCATION L0002033	VOLUME	477434.546	3742577.127	454.84
LOCATION L0002034	VOLUME	477450.546	3742577.005	454.31
LOCATION L0002035	VOLUME	477466.545	3742576.883	454.00
LOCATION L0002036	VOLUME	477482.545	3742576.761	454.00

12217 HRA

LOCATION L0002037	VOLUME	477498.545	3742576.639	453.71
LOCATION L0002038	VOLUME	477514.544	3742576.517	453.18
LOCATION L0002039	VOLUME	477530.511	3742575.647	453.01
LOCATION L0002040	VOLUME	477546.461	3742574.384	453.01
LOCATION L0002041	VOLUME	477562.411	3742573.121	452.62
LOCATION L0002042	VOLUME	477567.266	3742558.082	452.77
LOCATION L0002043	VOLUME	477571.898	3742542.767	453.03
LOCATION L0002044	VOLUME	477576.531	3742527.453	453.07
LOCATION L0002045	VOLUME	477581.163	3742512.138	452.96
LOCATION L0002046	VOLUME	477585.791	3742496.822	452.93
LOCATION L0002047	VOLUME	477590.415	3742481.505	453.10
LOCATION L0002048	VOLUME	477595.039	3742466.187	453.33

** End of LINE VOLUME Source ID = SLINE6

**

** Line Source Represented by Adjacent Volume Sources

** LINE VOLUME Source ID = SLINE7

** DESCRSRC 65% I-215 Freeway

** PREFIX

** Length of Side = 16.00

** Configuration = Adjacent

** Emission Rate = 0.00004236

** Vertical Dimension = 6.99

** SZINIT = 3.25

** Nodes = 6

** 477234.555, 3742576.475, 458.75, 3.49, 7.44

** 477354.082, 3742577.742, 456.05, 3.49, 7.44

** 477520.067, 3742576.475, 453.00, 3.49, 7.44

** 477562.725, 3742573.096, 452.70, 3.49, 7.44

** 477658.389, 3742572.765, 451.14, 3.49, 7.44

** 477865.860, 3742565.824, 448.29, 3.49, 7.44

**

LOCATION L0002049	VOLUME	477242.555	3742576.559	458.24
LOCATION L0002050	VOLUME	477258.554	3742576.729	458.00
LOCATION L0002051	VOLUME	477274.553	3742576.899	458.00
LOCATION L0002052	VOLUME	477290.552	3742577.068	457.64
LOCATION L0002053	VOLUME	477306.551	3742577.238	457.11
LOCATION L0002054	VOLUME	477322.551	3742577.407	456.58
LOCATION L0002055	VOLUME	477338.550	3742577.577	456.04
LOCATION L0002056	VOLUME	477354.549	3742577.738	456.00
LOCATION L0002057	VOLUME	477370.548	3742577.616	456.00
LOCATION L0002058	VOLUME	477386.548	3742577.494	455.98
LOCATION L0002059	VOLUME	477402.547	3742577.372	455.87
LOCATION L0002060	VOLUME	477418.547	3742577.250	455.36
LOCATION L0002061	VOLUME	477434.546	3742577.127	454.84
LOCATION L0002062	VOLUME	477450.546	3742577.005	454.31
LOCATION L0002063	VOLUME	477466.545	3742576.883	454.00
LOCATION L0002064	VOLUME	477482.545	3742576.761	454.00
LOCATION L0002065	VOLUME	477498.545	3742576.639	453.71

12217 HRA

LOCATION L0002066	VOLUME	477514.544	3742576.517	453.18
LOCATION L0002067	VOLUME	477530.511	3742575.647	453.01
LOCATION L0002068	VOLUME	477546.461	3742574.384	453.01
LOCATION L0002069	VOLUME	477562.411	3742573.121	452.62
LOCATION L0002070	VOLUME	477578.410	3742573.042	452.15
LOCATION L0002071	VOLUME	477594.410	3742572.986	452.05
LOCATION L0002072	VOLUME	477610.410	3742572.931	451.98
LOCATION L0002073	VOLUME	477626.410	3742572.876	451.51
LOCATION L0002074	VOLUME	477642.410	3742572.820	451.10
LOCATION L0002075	VOLUME	477658.410	3742572.765	451.04
LOCATION L0002076	VOLUME	477674.401	3742572.230	451.00
LOCATION L0002077	VOLUME	477690.392	3742571.695	451.00
LOCATION L0002078	VOLUME	477706.383	3742571.159	450.78
LOCATION L0002079	VOLUME	477722.374	3742570.624	450.25
LOCATION L0002080	VOLUME	477738.365	3742570.089	450.00
LOCATION L0002081	VOLUME	477754.356	3742569.554	450.00
LOCATION L0002082	VOLUME	477770.347	3742569.019	449.73
LOCATION L0002083	VOLUME	477786.338	3742568.484	449.34
LOCATION L0002084	VOLUME	477802.329	3742567.949	449.16
LOCATION L0002085	VOLUME	477818.320	3742567.414	449.02
LOCATION L0002086	VOLUME	477834.311	3742566.879	448.67
LOCATION L0002087	VOLUME	477850.302	3742566.344	448.32

** End of LINE VOLUME Source ID = SLINE7

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** Line Source Represented by Adjacent Volume Sources

** LINE VOLUME Source ID = SLINE8

** DESCRSRC 10% to Cajalco Expwy

** PREFIX

** Length of Side = 16.00

** Configuration = Adjacent

** Emission Rate = 6.517E-06

** Vertical Dimension = 6.99

** SZINIT = 3.25

** Nodes = 20

- ** 477243.991, 3742579.999, 458.10, 0.00, 7.44
- ** 477238.223, 3742622.025, 458.67, 0.00, 7.44
- ** 477207.733, 3742720.911, 458.51, 0.00, 7.44
- ** 477142.633, 3742897.257, 459.72, 0.00, 7.44
- ** 477088.246, 3743052.178, 460.04, 0.00, 7.44
- ** 476981.120, 3743378.501, 460.21, 0.00, 7.44
- ** 476834.440, 3743769.100, 457.91, 0.00, 7.44
- ** 476833.051, 3743780.088, 457.98, 0.00, 7.44
- ** 476810.063, 3743846.358, 458.00, 0.00, 7.44
- ** 476739.674, 3744046.804, 460.00, 0.00, 7.44
- ** 476728.137, 3744078.942, 460.00, 0.00, 7.44
- ** 476726.489, 3744116.024, 460.06, 0.00, 7.44
- ** 476726.489, 3744178.652, 459.52, 0.00, 7.44
- ** 476716.799, 3744278.393, 458.93, 0.00, 7.44

12217 HRA

** 476684.533, 3744356.691, 459.11, 0.00, 7.44
 ** 476660.442, 3744383.794, 459.78, 0.00, 7.44
 ** 476545.577, 3744474.998, 461.06, 0.00, 7.44
 ** 476435.444, 3744551.575, 462.00, 0.00, 7.44
 ** 476394.574, 3744579.108, 462.64, 0.00, 7.44
 ** 476360.119, 3744606.232, 463.00, 0.00, 7.44

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LOCATION L0002088	VOLUME	477242.903	3742587.924	458.23
LOCATION L0002089	VOLUME	477240.728	3742603.776	458.30
LOCATION L0002090	VOLUME	477238.552	3742619.627	458.38
LOCATION L0002091	VOLUME	477234.222	3742635.002	458.52
LOCATION L0002092	VOLUME	477229.507	3742650.292	458.68
LOCATION L0002093	VOLUME	477224.793	3742665.581	458.84
LOCATION L0002094	VOLUME	477220.079	3742680.871	458.99
LOCATION L0002095	VOLUME	477215.364	3742696.161	459.00
LOCATION L0002096	VOLUME	477210.650	3742711.450	458.65
LOCATION L0002097	VOLUME	477205.621	3742726.633	458.47
LOCATION L0002098	VOLUME	477200.080	3742741.643	458.66
LOCATION L0002099	VOLUME	477194.539	3742756.653	458.84
LOCATION L0002100	VOLUME	477188.998	3742771.663	459.03
LOCATION L0002101	VOLUME	477183.457	3742786.673	459.21
LOCATION L0002102	VOLUME	477177.915	3742801.683	459.19
LOCATION L0002103	VOLUME	477172.374	3742816.693	458.99
LOCATION L0002104	VOLUME	477166.833	3742831.703	458.88
LOCATION L0002105	VOLUME	477161.292	3742846.713	458.95
LOCATION L0002106	VOLUME	477155.751	3742861.723	459.14
LOCATION L0002107	VOLUME	477150.210	3742876.732	459.32
LOCATION L0002108	VOLUME	477144.669	3742891.742	459.51
LOCATION L0002109	VOLUME	477139.281	3742906.807	459.67
LOCATION L0002110	VOLUME	477133.981	3742921.904	459.41
LOCATION L0002111	VOLUME	477128.681	3742937.001	459.04
LOCATION L0002112	VOLUME	477123.381	3742952.097	459.22
LOCATION L0002113	VOLUME	477118.081	3742967.194	459.39
LOCATION L0002114	VOLUME	477112.781	3742982.291	459.57
LOCATION L0002115	VOLUME	477107.481	3742997.387	459.75
LOCATION L0002116	VOLUME	477102.181	3743012.484	459.92
LOCATION L0002117	VOLUME	477096.881	3743027.581	460.00
LOCATION L0002118	VOLUME	477091.582	3743042.678	460.00
LOCATION L0002119	VOLUME	477086.396	3743057.813	460.00
LOCATION L0002120	VOLUME	477081.406	3743073.015	460.00
LOCATION L0002121	VOLUME	477076.415	3743088.217	460.00
LOCATION L0002122	VOLUME	477071.425	3743103.419	460.00
LOCATION L0002123	VOLUME	477066.434	3743118.621	460.00
LOCATION L0002124	VOLUME	477061.444	3743133.822	460.00
LOCATION L0002125	VOLUME	477056.453	3743149.024	460.00
LOCATION L0002126	VOLUME	477051.463	3743164.226	460.00
LOCATION L0002127	VOLUME	477046.472	3743179.428	460.00
LOCATION L0002128	VOLUME	477041.482	3743194.630	460.00

12217 HRA

LOCATION L0002129	VOLUME	477036.491	3743209.831	460.11
LOCATION L0002130	VOLUME	477031.501	3743225.033	460.28
LOCATION L0002131	VOLUME	477026.510	3743240.235	460.38
LOCATION L0002132	VOLUME	477021.520	3743255.437	460.22
LOCATION L0002133	VOLUME	477016.529	3743270.639	460.00
LOCATION L0002134	VOLUME	477011.539	3743285.840	460.00
LOCATION L0002135	VOLUME	477006.548	3743301.042	460.11
LOCATION L0002136	VOLUME	477001.558	3743316.244	460.28
LOCATION L0002137	VOLUME	476996.567	3743331.446	460.44
LOCATION L0002138	VOLUME	476991.577	3743346.648	460.61
LOCATION L0002139	VOLUME	476986.586	3743361.849	460.63
LOCATION L0002140	VOLUME	476981.596	3743377.051	460.29
LOCATION L0002141	VOLUME	476976.032	3743392.051	460.13
LOCATION L0002142	VOLUME	476970.407	3743407.030	460.32
LOCATION L0002143	VOLUME	476964.782	3743422.009	460.40
LOCATION L0002144	VOLUME	476959.157	3743436.987	460.21
LOCATION L0002145	VOLUME	476953.532	3743451.966	460.00
LOCATION L0002146	VOLUME	476947.907	3743466.945	460.02
LOCATION L0002147	VOLUME	476942.282	3743481.923	460.00
LOCATION L0002148	VOLUME	476936.657	3743496.902	460.00
LOCATION L0002149	VOLUME	476931.032	3743511.881	460.00
LOCATION L0002150	VOLUME	476925.407	3743526.859	460.00
LOCATION L0002151	VOLUME	476919.783	3743541.838	460.00
LOCATION L0002152	VOLUME	476914.158	3743556.817	460.00
LOCATION L0002153	VOLUME	476908.533	3743571.795	459.88
LOCATION L0002154	VOLUME	476902.908	3743586.774	459.70
LOCATION L0002155	VOLUME	476897.283	3743601.753	459.61
LOCATION L0002156	VOLUME	476891.658	3743616.731	459.30
LOCATION L0002157	VOLUME	476886.033	3743631.710	459.00
LOCATION L0002158	VOLUME	476880.408	3743646.689	459.00
LOCATION L0002159	VOLUME	476874.783	3743661.667	458.91
LOCATION L0002160	VOLUME	476869.158	3743676.646	458.79
LOCATION L0002161	VOLUME	476863.534	3743691.625	458.72
LOCATION L0002162	VOLUME	476857.909	3743706.603	458.36
LOCATION L0002163	VOLUME	476852.284	3743721.582	458.21
LOCATION L0002164	VOLUME	476846.659	3743736.561	458.14
LOCATION L0002165	VOLUME	476841.034	3743751.539	457.93
LOCATION L0002166	VOLUME	476835.409	3743766.518	457.87
LOCATION L0002167	VOLUME	476832.341	3743782.135	457.73
LOCATION L0002168	VOLUME	476827.097	3743797.251	457.36
LOCATION L0002169	VOLUME	476821.854	3743812.368	457.42
LOCATION L0002170	VOLUME	476816.610	3743827.484	457.84
LOCATION L0002171	VOLUME	476811.366	3743842.600	458.13
LOCATION L0002172	VOLUME	476806.079	3743857.701	458.57
LOCATION L0002173	VOLUME	476800.778	3743872.798	458.97
LOCATION L0002174	VOLUME	476795.477	3743887.894	459.00
LOCATION L0002175	VOLUME	476790.176	3743902.990	459.00
LOCATION L0002176	VOLUME	476784.874	3743918.086	459.00

12217 HRA

LOCATION L0002177	VOLUME	476779.573	3743933.183	459.00
LOCATION L0002178	VOLUME	476774.272	3743948.279	459.00
LOCATION L0002179	VOLUME	476768.971	3743963.375	459.03
LOCATION L0002180	VOLUME	476763.670	3743978.472	459.21
LOCATION L0002181	VOLUME	476758.368	3743993.568	459.38
LOCATION L0002182	VOLUME	476753.067	3744008.664	459.56
LOCATION L0002183	VOLUME	476747.766	3744023.760	459.74
LOCATION L0002184	VOLUME	476742.465	3744038.857	459.91
LOCATION L0002185	VOLUME	476737.114	3744053.935	460.00
LOCATION L0002186	VOLUME	476731.708	3744068.994	460.00
LOCATION L0002187	VOLUME	476727.896	3744084.367	460.00
LOCATION L0002188	VOLUME	476727.186	3744100.352	460.00
LOCATION L0002189	VOLUME	476726.489	3744116.336	460.00
LOCATION L0002190	VOLUME	476726.489	3744132.336	460.00
LOCATION L0002191	VOLUME	476726.489	3744148.336	459.78
LOCATION L0002192	VOLUME	476726.489	3744164.336	459.48
LOCATION L0002193	VOLUME	476726.326	3744180.328	459.45
LOCATION L0002194	VOLUME	476724.779	3744196.253	459.50
LOCATION L0002195	VOLUME	476723.232	3744212.178	459.26
LOCATION L0002196	VOLUME	476721.685	3744228.103	458.97
LOCATION L0002197	VOLUME	476720.138	3744244.028	458.80
LOCATION L0002198	VOLUME	476718.590	3744259.953	458.71
LOCATION L0002199	VOLUME	476717.043	3744275.878	458.76
LOCATION L0002200	VOLUME	476711.665	3744290.850	458.94
LOCATION L0002201	VOLUME	476705.569	3744305.644	459.14
LOCATION L0002202	VOLUME	476699.473	3744320.437	459.30
LOCATION L0002203	VOLUME	476693.377	3744335.230	459.20
LOCATION L0002204	VOLUME	476687.281	3744350.023	458.97
LOCATION L0002205	VOLUME	476678.695	3744363.259	459.04
LOCATION L0002206	VOLUME	476668.065	3744375.218	459.39
LOCATION L0002207	VOLUME	476656.898	3744386.608	459.50
LOCATION L0002208	VOLUME	476644.367	3744396.557	459.45
LOCATION L0002209	VOLUME	476631.837	3744406.507	459.60
LOCATION L0002210	VOLUME	476619.306	3744416.456	460.00
LOCATION L0002211	VOLUME	476606.776	3744426.405	460.00
LOCATION L0002212	VOLUME	476594.245	3744436.354	460.00
LOCATION L0002213	VOLUME	476581.715	3744446.304	460.27
LOCATION L0002214	VOLUME	476569.185	3744456.253	460.69
LOCATION L0002215	VOLUME	476556.654	3744466.202	461.00
LOCATION L0002216	VOLUME	476544.053	3744476.057	461.00
LOCATION L0002217	VOLUME	476530.917	3744485.191	461.00
LOCATION L0002218	VOLUME	476517.780	3744494.325	461.40
LOCATION L0002219	VOLUME	476504.644	3744503.459	461.64
LOCATION L0002220	VOLUME	476491.507	3744512.593	461.61
LOCATION L0002221	VOLUME	476478.371	3744521.727	461.76
LOCATION L0002222	VOLUME	476465.234	3744530.861	462.00
LOCATION L0002223	VOLUME	476452.097	3744539.995	462.00
LOCATION L0002224	VOLUME	476438.961	3744549.129	462.01

12217 HRA

LOCATION L0002225	VOLUME	476425.727	3744558.121	462.00
LOCATION L0002226	VOLUME	476412.457	3744567.060	462.00
LOCATION L0002227	VOLUME	476399.187	3744576.000	462.36
LOCATION L0002228	VOLUME	476386.373	3744585.564	462.78
LOCATION L0002229	VOLUME	476373.801	3744595.461	463.00
LOCATION L0002230	VOLUME	476361.229	3744605.358	463.00

** End of LINE VOLUME Source ID = SLINE8

** Source Parameters **

** LINE VOLUME Source ID = SLINE1

SRCPARAM L0001742	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001743	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001744	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001745	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001746	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001747	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001748	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001749	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001750	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001751	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001752	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001753	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001754	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001755	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001756	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001757	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001758	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001759	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001760	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001761	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001762	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001763	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001764	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001765	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001766	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001767	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001768	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001769	0.0000006764	3.49	4.00	3.25

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** LINE VOLUME Source ID = SLINE2

SRCPARAM L0001770	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001771	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001772	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001773	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001774	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001775	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001776	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001777	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001778	0.0000006764	3.49	4.00	3.25

12217 HRA

SRCPARAM L0001779	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001780	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001781	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001782	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001783	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001784	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001785	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001786	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001787	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001788	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001789	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001790	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001791	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001792	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001793	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001794	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001795	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001796	0.0000006764	3.49	4.00	3.25
SRCPARAM L0001797	0.0000006764	3.49	4.00	3.25

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** LINE VOLUME Source ID = SLINE3

SRCPARAM L0001798	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001799	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001800	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001801	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001802	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001803	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001804	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001805	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001806	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001807	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001808	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001809	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001810	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001811	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001812	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001813	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001814	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001815	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001816	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001817	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001818	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001819	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001820	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001821	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001822	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001823	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001824	0.0000005822	3.49	4.00	3.25

12217 HRA

SRCPARAM L0001921	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001922	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001923	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001924	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001925	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001926	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001927	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001928	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001929	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001930	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001931	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001932	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001933	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001934	0.0000005822	3.49	4.00	3.25
SRCPARAM L0001935	0.0000005822	3.49	4.00	3.25

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** LINE VOLUME Source ID = SLINE4

SRCPARAM L0001936	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001937	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001938	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001939	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001940	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001941	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001942	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001943	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001944	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001945	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001946	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001947	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001948	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001949	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001950	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001951	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001952	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001953	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001954	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001955	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001956	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001957	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001958	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001959	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001960	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001961	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001962	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001963	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001964	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001965	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001966	0.0000001664	3.49	7.44	3.25

12217 HRA

SRCPARAM L0001967	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001968	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001969	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001970	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001971	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001972	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001973	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001974	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001975	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001976	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001977	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001978	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001979	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001980	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001981	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001982	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001983	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001984	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001985	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001986	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001987	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001988	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001989	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001990	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001991	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001992	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001993	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001994	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001995	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001996	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001997	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001998	0.0000001664	3.49	7.44	3.25
SRCPARAM L0001999	0.0000001664	3.49	7.44	3.25

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** LINE VOLUME Source ID = SLINE5

SRCPARAM L0002000	0.000001749	3.49	7.44	3.25
SRCPARAM L0002001	0.000001749	3.49	7.44	3.25
SRCPARAM L0002002	0.000001749	3.49	7.44	3.25
SRCPARAM L0002003	0.000001749	3.49	7.44	3.25
SRCPARAM L0002004	0.000001749	3.49	7.44	3.25
SRCPARAM L0002005	0.000001749	3.49	7.44	3.25
SRCPARAM L0002006	0.000001749	3.49	7.44	3.25
SRCPARAM L0002007	0.000001749	3.49	7.44	3.25
SRCPARAM L0002008	0.000001749	3.49	7.44	3.25
SRCPARAM L0002009	0.000001749	3.49	7.44	3.25
SRCPARAM L0002010	0.000001749	3.49	7.44	3.25
SRCPARAM L0002011	0.000001749	3.49	7.44	3.25
SRCPARAM L0002012	0.000001749	3.49	7.44	3.25

12217 HRA

SRCPARAM L0002013	0.000001749	3.49	7.44	3.25
SRCPARAM L0002014	0.000001749	3.49	7.44	3.25
SRCPARAM L0002015	0.000001749	3.49	7.44	3.25
SRCPARAM L0002016	0.000001749	3.49	7.44	3.25
SRCPARAM L0002017	0.000001749	3.49	7.44	3.25
SRCPARAM L0002018	0.000001749	3.49	7.44	3.25
SRCPARAM L0002019	0.000001749	3.49	7.44	3.25
SRCPARAM L0002020	0.000001749	3.49	7.44	3.25

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** LINE VOLUME Source ID = SLINE6

SRCPARAM L0002021	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002022	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002023	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002024	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002025	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002026	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002027	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002028	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002029	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002030	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002031	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002032	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002033	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002034	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002035	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002036	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002037	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002038	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002039	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002040	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002041	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002042	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002043	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002044	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002045	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002046	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002047	0.0000004682	3.49	7.44	3.25
SRCPARAM L0002048	0.0000004682	3.49	7.44	3.25

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** LINE VOLUME Source ID = SLINE7

SRCPARAM L0002049	0.000001086	3.49	7.44	3.25
SRCPARAM L0002050	0.000001086	3.49	7.44	3.25
SRCPARAM L0002051	0.000001086	3.49	7.44	3.25
SRCPARAM L0002052	0.000001086	3.49	7.44	3.25
SRCPARAM L0002053	0.000001086	3.49	7.44	3.25
SRCPARAM L0002054	0.000001086	3.49	7.44	3.25
SRCPARAM L0002055	0.000001086	3.49	7.44	3.25
SRCPARAM L0002056	0.000001086	3.49	7.44	3.25

12217 HRA

SRCPARAM L0002057	0.000001086	3.49	7.44	3.25
SRCPARAM L0002058	0.000001086	3.49	7.44	3.25
SRCPARAM L0002059	0.000001086	3.49	7.44	3.25
SRCPARAM L0002060	0.000001086	3.49	7.44	3.25
SRCPARAM L0002061	0.000001086	3.49	7.44	3.25
SRCPARAM L0002062	0.000001086	3.49	7.44	3.25
SRCPARAM L0002063	0.000001086	3.49	7.44	3.25
SRCPARAM L0002064	0.000001086	3.49	7.44	3.25
SRCPARAM L0002065	0.000001086	3.49	7.44	3.25
SRCPARAM L0002066	0.000001086	3.49	7.44	3.25
SRCPARAM L0002067	0.000001086	3.49	7.44	3.25
SRCPARAM L0002068	0.000001086	3.49	7.44	3.25
SRCPARAM L0002069	0.000001086	3.49	7.44	3.25
SRCPARAM L0002070	0.000001086	3.49	7.44	3.25
SRCPARAM L0002071	0.000001086	3.49	7.44	3.25
SRCPARAM L0002072	0.000001086	3.49	7.44	3.25
SRCPARAM L0002073	0.000001086	3.49	7.44	3.25
SRCPARAM L0002074	0.000001086	3.49	7.44	3.25
SRCPARAM L0002075	0.000001086	3.49	7.44	3.25
SRCPARAM L0002076	0.000001086	3.49	7.44	3.25
SRCPARAM L0002077	0.000001086	3.49	7.44	3.25
SRCPARAM L0002078	0.000001086	3.49	7.44	3.25
SRCPARAM L0002079	0.000001086	3.49	7.44	3.25
SRCPARAM L0002080	0.000001086	3.49	7.44	3.25
SRCPARAM L0002081	0.000001086	3.49	7.44	3.25
SRCPARAM L0002082	0.000001086	3.49	7.44	3.25
SRCPARAM L0002083	0.000001086	3.49	7.44	3.25
SRCPARAM L0002084	0.000001086	3.49	7.44	3.25
SRCPARAM L0002085	0.000001086	3.49	7.44	3.25
SRCPARAM L0002086	0.000001086	3.49	7.44	3.25
SRCPARAM L0002087	0.000001086	3.49	7.44	3.25

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** LINE VOLUME Source ID = SLINE8

SRCPARAM L0002088	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002089	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002090	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002091	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002092	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002093	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002094	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002095	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002096	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002097	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002098	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002099	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002100	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002101	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002102	0.00000004557	0.00	7.44	3.25

12217 HRA

SRCPARAM L0002199	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002200	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002201	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002202	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002203	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002204	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002205	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002206	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002207	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002208	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002209	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002210	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002211	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002212	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002213	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002214	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002215	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002216	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002217	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002218	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002219	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002220	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002221	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002222	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002223	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002224	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002225	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002226	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002227	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002228	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002229	0.00000004557	0.00	7.44	3.25
SRCPARAM L0002230	0.00000004557	0.00	7.44	3.25

** -----

URBANSRC ALL
SRCGROUP ALL

SO FINISHED

**

** AERMOD Receptor Pathway

**

**

RE STARTING

INCLUDED "12217 HRA.rou"

RE FINISHED

**

** AERMOD Meteorology Pathway

12217 HRA

**
**

ME STARTING
SURFFILE PerrisADJU\PERI_V9_ADJU\PERI_v9.SFC
PROFFILE PerrisADJU\PERI_V9_ADJU\PERI_v9.PFL
SURFDATA 3171 2010
UAIRDATA 3190 2010
SITEDATA 99999 2010
PROFBASE 442.0 METERS

ME FINISHED
**

** AERMOD Output Pathway

**
**

OU STARTING
** Auto-Generated Plotfiles
PLOTFILE ANNUAL ALL "12217 HRA.AD\AN00GALL.PLT" 31
SUMMFILE "12217 HRA.sum"
OU FINISHED

*** Message Summary For AERMOD Model Setup ***

----- Summary of Total Messages -----

A Total of 0 Fatal Error Message(s)
A Total of 2 Warning Message(s)
A Total of 0 Informational Message(s)

***** FATAL ERROR MESSAGES *****
*** NONE ***

***** WARNING MESSAGES *****
ME W186 1211 MEOPEN: THRESH_1MIN 1-min ASOS wind speed threshold used
 0.50
ME W187 1211 MEOPEN: ADJ_U* Option for Stable Low Winds used in AERMET

*** SETUP Finishes Successfully ***

▲ *** AERMOD - VERSION 18081 *** *** C:\Lakes\AERMOD View\12217 HRA\12217

HRA.isc 12217 HRA
*** 03/18/19
*** AERMET - VERSION 16216 ***
*** 13:03:34

PAGE 1
*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** MODEL SETUP OPTIONS SUMMARY

**Model Is Setup For Calculation of Average CONCentration Values.

-- DEPOSITION LOGIC --

**NO GAS DEPOSITION Data Provided.

**NO PARTICLE DEPOSITION Data Provided.

**Model Uses NO DRY DEPLETION. DRYDPLT = F

**Model Uses NO WET DEPLETION. WETDPLT = F

**Model Uses URBAN Dispersion Algorithm for the SBL for 489 Source(s),
for Total of 1 Urban Area(s):

Urban Population = 2189641.0 ; Urban Roughness Length = 1.000 m

**Model Uses Regulatory DEFAULT Options:

1. Stack-tip Downwash.
2. Model Accounts for ELEVated Terrain Effects.
3. Use Calms Processing Routine.
4. Use Missing Data Processing Routine.
5. No Exponential Decay.
6. Urban Roughness Length of 1.0 Meter Assumed.

**Other Options Specified:

ADJ_U* - Use ADJ_U* option for SBL in AERMET

CCVR_Sub - Meteorological data includes CCVR substitutions

TEMP_Sub - Meteorological data includes TEMP substitutions

**Model Assumes No FLAGPOLE Receptor Heights.

**The User Specified a Pollutant Type of: DPM

**Model Calculates ANNUAL Averages Only

**This Run Includes: 489 Source(s); 1 Source Group(s); and 40
Receptor(s)

with: 0 POINT(s), including
0 POINTCAP(s) and 0 POINTHOR(s)

12217 HRA
and: 489 VOLUME source(s)
and: 0 AREA type source(s)
and: 0 LINE source(s)
and: 0 OPENPIT source(s)
and: 0 BUOYANT LINE source(s) with 0 line(s)

**Model Set To Continue RUNNING After the Setup Testing.

**The AERMET Input Meteorological Data Version Date: 16216

**Output Options Selected:

Model Outputs Tables of ANNUAL Averages by Receptor
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) = 442.00 ; 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: 12217 HRA.err

**File for Summary of Results: 12217 HRA.sum

▲ *** AERMOD - VERSION 18081 *** *** C:\Lakes\AERMOD View\12217 HRA\12217
HRA.isc *** 03/18/19
*** AERMET - VERSION 16216 *** ***
*** 13:03:34

PAGE 2

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** VOLUME SOURCE DATA ***

INIT.	URBAN	NUMBER	EMISSION	RATE		BASE	RELEASE	INIT.
SOURCE		EMISSION	RATE			ELEV.	HEIGHT	SY
SZ	SOURCE	PART.	(GRAMS/SEC)	X	Y	(METERS)	(METERS)	(METERS)
ID		SCALAR	VARY					
(METERS)		CATS.	BY	(METERS)	(METERS)	(METERS)	(METERS)	(METERS)
L0001742		0	0.67640E-06	476668.3	3742886.1	471.8	3.49	4.00
3.25	YES							
L0001743		0	0.67640E-06	476668.6	3742877.5	471.8	3.49	4.00
3.25	YES							
L0001744		0	0.67640E-06	476668.9	3742868.9	471.9	3.49	4.00
3.25	YES							
L0001745		0	0.67640E-06	476669.3	3742860.3	472.1	3.49	4.00
3.25	YES							
L0001746		0	0.67640E-06	476669.6	3742851.7	472.2	3.49	4.00
3.25	YES							
L0001747		0	0.67640E-06	476669.9	3742843.2	472.3	3.49	4.00
3.25	YES							
L0001748		0	0.67640E-06	476670.2	3742834.6	472.3	3.49	4.00
3.25	YES							
L0001749		0	0.67640E-06	476670.5	3742826.0	472.3	3.49	4.00
3.25	YES							
L0001750		0	0.67640E-06	476670.8	3742817.4	472.3	3.49	4.00
3.25	YES							
L0001751		0	0.67640E-06	476671.1	3742808.8	472.5	3.49	4.00
3.25	YES							
L0001752		0	0.67640E-06	476671.5	3742800.2	472.8	3.49	4.00
3.25	YES							
L0001753		0	0.67640E-06	476671.8	3742791.6	473.1	3.49	4.00
3.25	YES							
L0001754		0	0.67640E-06	476672.1	3742783.1	473.3	3.49	4.00
3.25	YES							
L0001755		0	0.67640E-06	476672.4	3742774.5	473.2	3.49	4.00
3.25	YES							
L0001756		0	0.67640E-06	476672.7	3742765.9	473.2	3.49	4.00
3.25	YES							
L0001757		0	0.67640E-06	476673.0	3742757.3	473.2	3.49	4.00
3.25	YES							
L0001758		0	0.67640E-06	476673.3	3742748.7	473.5	3.49	4.00
3.25	YES							
L0001759		0	0.67640E-06	476673.6	3742740.1	473.7	3.49	4.00

12217 HRA

3.25	YES							
L0001760		0	0.67640E-06	476674.0	3742731.6	474.0	3.49	4.00
3.25	YES							
L0001761		0	0.67640E-06	476674.3	3742723.0	474.3	3.49	4.00
3.25	YES							
L0001762		0	0.67640E-06	476674.6	3742714.4	474.6	3.49	4.00
3.25	YES							
L0001763		0	0.67640E-06	476674.9	3742705.8	474.8	3.49	4.00
3.25	YES							
L0001764		0	0.67640E-06	476675.2	3742697.2	475.1	3.49	4.00
3.25	YES							
L0001765		0	0.67640E-06	476675.5	3742688.6	475.1	3.49	4.00
3.25	YES							
L0001766		0	0.67640E-06	476675.8	3742680.1	475.1	3.49	4.00
3.25	YES							
L0001767		0	0.67640E-06	476676.2	3742671.5	475.1	3.49	4.00
3.25	YES							
L0001768		0	0.67640E-06	476676.5	3742662.9	475.2	3.49	4.00
3.25	YES							
L0001769		0	0.67640E-06	476676.8	3742654.3	475.5	3.49	4.00
3.25	YES							
L0001770		0	0.67640E-06	476867.6	3742892.4	464.7	3.49	4.00
3.25	YES							
L0001771		0	0.67640E-06	476867.9	3742883.8	464.7	3.49	4.00
3.25	YES							
L0001772		0	0.67640E-06	476868.2	3742875.3	464.8	3.49	4.00
3.25	YES							
L0001773		0	0.67640E-06	476868.5	3742866.7	465.0	3.49	4.00
3.25	YES							
L0001774		0	0.67640E-06	476868.8	3742858.1	465.3	3.49	4.00
3.25	YES							
L0001775		0	0.67640E-06	476869.1	3742849.5	465.6	3.49	4.00
3.25	YES							
L0001776		0	0.67640E-06	476869.5	3742840.9	465.7	3.49	4.00
3.25	YES							
L0001777		0	0.67640E-06	476869.8	3742832.3	465.7	3.49	4.00
3.25	YES							
L0001778		0	0.67640E-06	476870.1	3742823.8	465.7	3.49	4.00
3.25	YES							
L0001779		0	0.67640E-06	476870.4	3742815.2	465.7	3.49	4.00
3.25	YES							
L0001780		0	0.67640E-06	476870.7	3742806.6	466.0	3.49	4.00
3.25	YES							
L0001781		0	0.67640E-06	476871.0	3742798.0	466.2	3.49	4.00

3.25 YES
 *** AERMOD - VERSION 18081 *** *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 *** ***

12217 HRA
13:03:34

PAGE 3

*** MODELOPTs: RegDFAULT CONC ELEV URBAN ADJ_U*

*** VOLUME SOURCE DATA ***

INIT.	URBAN	NUMBER	EMISSION	RATE		BASE	RELEASE	INIT.	
SZ	SOURCE	EMISSION	PART.	(GRAMS/SEC)	X	Y	ELEV.	HEIGHT	SY
ID	SCALAR	VARY	CATS.	BY	(METERS)	(METERS)	(METERS)	(METERS)	(METERS)
(METERS)									
L0001782		0	0.67640E-06		476871.3	3742789.4	466.5	3.49	4.00
3.25	YES								
L0001783		0	0.67640E-06		476871.7	3742780.8	466.6	3.49	4.00
3.25	YES								
L0001784		0	0.67640E-06		476872.0	3742772.2	466.6	3.49	4.00
3.25	YES								
L0001785		0	0.67640E-06		476872.3	3742763.7	466.6	3.49	4.00
3.25	YES								
L0001786		0	0.67640E-06		476872.6	3742755.1	466.6	3.49	4.00
3.25	YES								
L0001787		0	0.67640E-06		476872.9	3742746.5	466.9	3.49	4.00
3.25	YES								
L0001788		0	0.67640E-06		476873.2	3742737.9	467.2	3.49	4.00
3.25	YES								
L0001789		0	0.67640E-06		476873.5	3742729.3	467.4	3.49	4.00
3.25	YES								
L0001790		0	0.67640E-06		476873.9	3742720.7	467.6	3.49	4.00
3.25	YES								
L0001791		0	0.67640E-06		476874.2	3742712.2	467.8	3.49	4.00
3.25	YES								
L0001792		0	0.67640E-06		476874.5	3742703.6	467.9	3.49	4.00
3.25	YES								
L0001793		0	0.67640E-06		476874.8	3742695.0	468.0	3.49	4.00
3.25	YES								
L0001794		0	0.67640E-06		476875.1	3742686.4	468.3	3.49	4.00
3.25	YES								
L0001795		0	0.67640E-06		476875.4	3742677.8	468.6	3.49	4.00
3.25	YES								
L0001796		0	0.67640E-06		476875.8	3742669.2	468.9	3.49	4.00
3.25	YES								
L0001797		0	0.67640E-06		476876.1	3742660.7	469.2	3.49	4.00

12217 HRA

3.25	YES							
L0001798		0	0.58220E-06	476649.8	3742946.2	472.0	3.49	4.00
3.25	YES							
L0001799		0	0.58220E-06	476650.0	3742937.6	472.0	3.49	4.00
3.25	YES							
L0001800		0	0.58220E-06	476650.1	3742929.0	472.2	3.49	4.00
3.25	YES							
L0001801		0	0.58220E-06	476650.3	3742920.4	472.5	3.49	4.00
3.25	YES							
L0001802		0	0.58220E-06	476650.5	3742911.8	472.8	3.49	4.00
3.25	YES							
L0001803		0	0.58220E-06	476650.7	3742903.3	472.9	3.49	4.00
3.25	YES							
L0001804		0	0.58220E-06	476650.8	3742894.7	472.9	3.49	4.00
3.25	YES							
L0001805		0	0.58220E-06	476651.0	3742886.1	472.9	3.49	4.00
3.25	YES							
L0001806		0	0.58220E-06	476651.2	3742877.5	472.9	3.49	4.00
3.25	YES							
L0001807		0	0.58220E-06	476651.4	3742868.9	472.9	3.49	4.00
3.25	YES							
L0001808		0	0.58220E-06	476651.5	3742860.3	472.9	3.49	4.00
3.25	YES							
L0001809		0	0.58220E-06	476651.7	3742851.7	472.9	3.49	4.00
3.25	YES							
L0001810		0	0.58220E-06	476651.9	3742843.1	472.9	3.49	4.00
3.25	YES							
L0001811		0	0.58220E-06	476652.1	3742834.6	472.9	3.49	4.00
3.25	YES							
L0001812		0	0.58220E-06	476652.3	3742826.0	472.9	3.49	4.00
3.25	YES							
L0001813		0	0.58220E-06	476652.4	3742817.4	472.9	3.49	4.00
3.25	YES							
L0001814		0	0.58220E-06	476652.6	3742808.8	473.2	3.49	4.00
3.25	YES							
L0001815		0	0.58220E-06	476652.8	3742800.2	473.4	3.49	4.00
3.25	YES							
L0001816		0	0.58220E-06	476653.0	3742791.6	473.7	3.49	4.00
3.25	YES							
L0001817		0	0.58220E-06	476653.1	3742783.0	473.9	3.49	4.00
3.25	YES							
L0001818		0	0.58220E-06	476653.3	3742774.4	473.9	3.49	4.00
3.25	YES							
L0001819		0	0.58220E-06	476653.5	3742765.8	473.9	3.49	4.00
3.25	YES							
L0001820		0	0.58220E-06	476653.7	3742757.3	473.9	3.49	4.00
3.25	YES							
L0001821		0	0.58220E-06	476653.8	3742748.7	474.1	3.49	4.00

12217 HRA

3.25 YES

*** AERMOD - VERSION 18081 *** C:\Lakes\AERMOD View\12217 HRA\12217 HRA.isc *** 03/18/19

*** AERMET - VERSION 16216 *** 13:03:34

PAGE 4

*** MODELOPTs: RegDFault CONC ELEV URBAN ADJ_U*

*** VOLUME SOURCE DATA ***

INIT.	URBAN	NUMBER	EMISSION	RATE	BASE	RELEASE	INIT.
SZ	SOURCE	EMISSION	RATE		ELEV.	HEIGHT	SY
ID	SOURCE	SCALAR	(GRAMS/SEC)	X	Y	(METERS)	(METERS)
(METERS)		CATS.	VARY	(METERS)	(METERS)	(METERS)	(METERS)
		BY					
L0001822		0	0.58220E-06	476654.0	3742740.1	474.4	4.00
3.25	YES						
L0001823		0	0.58220E-06	476654.2	3742731.5	474.7	4.00
3.25	YES						
L0001824		0	0.58220E-06	476654.4	3742722.9	475.0	4.00
3.25	YES						
L0001825		0	0.58220E-06	476654.5	3742714.3	475.2	4.00
3.25	YES						
L0001826		0	0.58220E-06	476654.7	3742705.7	475.5	4.00
3.25	YES						
L0001827		0	0.58220E-06	476654.9	3742697.1	475.8	4.00
3.25	YES						
L0001828		0	0.58220E-06	476655.1	3742688.6	475.8	4.00
3.25	YES						
L0001829		0	0.58220E-06	476655.3	3742680.0	475.8	4.00
3.25	YES						
L0001830		0	0.58220E-06	476655.4	3742671.4	475.8	4.00
3.25	YES						
L0001831		0	0.58220E-06	476655.6	3742662.8	475.9	4.00
3.25	YES						
L0001832		0	0.58220E-06	476655.8	3742654.2	476.2	4.00
3.25	YES						
L0001833		0	0.58220E-06	476656.0	3742645.6	476.5	4.00
3.25	YES						
L0001834		0	0.58220E-06	476656.1	3742637.0	476.8	4.00
3.25	YES						
L0001835		0	0.58220E-06	476656.3	3742628.4	477.0	4.00

12217 HRA

3.25	YES							
L0001836		0	0.58220E-06	476657.6	3742620.0	477.3	3.49	4.00
3.25	YES							
L0001837		0	0.58220E-06	476659.4	3742611.6	477.5	3.49	4.00
3.25	YES							
L0001838		0	0.58220E-06	476661.1	3742603.2	477.7	3.49	4.00
3.25	YES							
L0001839		0	0.58220E-06	476665.7	3742597.2	477.8	3.49	4.00
3.25	YES							
L0001840		0	0.58220E-06	476674.0	3742595.4	477.6	3.49	4.00
3.25	YES							
L0001841		0	0.58220E-06	476682.6	3742595.6	477.3	3.49	4.00
3.25	YES							
L0001842		0	0.58220E-06	476691.1	3742595.9	477.0	3.49	4.00
3.25	YES							
L0001843		0	0.58220E-06	476699.7	3742596.1	476.7	3.49	4.00
3.25	YES							
L0001844		0	0.58220E-06	476708.3	3742596.3	476.4	3.49	4.00
3.25	YES							
L0001845		0	0.58220E-06	476716.9	3742596.6	476.3	3.49	4.00
3.25	YES							
L0001846		0	0.58220E-06	476725.5	3742596.8	476.3	3.49	4.00
3.25	YES							
L0001847		0	0.58220E-06	476734.1	3742597.1	476.3	3.49	4.00
3.25	YES							
L0001848		0	0.58220E-06	476742.7	3742597.3	476.2	3.49	4.00
3.25	YES							
L0001849		0	0.58220E-06	476751.2	3742597.5	475.8	3.49	4.00
3.25	YES							
L0001850		0	0.58220E-06	476759.8	3742597.8	475.4	3.49	4.00
3.25	YES							
L0001851		0	0.58220E-06	476768.4	3742598.0	475.1	3.49	4.00
3.25	YES							
L0001852		0	0.58220E-06	476777.0	3742598.3	475.0	3.49	4.00
3.25	YES							
L0001853		0	0.58220E-06	476785.6	3742598.5	473.3	3.49	4.00
3.25	YES							
L0001854		0	0.58220E-06	476794.2	3742598.7	473.2	3.49	4.00
3.25	YES							
L0001855		0	0.58220E-06	476802.8	3742599.0	473.1	3.49	4.00
3.25	YES							
L0001856		0	0.58220E-06	476811.4	3742599.2	472.8	3.49	4.00
3.25	YES							
L0001857		0	0.58220E-06	476819.9	3742599.5	472.4	3.49	4.00
3.25	YES							
L0001858		0	0.58220E-06	476828.5	3742599.7	472.1	3.49	4.00
3.25	YES							
L0001859		0	0.58220E-06	476837.1	3742599.9	471.8	3.49	4.00

12217 HRA

3.25 YES
L0001860 0 0.58220E-06 476845.7 3742600.2 471.5 3.49 4.00

3.25 YES
L0001861 0 0.58220E-06 476854.3 3742600.4 471.2 3.49 4.00

3.25 YES
 ▲ *** AERMOD - VERSION 18081 *** *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 *** ***
 *** 13:03:34

PAGE 5

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** VOLUME SOURCE DATA ***

INIT.	URBAN	NUMBER	EMISSION	RATE		BASE	RELEASE	INIT.	
SZ	SOURCE	EMISSION	RATE		X	Y	ELEV.	HEIGHT	SY
(METERS)	ID	SCALAR	VARY		(METERS)	(METERS)	(METERS)	(METERS)	(METERS)
		CATS.	BY						

L0001862	0	0.58220E-06	476862.9	3742600.7	470.9	3.49	4.00	
3.25 YES	L0001863	0	0.58220E-06	476871.5	3742600.9	470.6	3.49	4.00
3.25 YES	L0001864	0	0.58220E-06	476880.0	3742601.2	470.3	3.49	4.00
3.25 YES	L0001865	0	0.58220E-06	476888.6	3742601.4	470.0	3.49	4.00
3.25 YES	L0001866	0	0.58220E-06	476897.2	3742601.6	469.8	3.49	4.00
3.25 YES	L0001867	0	0.58220E-06	476898.7	3742608.5	469.7	3.49	4.00
3.25 YES	L0001868	0	0.58220E-06	476898.4	3742617.1	469.7	3.49	4.00
3.25 YES	L0001869	0	0.58220E-06	476898.1	3742625.7	469.7	3.49	4.00
3.25 YES	L0001870	0	0.58220E-06	476897.8	3742634.3	469.7	3.49	4.00
3.25 YES	L0001871	0	0.58220E-06	476897.5	3742642.9	469.5	3.49	4.00
3.25 YES	L0001872	0	0.58220E-06	476897.2	3742651.5	469.2	3.49	4.00
3.25 YES	L0001873	0	0.58220E-06	476896.9	3742660.0	469.0	3.49	4.00

12217 HRA

3.25	YES							
L0001874		0	0.58220E-06	476896.6	3742668.6	468.7	3.49	4.00
3.25	YES							
L0001875		0	0.58220E-06	476896.3	3742677.2	468.4	3.49	4.00
3.25	YES							
L0001876		0	0.58220E-06	476896.0	3742685.8	468.1	3.49	4.00
3.25	YES							
L0001877		0	0.58220E-06	476895.7	3742694.4	467.9	3.49	4.00
3.25	YES							
L0001878		0	0.58220E-06	476895.3	3742703.0	467.6	3.49	4.00
3.25	YES							
L0001879		0	0.58220E-06	476895.0	3742711.6	467.3	3.49	4.00
3.25	YES							
L0001880		0	0.58220E-06	476894.7	3742720.1	467.0	3.49	4.00
3.25	YES							
L0001881		0	0.58220E-06	476894.4	3742728.7	466.8	3.49	4.00
3.25	YES							
L0001882		0	0.58220E-06	476894.1	3742737.3	466.5	3.49	4.00
3.25	YES							
L0001883		0	0.58220E-06	476893.8	3742745.9	466.2	3.49	4.00
3.25	YES							
L0001884		0	0.58220E-06	476893.5	3742754.5	465.9	3.49	4.00
3.25	YES							
L0001885		0	0.58220E-06	476893.2	3742763.1	465.9	3.49	4.00
3.25	YES							
L0001886		0	0.58220E-06	476892.9	3742771.6	465.9	3.49	4.00
3.25	YES							
L0001887		0	0.58220E-06	476892.6	3742780.2	465.9	3.49	4.00
3.25	YES							
L0001888		0	0.58220E-06	476892.3	3742788.8	465.8	3.49	4.00
3.25	YES							
L0001889		0	0.58220E-06	476892.0	3742797.4	465.6	3.49	4.00
3.25	YES							
L0001890		0	0.58220E-06	476891.7	3742806.0	465.3	3.49	4.00
3.25	YES							
L0001891		0	0.58220E-06	476891.4	3742814.6	465.0	3.49	4.00
3.25	YES							
L0001892		0	0.58220E-06	476891.1	3742823.2	465.0	3.49	4.00
3.25	YES							
L0001893		0	0.58220E-06	476890.8	3742831.7	465.0	3.49	4.00
3.25	YES							
L0001894		0	0.58220E-06	476890.5	3742840.3	465.0	3.49	4.00
3.25	YES							
L0001895		0	0.58220E-06	476890.2	3742848.9	464.9	3.49	4.00
3.25	YES							
L0001896		0	0.58220E-06	476889.8	3742857.5	464.6	3.49	4.00
3.25	YES							
L0001897		0	0.58220E-06	476889.5	3742866.1	464.4	3.49	4.00

12217 HRA

3.25 YES
 L0001898 0 0.58220E-06 476888.8 3742874.6 464.1 3.49 4.00
 3.25 YES
 L0001899 0 0.58220E-06 476887.9 3742883.2 464.1 3.49 4.00
 3.25 YES
 L0001900 0 0.58220E-06 476886.9 3742891.7 464.1 3.49 4.00
 3.25 YES
 L0001901 0 0.58220E-06 476886.0 3742900.3 464.1 3.49 4.00
 3.25 YES

▲ *** AERMOD - VERSION 18081 *** *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 *** ***
 *** 13:03:34

PAGE 6

*** MODELOPTs: RegDFAULT CONC ELEV URBAN ADJ_U*

*** VOLUME SOURCE DATA ***

INIT.	URBAN	NUMBER	EMISSION	RATE		BASE	RELEASE	INIT.
SOURCE		EMISSION	RATE			ELEV.	HEIGHT	SY
SZ	SOURCE	SCALAR	VARY		X	Y		
ID		CATS.	BY		(METERS)	(METERS)	(METERS)	(METERS)
(METERS)								(METERS)
L0001902		0	0.58220E-06	476885.1	3742908.8	464.1	3.49	4.00
3.25	YES							
L0001903		0	0.58220E-06	476884.2	3742917.3	464.1	3.49	4.00
3.25	YES							
L0001904		0	0.58220E-06	476883.3	3742925.9	464.1	3.49	4.00
3.25	YES							
L0001905		0	0.58220E-06	476882.3	3742934.4	464.0	3.49	4.00
3.25	YES							
L0001906		0	0.58220E-06	476881.4	3742943.0	464.0	3.49	4.00
3.25	YES							
L0001907		0	0.58220E-06	476880.5	3742951.5	464.0	3.49	4.00
3.25	YES							
L0001908		0	0.58220E-06	476879.6	3742960.0	464.0	3.49	4.00
3.25	YES							
L0001909		0	0.58220E-06	476876.5	3742966.2	464.0	3.49	4.00
3.25	YES							
L0001910		0	0.58220E-06	476868.0	3742965.9	464.0	3.49	4.00
3.25	YES							
L0001911		0	0.58220E-06	476859.4	3742965.6	464.0	3.49	4.00

12217 HRA

3.25	YES							
L0001912		0	0.58220E-06	476850.8	3742965.4	464.3	3.49	4.00
3.25	YES							
L0001913		0	0.58220E-06	476842.2	3742965.1	464.6	3.49	4.00
3.25	YES							
L0001914		0	0.58220E-06	476833.6	3742964.9	464.9	3.49	4.00
3.25	YES							
L0001915		0	0.58220E-06	476825.0	3742964.6	465.0	3.49	4.00
3.25	YES							
L0001916		0	0.58220E-06	476816.4	3742964.4	465.0	3.49	4.00
3.25	YES							
L0001917		0	0.58220E-06	476807.9	3742964.1	465.1	3.49	4.00
3.25	YES							
L0001918		0	0.58220E-06	476799.3	3742963.9	465.1	3.49	4.00
3.25	YES							
L0001919		0	0.58220E-06	476790.7	3742963.6	465.1	3.49	4.00
3.25	YES							
L0001920		0	0.58220E-06	476782.1	3742963.3	466.0	3.49	4.00
3.25	YES							
L0001921		0	0.58220E-06	476773.5	3742963.1	466.0	3.49	4.00
3.25	YES							
L0001922		0	0.58220E-06	476764.9	3742962.8	466.2	3.49	4.00
3.25	YES							
L0001923		0	0.58220E-06	476756.3	3742962.6	466.4	3.49	4.00
3.25	YES							
L0001924		0	0.58220E-06	476747.8	3742962.3	466.7	3.49	4.00
3.25	YES							
L0001925		0	0.58220E-06	476739.2	3742962.1	467.1	3.49	4.00
3.25	YES							
L0001926		0	0.58220E-06	476730.6	3742961.8	467.6	3.49	4.00
3.25	YES							
L0001927		0	0.58220E-06	476722.0	3742961.6	468.2	3.49	4.00
3.25	YES							
L0001928		0	0.58220E-06	476713.4	3742961.3	468.8	3.49	4.00
3.25	YES							
L0001929		0	0.58220E-06	476704.8	3742961.0	469.2	3.49	4.00
3.25	YES							
L0001930		0	0.58220E-06	476696.2	3742960.8	469.5	3.49	4.00
3.25	YES							
L0001931		0	0.58220E-06	476687.6	3742960.5	469.9	3.49	4.00
3.25	YES							
L0001932		0	0.58220E-06	476679.1	3742960.3	470.2	3.49	4.00
3.25	YES							
L0001933		0	0.58220E-06	476670.5	3742960.0	470.8	3.49	4.00
3.25	YES							
L0001934		0	0.58220E-06	476661.9	3742959.8	471.3	3.49	4.00
3.25	YES							
L0001935		0	0.58220E-06	476653.3	3742959.5	471.8	3.49	4.00

12217 HRA

3.25	YES							
L0001950		0	0.16640E-06	476610.2	3742728.4	476.2	3.49	7.44
3.25	YES							
L0001951		0	0.16640E-06	476610.0	3742712.4	476.8	3.49	7.44
3.25	YES							
L0001952		0	0.16640E-06	476609.7	3742696.4	477.3	3.49	7.44
3.25	YES							
L0001953		0	0.16640E-06	476609.5	3742680.4	477.5	3.49	7.44
3.25	YES							
L0001954		0	0.16640E-06	476609.3	3742664.4	477.8	3.49	7.44
3.25	YES							
L0001955		0	0.16640E-06	476609.1	3742648.4	478.3	3.49	7.44
3.25	YES							
L0001956		0	0.16640E-06	476608.9	3742632.4	478.8	3.49	7.44
3.25	YES							
L0001957		0	0.16640E-06	476608.7	3742616.4	479.2	3.49	7.44
3.25	YES							
L0001958		0	0.16640E-06	476608.4	3742600.4	479.6	3.49	7.44
3.25	YES							
L0001959		0	0.16640E-06	476608.2	3742584.4	480.4	3.49	7.44
3.25	YES							
L0001960		0	0.16640E-06	476608.0	3742568.4	481.1	3.49	7.44
3.25	YES							
L0001961		0	0.16640E-06	476620.8	3742565.5	480.3	3.49	7.44
3.25	YES							
L0001962		0	0.16640E-06	476636.8	3742565.8	479.8	3.49	7.44
3.25	YES							
L0001963		0	0.16640E-06	476652.8	3742566.1	479.2	3.49	7.44
3.25	YES							
L0001964		0	0.16640E-06	476668.8	3742566.4	478.7	3.49	7.44
3.25	YES							
L0001965		0	0.16640E-06	476684.8	3742566.7	478.2	3.49	7.44
3.25	YES							
L0001966		0	0.16640E-06	476700.8	3742567.0	477.6	3.49	7.44
3.25	YES							
L0001967		0	0.16640E-06	476716.8	3742567.3	477.2	3.49	7.44
3.25	YES							
L0001968		0	0.16640E-06	476732.8	3742567.6	477.1	3.49	7.44
3.25	YES							
L0001969		0	0.16640E-06	476748.8	3742567.9	476.5	3.49	7.44
3.25	YES							
L0001970		0	0.16640E-06	476764.8	3742568.2	475.6	3.49	7.44
3.25	YES							
L0001971		0	0.16640E-06	476780.8	3742568.5	475.2	3.49	7.44
3.25	YES							
L0001972		0	0.16640E-06	476796.8	3742568.8	474.2	3.49	7.44
3.25	YES							
L0001973		0	0.16640E-06	476812.7	3742569.1	473.4	3.49	7.44

12217 HRA

3.25	YES							
L0001974		0	0.16640E-06	476828.7	3742569.3	472.3	3.49	7.44
3.25	YES							
L0001975		0	0.16640E-06	476844.7	3742569.5	471.7	3.49	7.44
3.25	YES							
L0001976		0	0.16640E-06	476860.7	3742569.7	471.2	3.49	7.44
3.25	YES							
L0001977		0	0.16640E-06	476876.7	3742569.9	470.7	3.49	7.44
3.25	YES							
L0001978		0	0.16640E-06	476892.7	3742570.0	470.1	3.49	7.44
3.25	YES							
L0001979		0	0.16640E-06	476908.7	3742570.2	469.4	3.49	7.44
3.25	YES							
L0001980		0	0.16640E-06	476924.7	3742570.4	468.8	3.49	7.44
3.25	YES							
L0001981		0	0.16640E-06	476940.7	3742570.6	468.3	3.49	7.44

3.25 YES
 * ** AERMOD - VERSION 18081 *** ** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 *** ***
 *** 13:03:34

PAGE 8

*** MODELOPTs: RegDFault CONC ELEV URBAN ADJ_U*

*** VOLUME SOURCE DATA ***

INIT.	URBAN	NUMBER	EMISSION	RATE		BASE	RELEASE	INIT.	
SZ	SOURCE	EMISSION	PART.	(GRAMS/SEC)	X	Y	ELEV.	HEIGHT	SY
ID	SOURCE	SCALAR	VARY		(METERS)	(METERS)	(METERS)	(METERS)	(METERS)
(METERS)		CATS.	BY						
L0001982		0	0.16640E-06	476956.7	3742570.8	467.8	3.49	7.44	
3.25	YES								
L0001983		0	0.16640E-06	476972.7	3742570.9	467.2	3.49	7.44	
3.25	YES								
L0001984		0	0.16640E-06	476988.7	3742571.1	466.7	3.49	7.44	
3.25	YES								
L0001985		0	0.16640E-06	477004.7	3742571.3	466.2	3.49	7.44	
3.25	YES								
L0001986		0	0.16640E-06	477020.7	3742571.5	465.3	3.49	7.44	
3.25	YES								
L0001987		0	0.16640E-06	477036.7	3742571.6	464.3	3.49	7.44	

12217 HRA

3.25	YES							
L0001988		0	0.16640E-06	477052.7	3742571.8	463.7	3.49	7.44
3.25	YES							
L0001989		0	0.16640E-06	477068.7	3742572.0	463.2	3.49	7.44
3.25	YES							
L0001990		0	0.16640E-06	477084.7	3742572.3	463.1	3.49	7.44
3.25	YES							
L0001991		0	0.16640E-06	477100.7	3742572.6	463.0	3.49	7.44
3.25	YES							
L0001992		0	0.16640E-06	477116.7	3742573.0	462.4	3.49	7.44
3.25	YES							
L0001993		0	0.16640E-06	477132.7	3742573.3	461.9	3.49	7.44
3.25	YES							
L0001994		0	0.16640E-06	477148.7	3742573.7	461.4	3.49	7.44
3.25	YES							
L0001995		0	0.16640E-06	477164.7	3742574.1	460.8	3.49	7.44
3.25	YES							
L0001996		0	0.16640E-06	477180.7	3742574.4	460.3	3.49	7.44
3.25	YES							
L0001997		0	0.16640E-06	477196.7	3742574.8	459.8	3.49	7.44
3.25	YES							
L0001998		0	0.16640E-06	477212.7	3742575.1	459.3	3.49	7.44
3.25	YES							
L0001999		0	0.16640E-06	477228.7	3742575.5	458.7	3.49	7.44
3.25	YES							
L0002000		0	0.17490E-05	476908.7	3742570.4	469.4	3.49	7.44
3.25	YES							
L0002001		0	0.17490E-05	476924.7	3742570.7	468.8	3.49	7.44
3.25	YES							
L0002002		0	0.17490E-05	476940.7	3742570.9	468.3	3.49	7.44
3.25	YES							
L0002003		0	0.17490E-05	476956.7	3742571.2	467.8	3.49	7.44
3.25	YES							
L0002004		0	0.17490E-05	476972.7	3742571.5	467.2	3.49	7.44
3.25	YES							
L0002005		0	0.17490E-05	476988.7	3742571.7	466.7	3.49	7.44
3.25	YES							
L0002006		0	0.17490E-05	477004.7	3742572.0	466.2	3.49	7.44
3.25	YES							
L0002007		0	0.17490E-05	477020.7	3742572.2	465.3	3.49	7.44
3.25	YES							
L0002008		0	0.17490E-05	477036.7	3742572.5	464.3	3.49	7.44
3.25	YES							
L0002009		0	0.17490E-05	477052.7	3742572.7	463.7	3.49	7.44
3.25	YES							
L0002010		0	0.17490E-05	477068.7	3742573.0	463.1	3.49	7.44
3.25	YES							
L0002011		0	0.17490E-05	477084.7	3742573.3	463.1	3.49	7.44

12217 HRA

3.25	YES	L0002012	0	0.17490E-05	477100.7	3742573.5	463.0	3.49	7.44
3.25	YES	L0002013	0	0.17490E-05	477116.7	3742573.8	462.4	3.49	7.44
3.25	YES	L0002014	0	0.17490E-05	477132.7	3742574.0	461.9	3.49	7.44
3.25	YES	L0002015	0	0.17490E-05	477148.7	3742574.3	461.4	3.49	7.44
3.25	YES	L0002016	0	0.17490E-05	477164.7	3742574.6	460.8	3.49	7.44
3.25	YES	L0002017	0	0.17490E-05	477180.7	3742574.8	460.3	3.49	7.44
3.25	YES	L0002018	0	0.17490E-05	477196.7	3742575.1	459.8	3.49	7.44
3.25	YES	L0002019	0	0.17490E-05	477212.7	3742575.3	459.3	3.49	7.44
3.25	YES	L0002020	0	0.17490E-05	477228.7	3742575.6	458.7	3.49	7.44
3.25	YES	L0002021	0	0.46820E-06	477242.6	3742576.6	458.2	3.49	7.44

^ *** AERMOD - VERSION 18081 *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 ***
 *** 13:03:34

PAGE 9

*** MODELOPTs: RegDFault CONC ELEV URBAN ADJ_U*

*** VOLUME SOURCE DATA ***

INIT.	URBAN	NUMBER	EMISSION	RATE	BASE	RELEASE	INIT.		
SOURCE	SOURCE	EMISSION	PART.	(GRAMS/SEC)	X	Y	SY		
SZ	SOURCE	SCALAR	VARY		ELEV.	HEIGHT			
ID		CATS.		(METERS)	(METERS)	(METERS)	(METERS)		
(METERS)		BY							
L0002022	0	0.46820E-06	477258.6	3742576.7	458.0	3.49	7.44		
3.25	YES	L0002023	0	0.46820E-06	477274.6	3742576.9	458.0	3.49	7.44
3.25	YES	L0002024	0	0.46820E-06	477290.6	3742577.1	457.6	3.49	7.44
3.25	YES	L0002025	0	0.46820E-06	477306.6	3742577.2	457.1	3.49	7.44

12217 HRA

3.25	YES							
L0002026		0	0.46820E-06	477322.6	3742577.4	456.6	3.49	7.44
3.25	YES							
L0002027		0	0.46820E-06	477338.5	3742577.6	456.0	3.49	7.44
3.25	YES							
L0002028		0	0.46820E-06	477354.5	3742577.7	456.0	3.49	7.44
3.25	YES							
L0002029		0	0.46820E-06	477370.5	3742577.6	456.0	3.49	7.44
3.25	YES							
L0002030		0	0.46820E-06	477386.5	3742577.5	456.0	3.49	7.44
3.25	YES							
L0002031		0	0.46820E-06	477402.5	3742577.4	455.9	3.49	7.44
3.25	YES							
L0002032		0	0.46820E-06	477418.5	3742577.2	455.4	3.49	7.44
3.25	YES							
L0002033		0	0.46820E-06	477434.5	3742577.1	454.8	3.49	7.44
3.25	YES							
L0002034		0	0.46820E-06	477450.5	3742577.0	454.3	3.49	7.44
3.25	YES							
L0002035		0	0.46820E-06	477466.5	3742576.9	454.0	3.49	7.44
3.25	YES							
L0002036		0	0.46820E-06	477482.5	3742576.8	454.0	3.49	7.44
3.25	YES							
L0002037		0	0.46820E-06	477498.5	3742576.6	453.7	3.49	7.44
3.25	YES							
L0002038		0	0.46820E-06	477514.5	3742576.5	453.2	3.49	7.44
3.25	YES							
L0002039		0	0.46820E-06	477530.5	3742575.6	453.0	3.49	7.44
3.25	YES							
L0002040		0	0.46820E-06	477546.5	3742574.4	453.0	3.49	7.44
3.25	YES							
L0002041		0	0.46820E-06	477562.4	3742573.1	452.6	3.49	7.44
3.25	YES							
L0002042		0	0.46820E-06	477567.3	3742558.1	452.8	3.49	7.44
3.25	YES							
L0002043		0	0.46820E-06	477571.9	3742542.8	453.0	3.49	7.44
3.25	YES							
L0002044		0	0.46820E-06	477576.5	3742527.5	453.1	3.49	7.44
3.25	YES							
L0002045		0	0.46820E-06	477581.2	3742512.1	453.0	3.49	7.44
3.25	YES							
L0002046		0	0.46820E-06	477585.8	3742496.8	452.9	3.49	7.44
3.25	YES							
L0002047		0	0.46820E-06	477590.4	3742481.5	453.1	3.49	7.44
3.25	YES							
L0002048		0	0.46820E-06	477595.0	3742466.2	453.3	3.49	7.44
3.25	YES							
L0002049		0	0.10860E-05	477242.6	3742576.6	458.2	3.49	7.44

12217 HRA

3.25	YES	L0002050	0	0.10860E-05	477258.6	3742576.7	458.0	3.49	7.44
3.25	YES	L0002051	0	0.10860E-05	477274.6	3742576.9	458.0	3.49	7.44
3.25	YES	L0002052	0	0.10860E-05	477290.6	3742577.1	457.6	3.49	7.44
3.25	YES	L0002053	0	0.10860E-05	477306.6	3742577.2	457.1	3.49	7.44
3.25	YES	L0002054	0	0.10860E-05	477322.6	3742577.4	456.6	3.49	7.44
3.25	YES	L0002055	0	0.10860E-05	477338.5	3742577.6	456.0	3.49	7.44
3.25	YES	L0002056	0	0.10860E-05	477354.5	3742577.7	456.0	3.49	7.44
3.25	YES	L0002057	0	0.10860E-05	477370.5	3742577.6	456.0	3.49	7.44
3.25	YES	L0002058	0	0.10860E-05	477386.5	3742577.5	456.0	3.49	7.44
3.25	YES	L0002059	0	0.10860E-05	477402.5	3742577.4	455.9	3.49	7.44
3.25	YES	L0002060	0	0.10860E-05	477418.5	3742577.2	455.4	3.49	7.44
3.25	YES	L0002061	0	0.10860E-05	477434.5	3742577.1	454.8	3.49	7.44

*** AERMOD - VERSION 18081 *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 ***
 *** 13:03:34

PAGE 10

*** MODELOPTs: RegDFault CONC ELEV URBAN ADJ_U*

*** VOLUME SOURCE DATA ***

INIT.	URBAN	NUMBER	EMISSION	RATE		BASE	RELEASE	INIT.	
SZ	SOURCE	EMISSION	PART.	(GRAMS/SEC)	X	Y	ELEV.	HEIGHT	SY
ID	SOURCE	SCALAR	VARY		(METERS)	(METERS)	(METERS)	(METERS)	(METERS)
(METERS)		CATS.	BY						
L0002062		0	0.10860E-05	477450.5	3742577.0	454.3	3.49	7.44	
3.25	YES	L0002063	0	0.10860E-05	477466.5	3742576.9	454.0	3.49	7.44

12217 HRA

3.25	YES							
L0002064		0	0.10860E-05	477482.5	3742576.8	454.0	3.49	7.44
3.25	YES							
L0002065		0	0.10860E-05	477498.5	3742576.6	453.7	3.49	7.44
3.25	YES							
L0002066		0	0.10860E-05	477514.5	3742576.5	453.2	3.49	7.44
3.25	YES							
L0002067		0	0.10860E-05	477530.5	3742575.6	453.0	3.49	7.44
3.25	YES							
L0002068		0	0.10860E-05	477546.5	3742574.4	453.0	3.49	7.44
3.25	YES							
L0002069		0	0.10860E-05	477562.4	3742573.1	452.6	3.49	7.44
3.25	YES							
L0002070		0	0.10860E-05	477578.4	3742573.0	452.2	3.49	7.44
3.25	YES							
L0002071		0	0.10860E-05	477594.4	3742573.0	452.1	3.49	7.44
3.25	YES							
L0002072		0	0.10860E-05	477610.4	3742572.9	452.0	3.49	7.44
3.25	YES							
L0002073		0	0.10860E-05	477626.4	3742572.9	451.5	3.49	7.44
3.25	YES							
L0002074		0	0.10860E-05	477642.4	3742572.8	451.1	3.49	7.44
3.25	YES							
L0002075		0	0.10860E-05	477658.4	3742572.8	451.0	3.49	7.44
3.25	YES							
L0002076		0	0.10860E-05	477674.4	3742572.2	451.0	3.49	7.44
3.25	YES							
L0002077		0	0.10860E-05	477690.4	3742571.7	451.0	3.49	7.44
3.25	YES							
L0002078		0	0.10860E-05	477706.4	3742571.2	450.8	3.49	7.44
3.25	YES							
L0002079		0	0.10860E-05	477722.4	3742570.6	450.2	3.49	7.44
3.25	YES							
L0002080		0	0.10860E-05	477738.4	3742570.1	450.0	3.49	7.44
3.25	YES							
L0002081		0	0.10860E-05	477754.4	3742569.6	450.0	3.49	7.44
3.25	YES							
L0002082		0	0.10860E-05	477770.3	3742569.0	449.7	3.49	7.44
3.25	YES							
L0002083		0	0.10860E-05	477786.3	3742568.5	449.3	3.49	7.44
3.25	YES							
L0002084		0	0.10860E-05	477802.3	3742567.9	449.2	3.49	7.44
3.25	YES							
L0002085		0	0.10860E-05	477818.3	3742567.4	449.0	3.49	7.44
3.25	YES							
L0002086		0	0.10860E-05	477834.3	3742566.9	448.7	3.49	7.44
3.25	YES							
L0002087		0	0.10860E-05	477850.3	3742566.3	448.3	3.49	7.44

12217 HRA

3.25	YES							
L0002088		0	0.45570E-07	477242.9	3742587.9	458.2	0.00	7.44
3.25	YES							
L0002089		0	0.45570E-07	477240.7	3742603.8	458.3	0.00	7.44
3.25	YES							
L0002090		0	0.45570E-07	477238.6	3742619.6	458.4	0.00	7.44
3.25	YES							
L0002091		0	0.45570E-07	477234.2	3742635.0	458.5	0.00	7.44
3.25	YES							
L0002092		0	0.45570E-07	477229.5	3742650.3	458.7	0.00	7.44
3.25	YES							
L0002093		0	0.45570E-07	477224.8	3742665.6	458.8	0.00	7.44
3.25	YES							
L0002094		0	0.45570E-07	477220.1	3742680.9	459.0	0.00	7.44
3.25	YES							
L0002095		0	0.45570E-07	477215.4	3742696.2	459.0	0.00	7.44
3.25	YES							
L0002096		0	0.45570E-07	477210.6	3742711.4	458.7	0.00	7.44
3.25	YES							
L0002097		0	0.45570E-07	477205.6	3742726.6	458.5	0.00	7.44
3.25	YES							
L0002098		0	0.45570E-07	477200.1	3742741.6	458.7	0.00	7.44
3.25	YES							
L0002099		0	0.45570E-07	477194.5	3742756.7	458.8	0.00	7.44
3.25	YES							
L0002100		0	0.45570E-07	477189.0	3742771.7	459.0	0.00	7.44
3.25	YES							
L0002101		0	0.45570E-07	477183.5	3742786.7	459.2	0.00	7.44

3.25 YES
 *** AERMOD - VERSION 18081 *** *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 *** ***
 *** 13:03:34

PAGE 11

*** MODELOPTs: RegDFault CONC ELEV URBAN ADJ_U*

*** VOLUME SOURCE DATA ***

INIT.	URBAN	NUMBER	EMISSION	RATE		BASE	RELEASE	INIT.	
SZ	SOURCE	EMISSION	PART.	(GRAMS/SEC)	X	Y	ELEV.	HEIGHT	SY
ID		SCALAR	VARY				(METERS)	(METERS)	(METERS)
(METERS)		CATS.	BY		(METERS)	(METERS)	(METERS)	(METERS)	(METERS)

12217 HRA

L0002102	0	0.45570E-07	477177.9	3742801.7	459.2	0.00	7.44
3.25 YES							
L0002103	0	0.45570E-07	477172.4	3742816.7	459.0	0.00	7.44
3.25 YES							
L0002104	0	0.45570E-07	477166.8	3742831.7	458.9	0.00	7.44
3.25 YES							
L0002105	0	0.45570E-07	477161.3	3742846.7	458.9	0.00	7.44
3.25 YES							
L0002106	0	0.45570E-07	477155.8	3742861.7	459.1	0.00	7.44
3.25 YES							
L0002107	0	0.45570E-07	477150.2	3742876.7	459.3	0.00	7.44
3.25 YES							
L0002108	0	0.45570E-07	477144.7	3742891.7	459.5	0.00	7.44
3.25 YES							
L0002109	0	0.45570E-07	477139.3	3742906.8	459.7	0.00	7.44
3.25 YES							
L0002110	0	0.45570E-07	477134.0	3742921.9	459.4	0.00	7.44
3.25 YES							
L0002111	0	0.45570E-07	477128.7	3742937.0	459.0	0.00	7.44
3.25 YES							
L0002112	0	0.45570E-07	477123.4	3742952.1	459.2	0.00	7.44
3.25 YES							
L0002113	0	0.45570E-07	477118.1	3742967.2	459.4	0.00	7.44
3.25 YES							
L0002114	0	0.45570E-07	477112.8	3742982.3	459.6	0.00	7.44
3.25 YES							
L0002115	0	0.45570E-07	477107.5	3742997.4	459.8	0.00	7.44
3.25 YES							
L0002116	0	0.45570E-07	477102.2	3743012.5	459.9	0.00	7.44
3.25 YES							
L0002117	0	0.45570E-07	477096.9	3743027.6	460.0	0.00	7.44
3.25 YES							
L0002118	0	0.45570E-07	477091.6	3743042.7	460.0	0.00	7.44
3.25 YES							
L0002119	0	0.45570E-07	477086.4	3743057.8	460.0	0.00	7.44
3.25 YES							
L0002120	0	0.45570E-07	477081.4	3743073.0	460.0	0.00	7.44
3.25 YES							
L0002121	0	0.45570E-07	477076.4	3743088.2	460.0	0.00	7.44
3.25 YES							
L0002122	0	0.45570E-07	477071.4	3743103.4	460.0	0.00	7.44
3.25 YES							
L0002123	0	0.45570E-07	477066.4	3743118.6	460.0	0.00	7.44
3.25 YES							
L0002124	0	0.45570E-07	477061.4	3743133.8	460.0	0.00	7.44
3.25 YES							
L0002125	0	0.45570E-07	477056.5	3743149.0	460.0	0.00	7.44

12217 HRA

3.25	YES							
L0002126		0	0.45570E-07	477051.5	3743164.2	460.0	0.00	7.44
3.25	YES							
L0002127		0	0.45570E-07	477046.5	3743179.4	460.0	0.00	7.44
3.25	YES							
L0002128		0	0.45570E-07	477041.5	3743194.6	460.0	0.00	7.44
3.25	YES							
L0002129		0	0.45570E-07	477036.5	3743209.8	460.1	0.00	7.44
3.25	YES							
L0002130		0	0.45570E-07	477031.5	3743225.0	460.3	0.00	7.44
3.25	YES							
L0002131		0	0.45570E-07	477026.5	3743240.2	460.4	0.00	7.44
3.25	YES							
L0002132		0	0.45570E-07	477021.5	3743255.4	460.2	0.00	7.44
3.25	YES							
L0002133		0	0.45570E-07	477016.5	3743270.6	460.0	0.00	7.44
3.25	YES							
L0002134		0	0.45570E-07	477011.5	3743285.8	460.0	0.00	7.44
3.25	YES							
L0002135		0	0.45570E-07	477006.5	3743301.0	460.1	0.00	7.44
3.25	YES							
L0002136		0	0.45570E-07	477001.6	3743316.2	460.3	0.00	7.44
3.25	YES							
L0002137		0	0.45570E-07	476996.6	3743331.4	460.4	0.00	7.44
3.25	YES							
L0002138		0	0.45570E-07	476991.6	3743346.6	460.6	0.00	7.44
3.25	YES							
L0002139		0	0.45570E-07	476986.6	3743361.8	460.6	0.00	7.44
3.25	YES							
L0002140		0	0.45570E-07	476981.6	3743377.1	460.3	0.00	7.44
3.25	YES							
L0002141		0	0.45570E-07	476976.0	3743392.1	460.1	0.00	7.44

▲ *** AERMOD - VERSION 18081 *** C:\Lakes\AERMOD View\12217 HRA\12217
HRA.isc *** 03/18/19

*** AERMET - VERSION 16216 ***
*** 13:03:34

PAGE 12

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** VOLUME SOURCE DATA ***

INIT.	URBAN	NUMBER EMISSION RATE	BASE	RELEASE	INIT.
SZ	SOURCE	EMISSION RATE	ELEV.	HEIGHT	SY
		PART. (GRAMS/SEC)	X	Y	
		SCALAR VARY			

12217 HRA
(METERS) (METERS) (METERS) (METERS) (METERS)

ID CATS. BY
(METERS)

L0002142	0	0.45570E-07	476970.4	3743407.0	460.3	0.00	7.44
3.25 YES							
L0002143	0	0.45570E-07	476964.8	3743422.0	460.4	0.00	7.44
3.25 YES							
L0002144	0	0.45570E-07	476959.2	3743437.0	460.2	0.00	7.44
3.25 YES							
L0002145	0	0.45570E-07	476953.5	3743452.0	460.0	0.00	7.44
3.25 YES							
L0002146	0	0.45570E-07	476947.9	3743466.9	460.0	0.00	7.44
3.25 YES							
L0002147	0	0.45570E-07	476942.3	3743481.9	460.0	0.00	7.44
3.25 YES							
L0002148	0	0.45570E-07	476936.7	3743496.9	460.0	0.00	7.44
3.25 YES							
L0002149	0	0.45570E-07	476931.0	3743511.9	460.0	0.00	7.44
3.25 YES							
L0002150	0	0.45570E-07	476925.4	3743526.9	460.0	0.00	7.44
3.25 YES							
L0002151	0	0.45570E-07	476919.8	3743541.8	460.0	0.00	7.44
3.25 YES							
L0002152	0	0.45570E-07	476914.2	3743556.8	460.0	0.00	7.44
3.25 YES							
L0002153	0	0.45570E-07	476908.5	3743571.8	459.9	0.00	7.44
3.25 YES							
L0002154	0	0.45570E-07	476902.9	3743586.8	459.7	0.00	7.44
3.25 YES							
L0002155	0	0.45570E-07	476897.3	3743601.8	459.6	0.00	7.44
3.25 YES							
L0002156	0	0.45570E-07	476891.7	3743616.7	459.3	0.00	7.44
3.25 YES							
L0002157	0	0.45570E-07	476886.0	3743631.7	459.0	0.00	7.44
3.25 YES							
L0002158	0	0.45570E-07	476880.4	3743646.7	459.0	0.00	7.44
3.25 YES							
L0002159	0	0.45570E-07	476874.8	3743661.7	458.9	0.00	7.44
3.25 YES							
L0002160	0	0.45570E-07	476869.2	3743676.6	458.8	0.00	7.44
3.25 YES							
L0002161	0	0.45570E-07	476863.5	3743691.6	458.7	0.00	7.44
3.25 YES							
L0002162	0	0.45570E-07	476857.9	3743706.6	458.4	0.00	7.44
3.25 YES							
L0002163	0	0.45570E-07	476852.3	3743721.6	458.2	0.00	7.44

12217 HRA

3.25	YES							
L0002164		0	0.45570E-07	476846.7	3743736.6	458.1	0.00	7.44
3.25	YES							
L0002165		0	0.45570E-07	476841.0	3743751.5	457.9	0.00	7.44
3.25	YES							
L0002166		0	0.45570E-07	476835.4	3743766.5	457.9	0.00	7.44
3.25	YES							
L0002167		0	0.45570E-07	476832.3	3743782.1	457.7	0.00	7.44
3.25	YES							
L0002168		0	0.45570E-07	476827.1	3743797.3	457.4	0.00	7.44
3.25	YES							
L0002169		0	0.45570E-07	476821.9	3743812.4	457.4	0.00	7.44
3.25	YES							
L0002170		0	0.45570E-07	476816.6	3743827.5	457.8	0.00	7.44
3.25	YES							
L0002171		0	0.45570E-07	476811.4	3743842.6	458.1	0.00	7.44
3.25	YES							
L0002172		0	0.45570E-07	476806.1	3743857.7	458.6	0.00	7.44
3.25	YES							
L0002173		0	0.45570E-07	476800.8	3743872.8	459.0	0.00	7.44
3.25	YES							
L0002174		0	0.45570E-07	476795.5	3743887.9	459.0	0.00	7.44
3.25	YES							
L0002175		0	0.45570E-07	476790.2	3743903.0	459.0	0.00	7.44
3.25	YES							
L0002176		0	0.45570E-07	476784.9	3743918.1	459.0	0.00	7.44
3.25	YES							
L0002177		0	0.45570E-07	476779.6	3743933.2	459.0	0.00	7.44
3.25	YES							
L0002178		0	0.45570E-07	476774.3	3743948.3	459.0	0.00	7.44
3.25	YES							
L0002179		0	0.45570E-07	476769.0	3743963.4	459.0	0.00	7.44
3.25	YES							
L0002180		0	0.45570E-07	476763.7	3743978.5	459.2	0.00	7.44
3.25	YES							
L0002181		0	0.45570E-07	476758.4	3743993.6	459.4	0.00	7.44

▲ *** AERMOD - VERSION 18081 *** *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 *** ***
 *** 13:03:34

PAGE 13

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** VOLUME SOURCE DATA ***

12217 HRA

INIT.	URBAN	NUMBER	EMISSION	RATE		BASE	RELEASE	INIT.	
SZ	SOURCE	EMISSION	PART.	(GRAMS/SEC)	X	Y	ELEV.	HEIGHT	SY
(METERS)	ID	SCALAR	VARY		(METERS)	(METERS)	(METERS)	(METERS)	(METERS)
		CATS.	BY						
L0002182		0	0.45570E-07	476753.1	3744008.7	459.6	0.00	7.44	
3.25	YES								
L0002183		0	0.45570E-07	476747.8	3744023.8	459.7	0.00	7.44	
3.25	YES								
L0002184		0	0.45570E-07	476742.5	3744038.9	459.9	0.00	7.44	
3.25	YES								
L0002185		0	0.45570E-07	476737.1	3744053.9	460.0	0.00	7.44	
3.25	YES								
L0002186		0	0.45570E-07	476731.7	3744069.0	460.0	0.00	7.44	
3.25	YES								
L0002187		0	0.45570E-07	476727.9	3744084.4	460.0	0.00	7.44	
3.25	YES								
L0002188		0	0.45570E-07	476727.2	3744100.4	460.0	0.00	7.44	
3.25	YES								
L0002189		0	0.45570E-07	476726.5	3744116.3	460.0	0.00	7.44	
3.25	YES								
L0002190		0	0.45570E-07	476726.5	3744132.3	460.0	0.00	7.44	
3.25	YES								
L0002191		0	0.45570E-07	476726.5	3744148.3	459.8	0.00	7.44	
3.25	YES								
L0002192		0	0.45570E-07	476726.5	3744164.3	459.5	0.00	7.44	
3.25	YES								
L0002193		0	0.45570E-07	476726.3	3744180.3	459.4	0.00	7.44	
3.25	YES								
L0002194		0	0.45570E-07	476724.8	3744196.3	459.5	0.00	7.44	
3.25	YES								
L0002195		0	0.45570E-07	476723.2	3744212.2	459.3	0.00	7.44	
3.25	YES								
L0002196		0	0.45570E-07	476721.7	3744228.1	459.0	0.00	7.44	
3.25	YES								
L0002197		0	0.45570E-07	476720.1	3744244.0	458.8	0.00	7.44	
3.25	YES								
L0002198		0	0.45570E-07	476718.6	3744260.0	458.7	0.00	7.44	
3.25	YES								
L0002199		0	0.45570E-07	476717.0	3744275.9	458.8	0.00	7.44	
3.25	YES								
L0002200		0	0.45570E-07	476711.7	3744290.8	458.9	0.00	7.44	
3.25	YES								
L0002201		0	0.45570E-07	476705.6	3744305.6	459.1	0.00	7.44	

12217 HRA

3.25	YES							
L0002202		0	0.45570E-07	476699.5	3744320.4	459.3	0.00	7.44
3.25	YES							
L0002203		0	0.45570E-07	476693.4	3744335.2	459.2	0.00	7.44
3.25	YES							
L0002204		0	0.45570E-07	476687.3	3744350.0	459.0	0.00	7.44
3.25	YES							
L0002205		0	0.45570E-07	476678.7	3744363.3	459.0	0.00	7.44
3.25	YES							
L0002206		0	0.45570E-07	476668.1	3744375.2	459.4	0.00	7.44
3.25	YES							
L0002207		0	0.45570E-07	476656.9	3744386.6	459.5	0.00	7.44
3.25	YES							
L0002208		0	0.45570E-07	476644.4	3744396.6	459.4	0.00	7.44
3.25	YES							
L0002209		0	0.45570E-07	476631.8	3744406.5	459.6	0.00	7.44
3.25	YES							
L0002210		0	0.45570E-07	476619.3	3744416.5	460.0	0.00	7.44
3.25	YES							
L0002211		0	0.45570E-07	476606.8	3744426.4	460.0	0.00	7.44
3.25	YES							
L0002212		0	0.45570E-07	476594.2	3744436.4	460.0	0.00	7.44
3.25	YES							
L0002213		0	0.45570E-07	476581.7	3744446.3	460.3	0.00	7.44
3.25	YES							
L0002214		0	0.45570E-07	476569.2	3744456.3	460.7	0.00	7.44
3.25	YES							
L0002215		0	0.45570E-07	476556.7	3744466.2	461.0	0.00	7.44
3.25	YES							
L0002216		0	0.45570E-07	476544.1	3744476.1	461.0	0.00	7.44
3.25	YES							
L0002217		0	0.45570E-07	476530.9	3744485.2	461.0	0.00	7.44
3.25	YES							
L0002218		0	0.45570E-07	476517.8	3744494.3	461.4	0.00	7.44
3.25	YES							
L0002219		0	0.45570E-07	476504.6	3744503.5	461.6	0.00	7.44
3.25	YES							
L0002220		0	0.45570E-07	476491.5	3744512.6	461.6	0.00	7.44
3.25	YES							
L0002221		0	0.45570E-07	476478.4	3744521.7	461.8	0.00	7.44

3.25 YES
 *** AERMOD - VERSION 18081 *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 ***
 *** 13:03:34

PAGE 14

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

12217 HRA

*** VOLUME SOURCE DATA ***

INIT.	URBAN	NUMBER EMISSION RATE	BASE	RELEASE	INIT.
SOURCE	SOURCE	EMISSION RATE	ELEV.	HEIGHT	SY
SZ	SCALAR VARY	PART. (GRAMS/SEC)	X	Y	
ID	CATS.		(METERS)	(METERS)	(METERS)
(METERS)	BY				

L0002222	0	0.45570E-07	476465.2	3744530.9	462.0	0.00	7.44
3.25 YES							
L0002223	0	0.45570E-07	476452.1	3744540.0	462.0	0.00	7.44
3.25 YES							
L0002224	0	0.45570E-07	476439.0	3744549.1	462.0	0.00	7.44
3.25 YES							
L0002225	0	0.45570E-07	476425.7	3744558.1	462.0	0.00	7.44
3.25 YES							
L0002226	0	0.45570E-07	476412.5	3744567.1	462.0	0.00	7.44
3.25 YES							
L0002227	0	0.45570E-07	476399.2	3744576.0	462.4	0.00	7.44
3.25 YES							
L0002228	0	0.45570E-07	476386.4	3744585.6	462.8	0.00	7.44
3.25 YES							
L0002229	0	0.45570E-07	476373.8	3744595.5	463.0	0.00	7.44
3.25 YES							
L0002230	0	0.45570E-07	476361.2	3744605.4	463.0	0.00	7.44
3.25 YES							

*** AERMOD - VERSION 18081 *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 ***
 *** 13:03:34

PAGE 15

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** SOURCE IDs DEFINING SOURCE GROUPS

SRCGROUP ID

SOURCE IDs

ALL L0001742 , L0001743 , L0001744 , L0001745 , L0001746 ,

12217 HRA

L0001747 , L0001748 , L0001749 ,
 L0001755 , L0001750 , L0001751 , L0001752 , L0001753 , L0001754 ,
 , L0001756 , L0001757 ,
 L0001763 , L0001758 , L0001759 , L0001760 , L0001761 , L0001762 ,
 , L0001764 , L0001765 ,
 L0001771 , L0001766 , L0001767 , L0001768 , L0001769 , L0001770 ,
 , L0001772 , L0001773 ,
 L0001779 , L0001774 , L0001775 , L0001776 , L0001777 , L0001778 ,
 , L0001780 , L0001781 ,
 L0001787 , L0001782 , L0001783 , L0001784 , L0001785 , L0001786 ,
 , L0001788 , L0001789 ,
 L0001795 , L0001790 , L0001791 , L0001792 , L0001793 , L0001794 ,
 , L0001796 , L0001797 ,
 L0001803 , L0001798 , L0001799 , L0001800 , L0001801 , L0001802 ,
 , L0001804 , L0001805 ,
 L0001811 , L0001806 , L0001807 , L0001808 , L0001809 , L0001810 ,
 , L0001812 , L0001813 ,
 L0001819 , L0001814 , L0001815 , L0001816 , L0001817 , L0001818 ,
 , L0001820 , L0001821 ,
 L0001827 , L0001822 , L0001823 , L0001824 , L0001825 , L0001826 ,
 , L0001828 , L0001829 ,
 L0001835 , L0001830 , L0001831 , L0001832 , L0001833 , L0001834 ,
 , L0001836 , L0001837 ,
 L0001843 , L0001838 , L0001839 , L0001840 , L0001841 , L0001842 ,
 , L0001844 , L0001845 ,
 L0001851 , L0001846 , L0001847 , L0001848 , L0001849 , L0001850 ,
 , L0001852 , L0001853 ,
 L0001859 , L0001854 , L0001855 , L0001856 , L0001857 , L0001858 ,
 , L0001860 , L0001861 ,
 L0001867 , L0001862 , L0001863 , L0001864 , L0001865 , L0001866 ,
 , L0001868 , L0001869 ,
 L0001870 , L0001871 , L0001872 , L0001873 , L0001874 ,

12217 HRA

L0001875 , L0001876 , L0001877 ,
 L0001878 , L0001879 , L0001880 , L0001881 , L0001882 ,
 L0001883 , L0001884 , L0001885 ,
 L0001886 , L0001887 , L0001888 , L0001889 , L0001890 ,
 L0001891 , L0001892 , L0001893 ,
 L0001894 , L0001895 , L0001896 , L0001897 , L0001898 ,
 L0001899 , L0001900 , L0001901 ,
 *** AERMOD - VERSION 18081 *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 ***
 *** 13:03:34

PAGE 16

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** SOURCE IDs DEFINING SOURCE GROUPS

SRCGROUP ID	SOURCE IDs				
-----	-----				
L0001907	L0001902 ,	L0001903 ,	L0001904 ,	L0001905 ,	L0001906 ,
	L0001908 ,	L0001909 ,			
L0001915	L0001910 ,	L0001911 ,	L0001912 ,	L0001913 ,	L0001914 ,
	L0001916 ,	L0001917 ,			
L0001923	L0001918 ,	L0001919 ,	L0001920 ,	L0001921 ,	L0001922 ,
	L0001924 ,	L0001925 ,			
L0001931	L0001926 ,	L0001927 ,	L0001928 ,	L0001929 ,	L0001930 ,
	L0001932 ,	L0001933 ,			
L0001939	L0001934 ,	L0001935 ,	L0001936 ,	L0001937 ,	L0001938 ,
	L0001940 ,	L0001941 ,			
L0001947	L0001942 ,	L0001943 ,	L0001944 ,	L0001945 ,	L0001946 ,
	L0001948 ,	L0001949 ,			
L0001955	L0001950 ,	L0001951 ,	L0001952 ,	L0001953 ,	L0001954 ,
	L0001956 ,	L0001957 ,			
	L0001958 ,	L0001959 ,	L0001960 ,	L0001961 ,	L0001962 ,

12217 HRA

L0001963 , L0001964 , L0001965 ,
 L0001971 , L0001972 , L0001973 , L0001974 , L0001975 , L0001976 , L0001977 , L0001978 ,
 L0001987 , L0001988 , L0001989 , L0001990 , L0001991 , L0001992 , L0001993 , L0001994 ,
 L0002003 , L0002004 , L0002005 , L0002006 , L0002007 , L0002008 , L0002009 , L0002010 ,
 L0002019 , L0002020 , L0002021 , L0002022 , L0002023 , L0002024 , L0002025 , L0002026 ,
 L0002035 , L0002036 , L0002037 , L0002038 , L0002039 , L0002040 , L0002041 , L0002042 ,
 L0002051 , L0002052 , L0002053 , L0002054 , L0002055 , L0002056 , L0002057 , L0002058 ,
 L0002059 , L0002060 , L0002061 ,

▲ *** AERMOD - VERSION 18081 *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19

*** AERMET - VERSION 16216 ***
 *** 13:03:34

PAGE 17

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** SOURCE IDs DEFINING SOURCE GROUPS

12217 HRA

SRCGROUP ID -----	SOURCE IDs -----					
L0002067	L0002062 , L0002068	, L0002063 , L0002069	, L0002064 ,	, L0002065	, L0002066	,
L0002075	L0002070 , L0002076	, L0002071 , L0002077	, L0002072 ,	, L0002073	, L0002074	,
L0002083	L0002078 , L0002084	, L0002079 , L0002085	, L0002080 ,	, L0002081	, L0002082	,
L0002091	L0002086 , L0002092	, L0002087 , L0002093	, L0002088 ,	, L0002089	, L0002090	,
L0002099	L0002094 , L0002100	, L0002095 , L0002101	, L0002096 ,	, L0002097	, L0002098	,
L0002107	L0002102 , L0002108	, L0002103 , L0002109	, L0002104 ,	, L0002105	, L0002106	,
L0002115	L0002110 , L0002116	, L0002111 , L0002117	, L0002112 ,	, L0002113	, L0002114	,
L0002123	L0002118 , L0002124	, L0002119 , L0002125	, L0002120 ,	, L0002121	, L0002122	,
L0002131	L0002126 , L0002132	, L0002127 , L0002133	, L0002128 ,	, L0002129	, L0002130	,
L0002139	L0002134 , L0002140	, L0002135 , L0002141	, L0002136 ,	, L0002137	, L0002138	,
L0002147	L0002142 , L0002148	, L0002143 , L0002149	, L0002144 ,	, L0002145	, L0002146	,
L0002155	L0002150 , L0002156	, L0002151 , L0002157	, L0002152 ,	, L0002153	, L0002154	,
L0002163	L0002158 , L0002164	, L0002159 , L0002165	, L0002160 ,	, L0002161	, L0002162	,
L0002171	L0002166 , L0002172	, L0002167 , L0002173	, L0002168 ,	, L0002169	, L0002170	,
	L0002174	, L0002175	, L0002176	, L0002177	, L0002178	,

12217 HRA

L0002179 , L0002180 , L0002181 ,
 L0002187 , L0002188 , L0002189 , L0002184 , L0002185 , L0002186 ,
 L0002195 , L0002196 , L0002197 , L0002192 , L0002193 , L0002194 ,
 L0002203 , L0002204 , L0002205 , L0002200 , L0002201 , L0002202 ,
 L0002211 , L0002212 , L0002213 , L0002206 , L0002207 , L0002208 , L0002209 , L0002210 ,
 L0002219 , L0002220 , L0002221 , L0002214 , L0002215 , L0002216 , L0002217 , L0002218 ,

▲ *** AERMOD - VERSION 18081 *** *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 *** ***
 *** 13:03:34

PAGE 18

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** SOURCE IDs DEFINING SOURCE GROUPS

SRCGROUP ID

SOURCE IDs

L0002227 , L0002228 , L0002222 , L0002223 , L0002224 , L0002225 , L0002226 ,
 L0002229 , L0002230 ,

▲ *** AERMOD - VERSION 18081 *** *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 *** ***
 *** 13:03:34

PAGE 19

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** SOURCE IDs DEFINED AS URBAN SOURCES

12217 HRA

URBAN ID -----	URBAN POP -----	SOURCE IDs -----			
L0001746 L0001749	2189641. , L0001747 ,	L0001742 , L0001748	, L0001743 ,	, L0001744 ,	, L0001745 ,
L0001755	L0001750 , L0001756	, L0001751 , L0001757	, L0001752 ,	, L0001753 ,	, L0001754 ,
L0001763	L0001758 , L0001764	, L0001759 , L0001765	, L0001760 ,	, L0001761 ,	, L0001762 ,
L0001771	L0001766 , L0001772	, L0001767 , L0001773	, L0001768 ,	, L0001769 ,	, L0001770 ,
L0001779	L0001774 , L0001780	, L0001775 , L0001781	, L0001776 ,	, L0001777 ,	, L0001778 ,
L0001787	L0001782 , L0001788	, L0001783 , L0001789	, L0001784 ,	, L0001785 ,	, L0001786 ,
L0001795	L0001790 , L0001796	, L0001791 , L0001797	, L0001792 ,	, L0001793 ,	, L0001794 ,
L0001803	L0001798 , L0001804	, L0001799 , L0001805	, L0001800 ,	, L0001801 ,	, L0001802 ,
L0001811	L0001806 , L0001812	, L0001807 , L0001813	, L0001808 ,	, L0001809 ,	, L0001810 ,
L0001819	L0001814 , L0001820	, L0001815 , L0001821	, L0001816 ,	, L0001817 ,	, L0001818 ,
L0001827	L0001822 , L0001828	, L0001823 , L0001829	, L0001824 ,	, L0001825 ,	, L0001826 ,
L0001835	L0001830 , L0001836	, L0001831 , L0001837	, L0001832 ,	, L0001833 ,	, L0001834 ,
L0001843	L0001838 , L0001844	, L0001839 , L0001845	, L0001840 ,	, L0001841 ,	, L0001842 ,
L0001851	L0001846 , L0001852	, L0001847 , L0001853	, L0001848 ,	, L0001849 ,	, L0001850 ,
	L0001854	, L0001855	, L0001856	, L0001857	, L0001858

12217 HRA

L0001859 , L0001860 , L0001861 ,
 L0001867 , L0001862 , L0001863 , L0001864 , L0001865 , L0001866 ,
 L0001875 , L0001868 , L0001869 , L0001870 , L0001871 , L0001872 , L0001873 , L0001874 ,
 L0001883 , L0001876 , L0001877 , L0001878 , L0001879 , L0001880 , L0001881 , L0001882 ,
 L0001891 , L0001886 , L0001887 , L0001888 , L0001889 , L0001890 ,
 L0001899 , L0001894 , L0001895 , L0001896 , L0001897 , L0001898 ,
 L0001900 , L0001901 ,
 *** AERMOD - VERSION 18081 *** C:\Lakes\AERMOD View\12217 HRA\12217
 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 ***
 *** 13:03:34

PAGE 20

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** SOURCE IDs DEFINED AS URBAN SOURCES

URBAN ID	URBAN POP	SOURCE IDs
-----	-----	-----
L0001907	L0001902 , L0001903 , L0001904 , L0001905 , L0001906 , L0001907 , L0001908 , L0001909 ,	
L0001915	L0001910 , L0001911 , L0001912 , L0001913 , L0001914 , L0001915 , L0001916 , L0001917 ,	
L0001923	L0001918 , L0001919 , L0001920 , L0001921 , L0001922 , L0001923 , L0001924 , L0001925 ,	
L0001931	L0001926 , L0001927 , L0001928 , L0001929 , L0001930 , L0001931 , L0001932 , L0001933 ,	
L0001939	L0001934 , L0001935 , L0001936 , L0001937 , L0001938 , L0001939 , L0001940 , L0001941 ,	
	L0001942 , L0001943 , L0001944 , L0001945 , L0001946 ,	

12217 HRA

L0001947 , L0001948 , L0001949 ,
L0001955 , L0001950 , L0001951 , L0001952 , L0001953 , L0001954 ,
L0001963 , L0001958 , L0001959 , L0001960 , L0001961 , L0001962 ,
L0001971 , L0001966 , L0001967 , L0001968 , L0001969 , L0001970 ,
L0001979 , L0001974 , L0001975 , L0001976 , L0001977 , L0001978 ,
L0001987 , L0001982 , L0001983 , L0001984 , L0001985 , L0001986 ,
L0001995 , L0001990 , L0001991 , L0001992 , L0001993 , L0001994 ,
L0002003 , L0001998 , L0001999 , L0002000 , L0002001 , L0002002 ,
L0002011 , L0002006 , L0002007 , L0002008 , L0002009 , L0002010 ,
L0002019 , L0002014 , L0002015 , L0002016 , L0002017 , L0002018 ,
L0002027 , L0002022 , L0002023 , L0002024 , L0002025 , L0002026 ,
L0002035 , L0002030 , L0002031 , L0002032 , L0002033 , L0002034 ,
L0002043 , L0002038 , L0002039 , L0002040 , L0002041 , L0002042 ,
L0002051 , L0002046 , L0002047 , L0002048 , L0002049 , L0002050 ,
L0002059 , L0002054 , L0002055 , L0002056 , L0002057 , L0002058 ,
L0002060 , L0002061 ,

▲ *** AERMOD - VERSION 18081 *** *** C:\Lakes\AERMOD View\12217 HRA\12217
HRA.isc *** 03/18/19
*** AERMET - VERSION 16216 *** ***
*** 13:03:34

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** SOURCE IDs DEFINED AS URBAN SOURCES

URBAN ID	URBAN POP	SOURCE IDs				
-----	-----	-----	-----	-----	-----	-----
L0002067	L0002062 , L0002068	L0002063 , L0002069	L0002064 ,	L0002065 ,	L0002066 ,	
L0002075	L0002070 , L0002076	L0002071 , L0002077	L0002072 ,	L0002073 ,	L0002074 ,	
L0002083	L0002078 , L0002084	L0002079 , L0002085	L0002080 ,	L0002081 ,	L0002082 ,	
L0002091	L0002086 , L0002092	L0002087 , L0002093	L0002088 ,	L0002089 ,	L0002090 ,	
L0002099	L0002094 , L0002100	L0002095 , L0002101	L0002096 ,	L0002097 ,	L0002098 ,	
L0002107	L0002102 , L0002108	L0002103 , L0002109	L0002104 ,	L0002105 ,	L0002106 ,	
L0002115	L0002110 , L0002116	L0002111 , L0002117	L0002112 ,	L0002113 ,	L0002114 ,	
L0002123	L0002118 , L0002124	L0002119 , L0002125	L0002120 ,	L0002121 ,	L0002122 ,	
L0002131	L0002126 , L0002132	L0002127 , L0002133	L0002128 ,	L0002129 ,	L0002130 ,	
L0002139	L0002134 , L0002140	L0002135 , L0002141	L0002136 ,	L0002137 ,	L0002138 ,	
L0002147	L0002142 , L0002148	L0002143 , L0002149	L0002144 ,	L0002145 ,	L0002146 ,	
L0002155	L0002150 , L0002156	L0002151 , L0002157	L0002152 ,	L0002153 ,	L0002154 ,	
	L0002158 ,	L0002159 ,	L0002160 ,	L0002161 ,	L0002162 ,	

12217 HRA

L0002163 , L0002164 , L0002165 ,
 L0002171 , L0002172 , L0002173 , L0002174 , L0002175 , L0002176 , L0002177 , L0002178 ,
 L0002187 , L0002188 , L0002189 , L0002190 , L0002191 , L0002192 , L0002193 , L0002194 ,
 L0002203 , L0002204 , L0002205 , L0002206 , L0002207 , L0002208 , L0002209 , L0002210 ,
 L0002211 , L0002212 , L0002213 , L0002214 , L0002215 , L0002216 , L0002217 , L0002218 ,
 L0002219 , L0002220 , L0002221 ,

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 *** AERMET - VERSION 16216 *** ***
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PAGE 22

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** SOURCE IDs DEFINED AS URBAN SOURCES

URBAN ID	URBAN POP	SOURCE IDs
-----	-----	-----

L0002227 , L0002228 , L0002229 , L0002222 , L0002223 , L0002224 , L0002225 , L0002226 ,
 L0002230 ,

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 *** AERMET - VERSION 16216 *** ***
 *** 13:03:34

PAGE 23

12217 HRA

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** DISCRETE CARTESIAN RECEPTORS ***
(X-COORD, Y-COORD, ZELEV, ZHILL, ZFLAG)
(METERS)

(477007.4, 3742748.2, 463.1, 463.1, 0.0);	(477007.4,
3742701.4, 463.9, 463.9, 0.0);	
(477007.4, 3742664.3, 464.2, 464.2, 0.0);	(477006.0,
3742613.3, 465.1, 465.1, 0.0);	
(476944.5, 3742746.1, 464.5, 464.5, 0.0);	(476952.1,
3742703.5, 465.7, 465.7, 0.0);	
(476962.6, 3742652.4, 466.8, 466.8, 0.0);	(476967.5,
3742607.0, 466.8, 466.8, 0.0);	
(476583.8, 3742892.9, 475.3, 475.3, 0.0);	(476770.7,
3742541.0, 476.2, 540.0, 0.0);	
(476749.2, 3742524.7, 477.4, 560.0, 0.0);	(476633.4,
3742530.8, 481.1, 560.0, 0.0);	
(476578.9, 3742651.7, 479.9, 479.9, 0.0);	(476578.8,
3742712.9, 478.0, 478.0, 0.0);	
(476585.0, 3742823.0, 476.2, 476.2, 0.0);	(476651.9,
3742986.9, 471.2, 471.2, 0.0);	
(476650.4, 3743000.1, 471.0, 471.0, 0.0);	(476996.4,
3742543.6, 466.4, 502.0, 0.0);	
(477011.3, 3742542.5, 465.9, 465.9, 0.0);	(476997.8,
3742512.2, 466.4, 502.0, 0.0);	
(477015.7, 3742910.4, 461.8, 461.8, 0.0);	(477043.5,
3742800.9, 461.9, 461.9, 0.0);	
(476875.8, 3742992.0, 463.5, 463.5, 0.0);	(476756.6,
3742987.5, 466.4, 466.4, 0.0);	
(477027.0, 3743316.6, 460.0, 460.0, 0.0);	(477140.8,
3743315.1, 458.2, 458.2, 0.0);	
(477032.8, 3743423.1, 460.0, 460.0, 0.0);	(476579.7,
3742987.4, 473.6, 473.6, 0.0);	
(476387.0, 3744536.1, 462.9, 462.9, 0.0);	(476411.4,
3744611.5, 462.0, 462.0, 0.0);	
(476399.2, 3744498.4, 463.0, 463.0, 0.0);	(476480.2,
3744465.1, 462.0, 462.0, 0.0);	
(477081.3, 3744230.1, 455.9, 455.9, 0.0);	(477346.5,
3744272.3, 454.0, 454.0, 0.0);	
(477135.7, 3744345.5, 454.8, 454.8, 0.0);	(477064.7,
3744364.3, 455.0, 455.0, 0.0);	
(477152.3, 3744278.9, 455.0, 455.0, 0.0);	(477146.8,
3744090.3, 456.0, 456.0, 0.0);	
(477253.3, 3743939.4, 455.5, 455.5, 0.0);	(476761.8,
3744150.2, 459.1, 459.1, 0.0);	

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12217 HRA

Surface file: PerrisADJU\PERI_V9_ADJU\PERI_v9.SFC

Met Version: 16216

Profile file: PerrisADJU\PERI_V9_ADJU\PERI_v9.PFL

Surface format: FREE

Profile format: FREE

Surface station no.: 3171

Name: UNKNOWN

Year: 2010

Upper air station no.: 3190

Name: UNKNOWN

Year: 2010

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							
10	01	01	1	01	-7.9	0.125	-9.000	-9.000	-999.	106.	21.2	0.19	0.61	
1.00	1.30	335.			9.1	282.5	5.5							
10	01	01	1	02	-3.9	0.088	-9.000	-9.000	-999.	62.	15.1	0.19	0.61	
1.00	0.90	142.			9.1	280.9	5.5							
10	01	01	1	03	-3.9	0.088	-9.000	-9.000	-999.	62.	15.1	0.19	0.61	
1.00	0.90	324.			9.1	280.4	5.5							
10	01	01	1	04	-1.3	0.064	-9.000	-9.000	-999.	39.	18.3	0.19	0.61	
1.00	0.40	294.			9.1	278.8	5.5							
10	01	01	1	05	-3.9	0.088	-9.000	-9.000	-999.	62.	15.0	0.19	0.61	
1.00	0.90	205.			9.1	278.1	5.5							
10	01	01	1	06	-1.3	0.065	-9.000	-9.000	-999.	39.	18.3	0.19	0.61	
1.00	0.40	3.			9.1	277.0	5.5							
10	01	01	1	07	-8.0	0.125	-9.000	-9.000	-999.	106.	21.0	0.19	0.61	
1.00	1.30	99.			9.1	277.0	5.5							
10	01	01	1	08	-3.3	0.086	-9.000	-9.000	-999.	61.	16.8	0.19	0.61	
0.54	0.90	319.			9.1	278.8	5.5							
10	01	01	1	09	20.1	0.128	0.307	0.010	49.	110.	-9.0	0.19	0.61	
0.33	0.90	239.			9.1	284.2	5.5							
10	01	01	1	10	56.7	0.087	0.560	0.010	107.	62.	-1.0	0.19	0.61	
0.26	0.40	188.			9.1	289.2	5.5							
10	01	01	1	11	81.5	0.323	0.867	0.008	277.	441.	-35.9	0.19	0.61	
0.23	2.70	310.			9.1	290.9	5.5							
10	01	01	1	12	97.1	0.281	1.058	0.008	421.	357.	-19.7	0.19	0.61	
0.22	2.20	357.			9.1	293.1	5.5							
10	01	01	1	13	92.2	0.279	1.117	0.008	523.	354.	-20.4	0.19	0.61	
0.22	2.20	356.			9.1	293.8	5.5							
10	01	01	1	14	77.6	0.275	1.102	0.008	595.	347.	-23.2	0.19	0.61	
0.23	2.20	50.			9.1	294.2	5.5							
10	01	01	1	15	54.9	0.230	1.006	0.008	640.	266.	-19.2	0.19	0.61	
0.27	1.80	53.			9.1	293.8	5.5							

12217 HRA

10	01	01	1	16	12.3	0.206	0.613	0.008	648.	225.	-61.5	0.19	0.61
0.36	1.80	11.			9.1	292.5	5.5						
10	01	01	1	17	-3.6	0.087	-9.000	-9.000	-999.	71.	15.6	0.19	0.61
0.64	0.90	351.			9.1	290.4	5.5						
10	01	01	1	18	-3.8	0.087	-9.000	-9.000	-999.	62.	15.2	0.19	0.61
1.00	0.90	186.			9.1	287.5	5.5						
10	01	01	1	19	-3.8	0.087	-9.000	-9.000	-999.	62.	15.2	0.19	0.61
1.00	0.90	275.			9.1	285.9	5.5						
10	01	01	1	20	-1.2	0.064	-9.000	-9.000	-999.	39.	18.1	0.19	0.61
1.00	0.40	181.			9.1	285.4	5.5						
10	01	01	1	21	-7.8	0.125	-9.000	-9.000	-999.	106.	21.3	0.19	0.61
1.00	1.30	318.			9.1	284.9	5.5						
10	01	01	1	22	-3.8	0.088	-9.000	-9.000	-999.	62.	15.1	0.19	0.61
1.00	0.90	196.			9.1	283.1	5.5						
10	01	01	1	23	-3.8	0.088	-9.000	-9.000	-999.	62.	15.1	0.19	0.61
1.00	0.90	330.			9.1	281.4	5.5						
10	01	01	1	24	-7.9	0.125	-9.000	-9.000	-999.	106.	21.2	0.19	0.61
1.00	1.30	332.			9.1	280.9	5.5						

First hour of profile data

YR	MO	DY	HR	HEIGHT	F	WDIR	WSPD	AMB_TMP	sigmaA	sigmaW	sigmaV
10	01	01	01	5.5	0	-999.	-99.00	282.6	99.0	-99.00	-99.00
10	01	01	01	9.1	1	335.	1.30	-999.0	99.0	-99.00	-99.00

F indicates top of profile (=1) or below (=0)

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 HRA.isc *** 03/18/19
 *** AERMET - VERSION 16216 *** ***
 *** 13:03:34

PAGE 26

*** MODELOPTs: RegDEFAULT CONC ELEV URBAN ADJ_U*

*** THE ANNUAL AVERAGE CONCENTRATION VALUES AVERAGED OVER 5
 YEARS FOR SOURCE GROUP: ALL ***
 INCLUDING SOURCE(S): L0001742 , L0001743
 , L0001744 , L0001745 , L0001746 ,
 , L0001747 , L0001748 , L0001749 , L0001750 , L0001751
 , L0001752 , L0001753 , L0001754 ,
 , L0001755 , L0001756 , L0001757 , L0001758 , L0001759
 , L0001760 , L0001761 , L0001762 ,
 , L0001763 , L0001764 , L0001765 , L0001766 , L0001767
 , L0001768 , L0001769 , . . . ,

*** DISCRETE CARTESIAN RECEPTOR POINTS

12217 HRA
 ** CONC OF DPM IN MICROGRAMS/M**3

**

Y-COORD (M)	X-COORD (M)	Y-COORD (M)	CONC	X-COORD (M)
3742701.36	477007.36	3742748.19	0.00406	477007.36
3742613.29	477007.36	3742664.31	0.00521	477005.96
3742703.46	476944.45	3742746.09	0.00695	476952.14
3742607.00	476962.63	3742652.43	0.00681	476967.52
3742541.02	476583.78	3742892.88	0.00450	476770.74
3742530.75	476749.18	3742524.69	0.00454	476633.44
3742712.89	476578.94	3742651.69	0.00410	476578.78
3742986.94	476584.96	3742823.04	0.00515	476651.88
3742543.62	476650.43	3743000.06	0.00428	476996.38
3742512.23	477011.34	3742542.53	0.01007	476997.84
3742800.95	477015.68	3742910.39	0.00270	477043.53
3742987.46	476875.80	3742991.99	0.00608	476756.64
3743315.13	477026.99	3743316.59	0.00100	477140.84
3742987.41	477032.82	3743423.15	0.00069	476579.67
3744611.55	476386.97	3744536.11	0.00028	476411.38
3744465.11	476399.17	3744498.39	0.00023	476480.16
3744272.27	477081.31	3744230.11	0.00020	477346.47
3744364.35	477135.67	3744345.49	0.00017	477064.67
3744090.32	477152.32	3744278.93	0.00018	477146.77
3744150.23	477253.27	3743939.44	0.00025	476761.80

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HRA.isc 12217 HRA
 *** 03/18/19
 *** AERMET - VERSION 16216 ***
 *** 13:03:34

PAGE 27
 *** MODELOPTs: RegDFault CONC ELEV URBAN ADJ_U*

*** THE SUMMARY OF MAXIMUM ANNUAL RESULTS
 AVERAGED OVER 5 YEARS ***

** CONC OF DPM IN MICROGRAMS/M**3
 **

GROUP ID	NETWORK	AVERAGE CONC	RECEPTOR (XR, YR,
ZELEV, ZHILL, ZFLAG)	OF TYPE	GRID-ID	
ALL	1ST HIGHEST VALUE IS	0.01045 AT (	476996.38, 3742543.62,
466.45,	502.00, 0.00) DC		
	2ND HIGHEST VALUE IS	0.01007 AT (	477011.34, 3742542.53,
465.95,	465.95, 0.00) DC		
	3RD HIGHEST VALUE IS	0.00947 AT (	476967.52, 3742607.00,
466.82,	466.82, 0.00) DC		
	4TH HIGHEST VALUE IS	0.00806 AT (	477005.96, 3742613.29,
465.13,	465.13, 0.00) DC		
	5TH HIGHEST VALUE IS	0.00709 AT (	476756.64, 3742987.46,
466.44,	466.44, 0.00) DC		
	6TH HIGHEST VALUE IS	0.00695 AT (	476944.45, 3742746.09,
464.52,	464.52, 0.00) DC		
	7TH HIGHEST VALUE IS	0.00681 AT (	476962.63, 3742652.43,
466.84,	466.84, 0.00) DC		
	8TH HIGHEST VALUE IS	0.00669 AT (	476952.14, 3742703.46,
465.68,	465.68, 0.00) DC		
	9TH HIGHEST VALUE IS	0.00608 AT (	476875.80, 3742991.99,
463.54,	463.54, 0.00) DC		
	10TH HIGHEST VALUE IS	0.00606 AT (	476997.84, 3742512.23,
466.40,	502.00, 0.00) DC		

*** RECEPTOR TYPES: GC = GRIDCART
 GP = GRIDPOLR
 DC = DISCCART
 DP = DISCPOLR

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12217 HRA
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*** AERMET - VERSION 16216 *** ***
*** 13:03:34

PAGE 28
*** MODELOPTs: RegDFault CONC ELEV URBAN ADJ_U*

*** Message Summary : AERMOD Model Execution ***

----- Summary of Total Messages -----

A Total of 0 Fatal Error Message(s)
A Total of 4 Warning Message(s)
A Total of 2028 Informational Message(s)

A Total of 43824 Hours Were Processed

A Total of 978 Calm Hours Identified

A Total of 1050 Missing Hours Identified (2.40 Percent)

***** FATAL ERROR MESSAGES *****
*** NONE ***

***** WARNING MESSAGES *****
ME W186 1211 MEOPEN: THRESH_1MIN 1-min ASOS wind speed threshold used
0.50
ME W187 1211 MEOPEN: ADJ_U* Option for Stable Low Winds used in AERMET

MX W450 17521 CHKDAT: Record Out of Sequence in Meteorological File at:
14010101
MX W450 17521 CHKDAT: Record Out of Sequence in Meteorological File at:
2 year gap

*** AERMOD Finishes Successfully ***

Emission Rates - 2020 Emission Factors

RIVERSIDE 2021						
Source	Trucks Per Day	VMT ^a (miles/day)	Truck Emission Rate ^b (grams/mile)	Truck Emission Rate ^b (grams/idle-hour)	Daily Truck Emissions ^c (grams/day)	Modeled Emission Rates (g/second)
On-Site Idling - West Side	69			0.0949	1.64	1.894E-05
On-Site Idling - East Side	69			0.0949	1.64	1.894E-05
On-Site Travel	276	202.81	0.0342		6.94	8.034E-05
Off-Site Travel 30% Inbound/Outbound Dwy 1 to Harvill/Placentia	83	52.99	0.0174		0.92	1.065E-05
Off-Site Travel 70% Inbound/Outbound Dwy 3 to Harvill/Placentia	193	182.64	0.0174		3.17	3.672E-05
Off-Site Travel 25% Inbound/Outbound to I-215 Freeway SB	69	65.23	0.0174		1.13	1.311E-05
Off-Site Travel 65% Inbound/Outbound to I-215 Freeway NB	179	210.72	0.0174		3.66	4.236E-05
Off-Site Travel 10% Inbound/Outbound to Cajalco Expwy	28	32.42	0.0174		0.56	6.517E-06
^a Vehicle miles traveled are for modeled truck route only. ^b Emission rates determined using EMFAC 2014. Idle emission rates are expressed in grams per idle hour rather than grams per mile. ^c This column includes the total truck travel and truck idle emissions. For idle emissions this column includes emissions based on the assumption that each truck idles for 15 minutes.						

**AVERAGE EMISSION FACTOR
RIVERSIDE 2021**

Speed	LHD1	MHD	HHD
0	0.386522	0.01268	0.01664
5	0.051951	0.01268	0.03565
25	0.01763	0.007231	0.02106

Speed	Weighted Average Emissions
0	0.09486
5	0.03422
25	0.01737

calendar_	season_m	sub_area	vehicle_cl	fuel	temperatu	relative_h	process	speed_tim	pollutant	emission_rate
2021	Annual	Riverside (SC)	HHDT	Dsl	60	70	RUNEX	5	PM10	0.035796
2021	Annual	Riverside (SC)	HHDT	Dsl	60	70	RUNEX	25	PM10	0.021145
2021	Annual	Riverside (SC)	LHDT1	Dsl	60	70	RUNEX	5	PM10	0.102795
2021	Annual	Riverside (SC)	LHDT1	Dsl	60	70	RUNEX	25	PM10	0.034878
2021	Annual	Riverside (SC)	MHDT	Dsl	60	70	RUNEX	5	PM10	0.014181
2021	Annual	Riverside (SC)	MHDT	Dsl	60	70	RUNEX	25	PM10	0.008087
2021	Annual	Riverside (SC)	HHDT	Dsl			IDLEX		PM10	0.016712
2021	Annual	Riverside (SC)	LHDT1	Dsl			IDLEX		PM10	0.764808
2021	Annual	Riverside (SC)	MHDT	Dsl			IDLEX		PM10	0.018632

EMFAC2014 (v1.0.7) Emissions Inventory

Region Type: Air District

RIVERSIDE 2021

Calendar Year: 2021

Season: Annual

Vehicle Classification: EMFAC2007 Categories

Units: miles/day for VMT, trips/day for Trips, tons/day for Emissions, 1000 gallons/day for Fuel Consumption

Region	CalYr	VehClass	MdIYr	Speed	Fuel	Population
Riverside C	2021	HHDT	Aggregate	Aggregated	GAS	101.3237
Riverside C	2021	HHDT	Aggregate	Aggregated	DSL	24381.43
Riverside C	2021	LHDT1	Aggregate	Aggregated	GAS	16765.79
Riverside C	2021	LHDT1	Aggregate	Aggregated	DSL	17130.81
Riverside C	2021	MHDT	Aggregate	Aggregated	GAS	2000.784
Riverside C	2021	MHDT	Aggregate	Aggregated	DSL	16903.28

HHDT% GAS	0.0041386
HHDT% DSL	0.9958614
LHDT1% GAS	0.4946157
LHDT1% DSL	0.5053843
MHDT% GAS	0.1058388
MHDT% DSL	0.8941612

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APPENDIX 2.2:
RISK CALCULATIONS

Table 1
Quantification of Carcinogenic Risks and Noncarcinogenic Hazards
-0.25 to 0 Age Bin Exposure Scenario

Source (a)	Mass GLC		Weight Fraction (d)	Contaminant (e)	Carcinogenic Risk				Noncarcinogenic Hazards/ Toxicological Endpoints**										
	(ug/m ³) (b)	(mg/m ³) (c)			URF (ug/m ³) ⁻¹ (f)	CPF (mg/kg/day) ⁻¹ (g)	DOSE (mg/kg-day) (h)	RISK (i)	REL (ug/m ³) (j)	RfD (mg/kg/day) (k)	RESP (l)	CNS/PNS (m)	CV/BL (n)	IMMUN (o)	KIDN (p)	GI/LV (q)	REPRO (r)	EYES (s)	
	0.01045	1.05E-05			1.00E+00	Diesel Particulate	3.0E-04	1.1E+00	2.7E-06	8.7E-08	5.0E+00	1.4E-03	2.1E-03						
TOTAL					8.7E-08				5.0E+00	1.4E-03	2.1E-03	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00

** Key to Toxicological Endpoints

RESP Respiratory System
CNS/PNS Central/Peripheral Nervous System
CV/BL Cardiovascular/Blood System
IMMUN Immune System
KIDN Kidney
GI/LV Gastrointestinal System/Liver
REPRO Reproductive System (e.g. teratogenic and developmental effects)
EYES Eye irritation and/or other effects

Note: Exposure factors used to calculate contaminant intake

exposure frequency (days/year) 350
exposure duration (years) 0.25
inhalation rate (L/kg-day) 273
inhalation absorption factor 1
averaging time (years) 70
fraction of time at home 0.85
age sensitivity factor (age third trimester) 10

Table 2
Quantification of Carcinogenic Risks and Noncarcinogenic Hazards
0-2 Age Bin Exposure Scenario

Source (a)	Mass GLC		Weight Fraction (d)	Contaminant (e)	Carcinogenic Risk				Noncarcinogenic Hazards/ Toxicological Endpoints**										
	(ug/m ³) (b)	(mg/m ³) (c)			URF (ug/m ³) ⁻¹ (f)	CPF (mg/kg/day) ⁻¹ (g)	DOSE (mg/kg-day) (h)	RISK (i)	REL (ug/m ³) (j)	RfD (mg/kg/day) (k)	RESP (l)	CNS/PNS (m)	CV/BL (n)	IMMUN (o)	KIDN (p)	GI/LV (q)	REPRO (r)	EYES (s)	
		0.01045			1.05E-05	1.00E+00	Diesel Particulate	3.0E-04	1.1E+00	7.6E-06	1.9E-06	5.0E+00	1.4E-03	2.1E-03					
TOTAL								1.9E-06			2.1E-03	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00

** Key to Toxicological Endpoints

RESP Respiratory System
CNS/PNS Central/Peripheral Nervous System
CV/BL Cardiovascular/Blood System
IMMUN Immune System
KIDN Kidney
GI/LV Gastrointestinal System/Liver
REPRO Reproductive System (e.g. teratogenic and developmental effects)
EYES Eye irritation and/or other effects

Note: Exposure factors used to calculate contaminant intake

exposure frequency (days/year) 350
exposure duration (years) 2
inhalation rate (L/kg-day) 758
inhalation absorption factor 1
averaging time (years) 70
fraction of time at home 0.85
age sensitivity factor (0 to 2 years old) 10

Table 3
Quantification of Carcinogenic Risks and Noncarcinogenic Hazards
2-16 Age Bin Exposure Scenario

Source (a)	Mass GLC		Weight Fraction (d)	Contaminant (e)	Carcinogenic Risk				Noncarcinogenic Hazards/ Toxicological Endpoints**									
	(ug/m ³) (b)	(mg/m ³) (c)			URF (ug/m ³) ⁻¹ (f)	CPF (mg/kg/day) ⁻¹ (g)	DOSE (mg/kg-day) (h)	RISK (i)	REL (ug/m ³) (j)	RfD (mg/kg/day) (k)	RESP (l)	CNS/PNS (m)	CV/BL (n)	IMMUN (o)	KIDN (p)	GI/LV (q)	REPRO (r)	EYES (s)
		0.01045			1.05E-05	1.00E+00	Diesel Particulate	3.0E-04	1.1E+00	5.7E-06	2.6E-06	5.0E+00	1.4E-03	2.1E-03				
TOTAL								2.6E-06			2.1E-03	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00

** Key to Toxicological Endpoints

RESP Respiratory System
CNS/PNS Central/Peripheral Nervous System
CV/BL Cardiovascular/Blood System
IMMUN Immune System
KIDN Kidney
GI/LV Gastrointestinal System/Liver
REPRO Reproductive System (e.g. teratogenic and developmental effects)
EYES Eye irritation and/or other effects

Note: Exposure factors used to calculate contaminant intake

exposure frequency (days/year)	350
exposure duration (years)	14
inhalation rate (L/kg-day)	572
inhalation absorption factor	1
averaging time (years)	70
fraction of time at home	0.72
age sensitivity factor (ages 2 to 16 years)	3

Table 4
Quantification of Carcinogenic Risks and Noncarcinogenic Hazards
16-30 Age Bin Exposure Scenario

Source (a)	Mass GLC		Weight Fraction (d)	Contaminant (e)	Carcinogenic Risk				Noncarcinogenic Hazards/ Toxicological Endpoints**										
	(ug/m ³) (b)	(mg/m ³) (c)			URF (ug/m ³) ⁻¹ (f)	CPF (mg/kg/day) ⁻¹ (g)	DOSE (mg/kg-day) (h)	RISK (i)	REL (ug/m ³) (j)	RfD (mg/kg/day) (k)	RESP (l)	CNS/PNS (m)	CV/BL (n)	IMMUN (o)	KIDN (p)	GI/LV (q)	REPRO (r)	EYES (s)	
		0.01045			1.05E-05	1.00E+00	Diesel Particulate	3.0E-04	1.1E+00	2.6E-06	4.0E-07	5.0E+00	1.4E-03	2.1E-03					
TOTAL								4.0E-07			2.1E-03	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00

0.40

** Key to Toxicological Endpoints

RESP Respiratory System
CNS/PNS Central/Peripheral Nervous System
CV/BL Cardiovascular/Blood System
IMMUN Immune System
KIDN Kidney
GI/LV Gastrointestinal System/Liver
REPRO Reproductive System (e.g. teratogenic and developmental effects)
EYES Eye irritation and/or other effects

Note: Exposure factors used to calculate contaminant intake

exposure frequency (days/year)	350
exposure duration (years)	14
inhalation rate (L/kg-day)	261
inhalation absorption factor	1
averaging time (years)	70
fraction of time at home	0.73
age sensitivity factor (ages 16 to 30 years old)	1

Total Risk for All Age Bins (per million) 5.02

Table 5
Quantification of Carcinogenic Risks and Noncarcinogenic Risks
25-Year Worker Exposure Scenario

	Source (a)	Mass GLC		Weight Fraction (d)	Contaminant (e)	Carcinogenic Risk				Noncarcinogenic Hazards/ Toxicological Endpoints**												
		(b)	(c)			URF (ug/m ³) ⁻¹	CPF (mg/kg/day) ⁻¹	DOSE (mg/kg-day)	RISK (i)	REL (ug/m ³) (j)	RfD (mg/kg/day) (k)	RESP (l)	CNS/PNS (m)	CV/BL (n)	IMMUN (o)	KIDN (p)	GI/LV (q)	REPRO (r)	EYES (s)			
		(b)	(c)			(f)	(g)	(h)	(i)	(j)	(k)	(l)	(m)	(n)	(o)	(p)	(q)	(r)	(s)			
1	Diesel Particulates	7.09E-03	7.09E-06	1.00E+00	Diesel Particulate	3.0E-04	1.1E+00	1.3E-06	4.9E-07	5.0E+00	1.4E-03	1.4E-03										
TOTAL									5.1E-07 0.51		1.5E-03	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00		

** Key to Toxicological Endpoints

Note: Exposure factors used to calculate contaminant intake

RESP	Respiratory System	exposure frequency (days/year)	250
CNS/PNS	Central/Peripheral Nervous System	exposure duration (years)	25
CV/BL	Cardiovascular/Blood System	inhalation rate (L/kg-day)	271
IMMUN	Immune System	inhalation absorption factor	1
KIDN	Kidney	averaging time (years)	70
GI/LV	Gastrointestinal System/Liver		
REPRO	Reproductive System (e.g. teratogenic and developmental effects)		
EYES	Eye irritation and/or other effects		